

EVALUATION OF THE EATING DISORDERS MEDICARE BENEFIT SCHEDULE ITEMS 2024

TECHNICAL REPORT

Prepared For :

The Australian Government Department of Health and Aged Care

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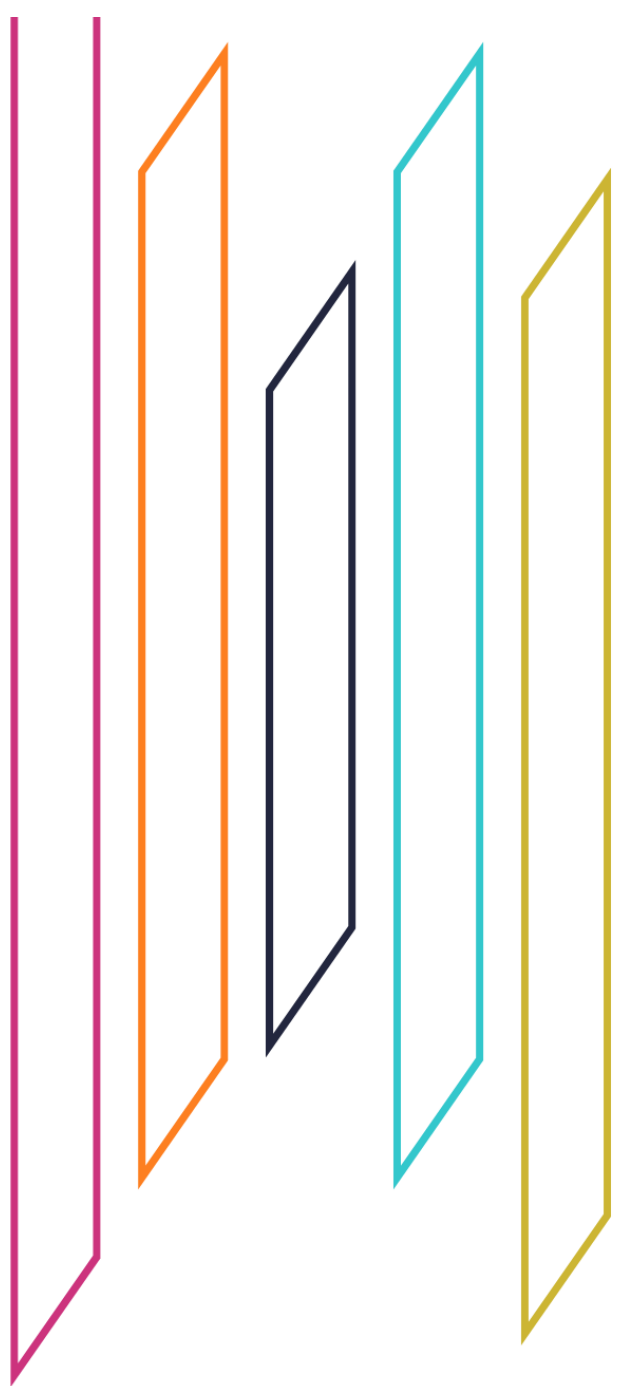
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Chapter 1. National Data Linkage (Study 1)





Chapter 1. National data linkage (Study 1)

Uptake and utilisation of Eating Disorders MBS Items

Introduction

Study 1 used existing Australian administrative data to characterise the uptake and utilisation of the new Eating Disorders Medicare Benefit Schedule (MBS) items. We use the Person Level Integrated Data Asset (PLIDA) ¹, a data asset securely managed by the Australian Bureau of Statistics (ABS), that links together multiple administrative datasets enabling an analysis of the Eating Disorders MBS item usage. It also allows consideration of the broader context of individuals, families, and communities through the availability of information on pharmacological medication use through the Pharmaceutical Benefits Scheme (PBS), socio-economic and demographic factors measured through the 2021 Australian Census data, deaths from the National Death Index, and several other data sources (e.g., identification of participants in the National Disability Insurance Scheme [NDIS]).

This integrated dataset was used to not only examine how many people were using the Eating Disorders MBS items, how many and the types of services they used, and the characteristics of the professionals providing these services, but critically, how the use of the new Eating Disorder items overlapped with other services provided through the MBS and Pharmaceutical Benefit Scheme (PBS; psychological services provided through Better Access, dietetic services provided through the CDMP items, and pharmaceutical treatments provided PBS), and the role of individual, household and broader characteristics in the uptake and utilisation of the eating disorder services, including household income and regional differences in accessibility. The use of PLIDA data also allowed examination of how the population using the eating disorder services differed from the broader Australian population.

Methods

Data source

The PLIDA dataset is a secure, enduring, and regularly updated data linkage project that combines government administrative data on health, education, government payments, employment, income, and taxation, and provides context for this through population-level social and demographic information collected through the Census. The integration and access to these datasets is managed by the ABS. Deterministic and probabilistic linkage of data sources is facilitated using a Person Linkage Spine developed from the Medicare Consumer Directory, the DOMINO Centrelink Administrative Dataset, and the Personal Income Tax dataset. Access to PLIDA data is protected and only authorised researchers with approved projects have access to de-identified data within the secure PLIDA virtual environment. All output is rigorously reviewed and must be vetted by ABS staff prior to release from the secure environment.



Study population and datasets

The study population consists of those in the Australian population who accessed any Eating Disorders MBS items between the launch of the program in November 2019 and the end of 2022. This sample includes 38,130 individuals.

The analyses in the study are based on two different cohorts/datasets. Some analyses that only consider the Eating Disorders MBS items and other MBS data draw only upon this (and other basic information available in the Medicare Consumer Directory). These data provide information on the uptake of the various eating disorder services (e.g., plans, reviews, psychological, and dietetic treatment services, etc.), patterns of use (and treatment cessation), the professions involved in delivering these services, and change over time utilising the full administrative data. It is used to consider the overlap and profiles of use of other relevant MBS services, including services through the Better Access initiative and the Chronic Disease Management Plan (CDMP). Analysis of the data from this cohort is, however, unable to provide the broader context of service use.


The second set of analyses – and the unique contribution of the PLIDA data to this evaluation – is made through a focus on the subset of Eating Disorders MBS service recipients whose MBS data could be linked to their other administrative records within PLIDA. This includes individuals who had a unique (one-to-one) linkage to the Person Linkage Spine (the basis of the PLIDA dataset) and, from there, a similar unique linkage to the other key datasets, and particularly the 2021 Census. This cohort comprised 35,111 individual Eating Disorders MBS service users (92.1% of those in scope).

This linked cohort also provides context on the characteristics of the Eating Disorders MBS service users through comparative descriptive analysis with the overall Australian population. As such, the cohort also included all other Australian residents who completed the 2021 Australian Census with a unique linkage to the Medicare Consumer Directory, MBS, and PBS data. These analyses are restricted to those individuals who were alive for the observation period.

The use of PLIDA data provides the population perspective available through administrative health service data together with the information about the context of that service use provided by both other administrative and Census data. However, the data available through PLIDA is limited to Australian Government data. It does not, for example, include linkage to state/territory data on use of hospital or community health services.

Measure of service use

MBS data were used to identify use of Eating Disorders MBS items, including plans, reviews, and psychological, and dietetic treatment services. Uptake of services indicates the number of individuals using at least one Eating Disorders MBS item, while utilisation refers to the number and patterns of services used. The analysis also examined the degree of overlap (co-occurring or at different points in time) between the use of the Eating Disorders MBS items and other related MBS services including psychological services provided through Better Access, dietetic services provided through CDMP items, pharmaceutical treatments provided through the PBS (e.g., prescriptions for mental health related medications defined using the Anatomical Therapeutic Chemical codes N05A, N05B, N05C, N06A and N06B), and general primary care/general practitioner consultations (drawing on AIHW definition of frequently used MBS items) ²



The analysis in this study examined use of the Eating Disorders MBS items in different ways. Some analyses consider use of Any Service (including use of any of the Eating Disorders MBS items, or differentiating between the MBS items related to plans, reviews, or treatment). Most analyses differentiate psychological and dietetic treatment use. In places that the analysis considers the different providers of psychological services, we differentiate between treatment services delivered by clinical psychologists, registered psychologists, social workers, occupational therapists, general practitioner (GP), or other medical professionals. In contrast, dietetic treatment services were only delivered by accredited dietitians. Some analyses considered the mode of treatment (face-to-face or telehealth and/or telephone), the number of services received by clients and /or delivered by individual practitioners and wait times between receiving an Eating Disorder Treatment and Management Plan (referred to hereafter as an Eating Disorder Plan [EDP]) and first treatment use. The analyses also examined how having overlapping EDP, Better Access, and CDMP services may have impacted use of eating disorder specific items; for instance, where individuals with a Better Access mental health treatment plan continue to claim under the Better Access item numbers after receiving an EDP.

Sociodemographic variables

Service use was examined in relation to sociodemographic characteristics largely drawn from the linked 2021 Census data. The characteristics examined included age, sex, equivalised household income (that adjusts total household income by the number of adults and children within each household), whether the individual spoke a language other than English as their main language at home, and geographical region. The analysis used a combined indicator of First Nations status developed by the ABS and drawing upon information collected through a variety of administrative data sources (see Whop et al. ³).

A major limitation of the PLIDA data is the lack of measures of mental health/morbidity. With analysis focused on whole-of-population or large programs (e.g., the Better Access program), it is possible to draw on linked ABS survey data (e.g., from the National Health Surveys) to provide linked data on the health status of a subset of individuals. However, given the very small size of the Eating Disorders MBS program, this option was not feasible (too few recipients of Eating Disorders MBS services would have been included in the National Health Surveys sample). To provide some measure of mental health we draw on data from a new module on “long-term health conditions” that was included in the 2021 Census for the first time. This item asked people whether they had ever been told by a doctor or nurse that they had any of a small selection of health conditions, including “mental health condition (including depression or anxiety)”. The subsequent report on the quality of the 2021 Census data concluded that non-response was relatively high to this item (4.1%), likely reflecting the sensitivity of the topic and a desire not to disclose a condition to others in the household ⁴. The report commented that the under-estimate of mental health prevalence relative to other more robust ABS methods was most stark, and suggested caution when using this measure. However, in the absence of alternative data sources, we briefly examine this measure with the aim of providing some measure of the relative severity level of need amongst those accessing the Eating Disorders MBS initiative compared to the general population, and compared to those accessing other Australian Government services (e.g., Better Access).



Analysis

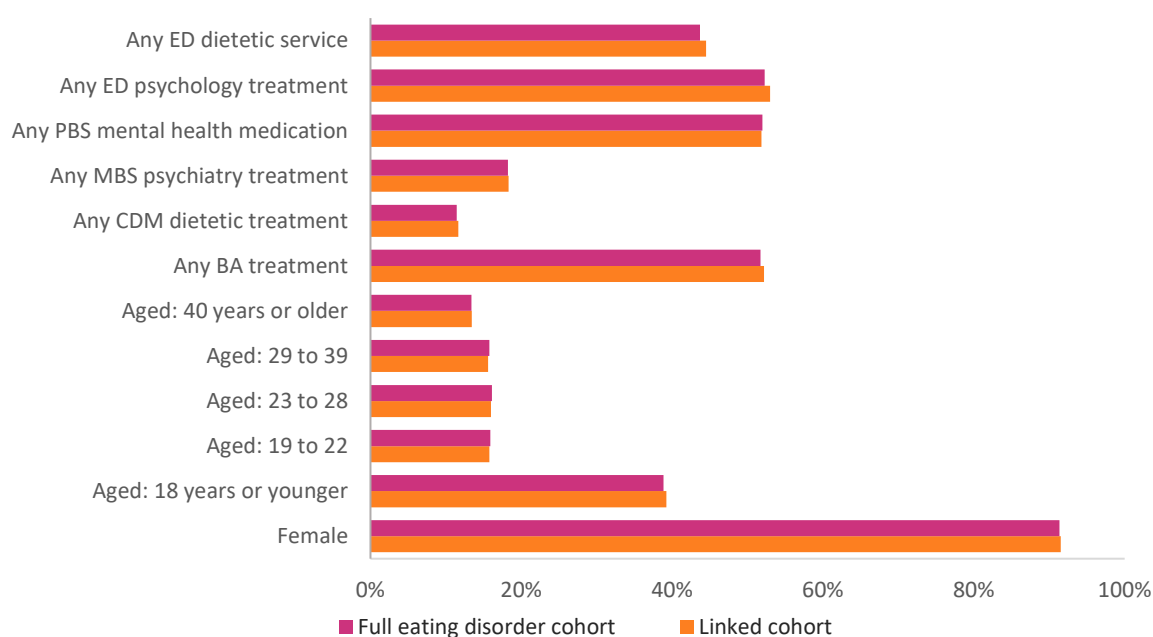
The analysis focuses primarily on providing descriptive statistics of the population of Eating Disorders MBS service users, reporting total number, and percentages of users from certain categories. The means, medians, and inter-quartile range (IQR) for the number of services used of a particular type were also examined. Regression models were used to gain insight into sociodemographic factors associated with use patterns.

Results

Preliminary analysis: PLIDA data sample

A total of 38,130 Eating Disorders MBS service users were identified from the launch of the program in November 2019 through to the end of December 2022. The majority (92.1%, $n = 35,111$) of these service users were successfully linked to the 2021 Census data through the Person Linkage Spine and included in sociodemographic analyses (census-linked sample).

Although there were some statistically significant differences between those who were retained in the analysis and those lost through the data linkage process (reflecting the large sample size), the absolute difference in characteristics between these two groups were minor. For example, Figure 1.1 contrasts key characteristics of the two cohorts and shows all differences are less than 1%, with the largest differences observed being in the estimated rates with which clients had access any Eating Disorders MBS dietetic treatment items: with an estimate of 43.7% derived from the full sample versus 44.5% from the Census-linked cohort (an absolute difference of 0.8 of a percentage point). While the missing linkage is acknowledged, these minor differences are considered in the context of the unique and rich information the evaluation gains through linkage to Census and other data.



Note. ED = Eating Disorders MBS services, CDMP = Chronic Disease Management Plan services; BA = Better Access services

Figure 1.1. Comparison of the full and linked cohorts

Characteristics of Eating Disorders MBS services users

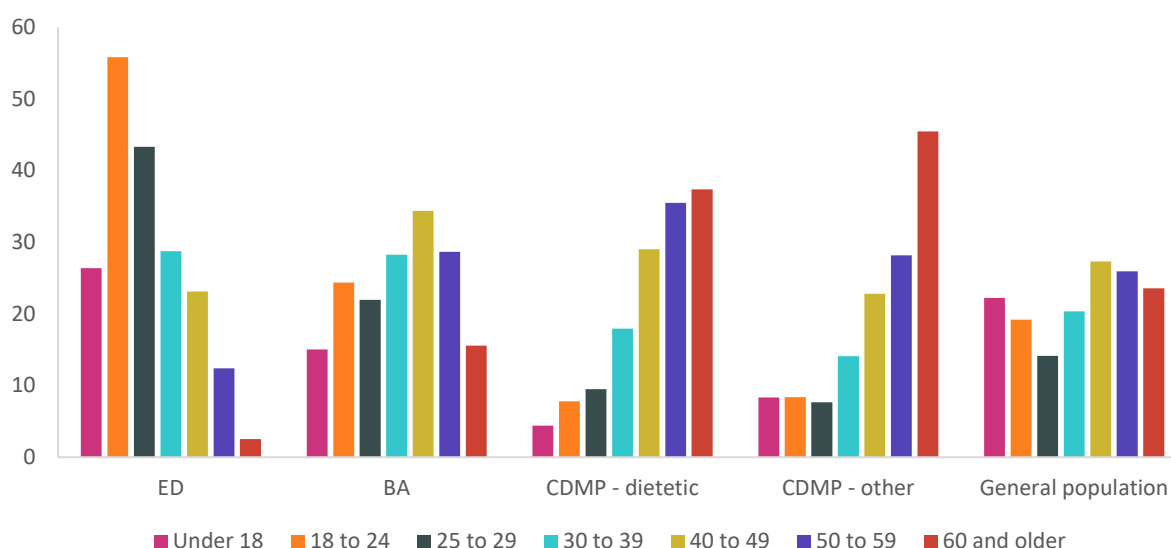
Analysis of the Census-linked sample showed the vast majority (91.2%) of Eating Disorders MBS services users were female and relatively young, with a mean age of 26.5 years (median = 23, IQR = 17 to 32). The proportion of female service users and mean age is compared against users of Better Access service, CDMP, and the general population in Table 1.1. While most of the Better Access and CDMP service users are also female, the skew towards females is greater in the Eating Disorders MBS initiative.

Table 1.1. Age and sex of eating disorder service users relative to related services and the general population

	Age (mean)	Female (%)
Eating Disorders MBS	26.50	91.19
Better Access	38.27	60.54
Chronic Disease Management Plan - dietetic	51.23	61.24
Other Chronic Disease Management Plan	53.48	55.62
General population	39.78	51.09

Note. Better Access and Chronic Disease Management Plan service users excludes those who used any Eating Disorders MBS Items service. General population includes respondents of the 2021 Australian Census.

While Better Access users are somewhat younger on average compared to the general population, the average Eating Disorders MBS service user is over a decade younger. The difference in the age distribution between programs and the general population is shown in Figure 1.2. The peak age range for eating disorder services is from 18 – 24 years, compared to 40 – 49 years for Better Access, and 60 and older for CDMP services.



Note. ED = eating disorder, BA = Better Access, CDMP = Chronic Disease Management Plan.

Figure 1.2. Comparison of age profiles between Eating Disorders MBS items service users, related services, and the general population

Further characteristics (from the 2021 Census) are provided in Table 1.2. Compared to all other comparison groups, Eating Disorders MBS service users were the least likely to speak a language

other than English at home, to be a First Nations person, to live in an outer remote or regional area, and to live in a household classified in the lowest income. In contrast, their reported prevalence of mental illness (from the 2021 Census) was almost twice that of the next highest group (Better Access mental health treatment plan recipients), they were the most likely to live in a major city, and to live in a household classified with the highest income compared to users of related services or the general population. Better Access service users tended to show trends in the same direction compared to CDMP users and the general population, though this skew was more pronounced in the Eating Disorders MBS service user population. That almost twice as many Eating Disorders MBS service users reported having a mental health condition in the Census compared to Better Access service users is notable and may point to Eating Disorders MBS service users being a particularly vulnerable population.

Table 1.2. Comparison of Eating Disorders MBS items service user characteristics with those of related service users and the general population

	Proportion of Service Users %				
	ED-MBS	BA	CDMP – dietetic	CDMP – other	General population
Sex (female)	91.2	60.5	61.2	55.6	51.1
Language other than English	8.0	15.1	24.3	23.1	21.3
First Nations people	2.8	4.0	3.3	3.3	3.3
Census: reported mental health condition	51.7	26.7	18.3	14.5	9.5
Remoteness					
Major city	80.2	74.3	75.1	72.4	72.1
Inner region	14.6	17.9	17.5	18.5	18.0
Outer region/remote	5.3	7.8	7.4	9.1	9.9
Equivalent household income					
Lowest income group	20.8	29.3	35.8	39.0	29.0
Highest income group	48.4	39.8	33.2	29.7	40.0

Note. ED-MBS = Eating Disorders MBS items, BA = Better Access, CDMP = Chronic Disease Management Plan. Better Access and Chronic Disorder Management Plan service users excludes those who used any Eating Disorders MBS items service. General population includes respondents of the 2021 Australian Census linked within PLIDA.

Table 1.3 examines service user characteristics among those of working age (aged 18 to 59 years). This helps address concerns about the wide differences in the client age profiles of the different programs, given many Eating Disorders MBS service users are children or adolescents, and that the CDMP has a much older client population. This controls for the effects of age profile on characteristics such as educational attainment, labour force status and partner status.

Among those of working age, 20.4% of Eating Disorders MBS service users were in the lowest income group and 48.3% were in the highest income group, comparable to the general population (20.5% in lowest income group, 48.6% in highest income group). However, working age Eating Disorders MBS service users were still less likely to be in the lowest income group and more likely to be in the highest income group in comparison to Better Access and CDMP users. Eating Disorders MBS service users of working age were more likely to have completed high school or a tertiary degree as their highest level of education, and less likely to have a diploma or certificate compared to related service users and the general population.

Eating Disorders MBS service users were less likely to be in the labour force compared to Better Access service users and the general population, but more likely than users of CDMP services. Eating Disorders MBS service users were considerably less likely to have a partner (either marriage or de facto) compared to all other comparison groups.

Table 1.3. Comparison of working age eating disorder service user characteristics with those of related service users and general population

	Proportion of Service Users %				
	ED-MBS	BA	CDMP – dietetic	CDMP – other	General population
Equivalent household income					
Lowest income group	20.4	24.1	26.0	26.9	20.5
Highest income group	48.3	44.9	41.9	41.1	48.6
Highest level of educational attainment					
Incomplete high school	9.0	14.3	15.9	17.4	13.6
Complete high school	29.7	18.8	15.1	15.6	18.2
Diploma or certificate	23.5	30.8	32.8	32.0	30.3
Tertiary	34.8	31.2	30.2	28.8	32.9
Undefined	3.0	5.0	6.0	6.3	5.0
Labour force status (broad)					
Employed	72.3	73.3	71.4	70.9	78.8
Unemployed	4.9	5.1	4.3	4.2	3.8
Not in labour force	22.3	20.8	23.5	24.0	16.6
Relationship/partner status					
Partnered (marriage or de facto)	29.5	49.2	61.0	60.2	59.7

Note. Sample restricted to those aged 18 – 59. ED-MBS = Eating Disorders MBS items, BA = Better Access, CDMP = Chronic Disease Management Plan. Better Access and Chronic Disorder Management Plan service users excludes those who used any Eating Disorders MBS items service. General population includes respondents of the 2021 Australian Census linked within PLIDA.

In summary, Eating Disorders MBS service users are mostly female, mostly adolescents or young adults, and have high rates of self-reported mental illness compared to both the general Australian population and compared to users of other related services, namely Better Access and the CDMP. They are also more socioeconomically advantaged than those receiving other similar Australian Government services, though these differences are reduced when controlling for stark age differences between groups.

Characteristics of Eating Disorders MBS items service users over time

It could be expected that the profile of new Eating Disorders MBS service users changed over the first few years of the program because as the program became established, pre-existing demand for services was increasingly met. The change in key characteristics of services used is presented in Table 1.4, separately for the first 14 months (November 2019 to December 2020), and for the subsequent two full calendar years (2021 and 2022). Initially, in 2019 – 2020 service users were somewhat older (mean age of 28.2 compared to a mean age of 25 in 2022), and much more likely to have reported a mental health condition in the Census (61.4% compared to 37.9% in 2022). The proportion of service users living in major cities decreased slightly over time, from 81.4% in the first year to 77.9% in the

third year. The proportion of service users in the highest income group increased over time from 47.6% to 49.2%. The proportion of female service users and those speaking a language other than English at home remained relatively stable over the first three years, while there was a slight increase in the proportion of First Nations people accessing the Eating Disorders MBS items initiative in 2022 (3.3%) compared to earlier years (2.6%). The change in characteristics over time may reflect considerable preceding demand for services when the program began amongst a more severe and disadvantaged population, and over time as treatment need was being met, a wider range of clients were able to receive services through the program.

Table 1.4. Change in Eating Disorders MBS items service user characteristics over time

	<i>n</i> = 14,666 Year 1 (+)	<i>n</i> = 10,849 Year 2	<i>n</i> = 9,529 Year 3
Percent of total clients	41.9%	31.0%	27.2%
Age (mean)	28.2	25.6	25.0
Sex (female)	91.9%	90.3%	91.0%
Language other than English	7.7%	8.7%	7.9%
First Nations people	2.6%	2.7%	3.3%
Census: reported mental health condition	61.4%	50.7%	37.9%
Remoteness			
Major city	81.4%	80.6%	77.9%
Inner region	13.6%	14.5%	16.1%
Outer region/remote	5.0%	4.9%	6.0%
Equivalent household income			
Lowest income group	21.8%	20.5%	20.5%
Highest income group	47.6%	48.7%	49.2%

When considering only those of working age (Table 1.5), the proportion of Eating Disorders MBS service users in the highest income group increased somewhat while the proportion in the lowest income group slightly declined. There was an increase in the proportion of users with a diploma or certificate, reducing the proportion of those with a tertiary qualification.

The proportion of employed service users increased, while those not in the labour force decreased. These changes could together reflect the reduced severity of illness of service users commencing the Eating Disorders MBS items initiative after the initial year. The proportion of new service users in a relationship (married or de facto) also increased from 27.7% in 2019 – 2020 to 33.5% in 2022.

Table 1.5. Change in working age Eating Disorders MBS items service user characteristics over time

	Year 1 (+)	Year 2	Year 3
Equivalised household income			
Lowest income group	21.2%	19.3%	20.1%
Highest income group	47.5%	48.6%	49.5%
Highest level of educational attainment			
Incomplete high school	8.9%	9.2%	9.0%
Complete high school	28.7%	31.3%	29.6%
Diploma or certificate	22.9%	23.4%	24.5%
Tertiary	36.6%	33.9%	33.9%
Undefined	2.9%	3.3%	3.0%
Labour force status (broad)			
Employed	70.6%	72.2%	75.6%
Unemployed	4.8%	5.1%	4.9%
Not in labour force	24.1%	22.2%	19.0%
Relationship/partner status	27.7%	29.3%	33.5%

Note. Sample restricted to those aged 18 – 59.

NDIS and Eating Disorders MBS items service use


To explore whether the Eating Disorders MBS services were being accessed by those receiving services through the NDIS, we examined the cohort of NDIS recipients (up to 2021) who could be linked through PLIDA to MBS data. The percentage of NDIS recipients (and non-NDIS recipients in the population) accessing Eating Disorders MBS and the other related MBS services (and the relative risk ratio associated with NDIS recipients using each type of service) is shown in Table 1.6.

Table 1.6. Rates of service use among NDIS population

	Percent in non-NDIS 2021 Census linked cohort receiving service	Percent in 2021 NDIS cohort receiving service	Simple Relative Risk calculation
Eating Disorders MBS	0.15%	0.27%	1.75
Better Access	24.71%	44.64%	1.81
Chronic Disease Management Plan – dietetic	3.96%	6.47%	1.64
Chronic Disease Management Plan – other	31.18%	53.83%	1.73

Note. Service use is up to December 2021. Better Access and Chronic Disease Management values exclude individuals with an Eating Disorders MBS items service use. N = 451,248

These figures in Table 1.6 show that NDIS recipients were more likely to access Eating Disorders MBS items, Better Access, CDMP dietetic services, and other CDMP services than those not on the NDIS. Consideration of the relative risk ratio shows the elevated rates of service use among those participating in the NDIS is fairly consistent across Eating Disorders MBS items, Better Access and CDMP services (though use of CDMP dietetic treatment is somewhat lower). This suggests that through the early years of the Eating Disorders MBS items initiative, NDIS recipients were accessing Eating Disorders MBS services at a similar rate to which they had been accessing other related



services, but we are unable to conclude whether this met or was proportionate to their need for eating disorder related services.

Use of psychological and dietetic treatment prior to Eating Disorders MBS items commencement

The final analysis in this section examines whether individuals commonly received psychological services through Better Access and dietetic services through the CDMP prior to commencing on the Eating Disorders MBS items initiative. Of those using any Eating Disorders MBS services, 43.4% had received a Better Access mental health treatment plan and 52.2% had utilised a psychological treatment service in the 12 months prior to commencing their EDP. Further, 18.3% had accessed MBS psychiatry services (excluding Better Access) and 51.8% had received mental health-related medication through the PBS. While prior psychological treatment was common, Eating Disorders MBS services users were less likely to have accessed dietetic services prior to their EDP, with just 11.7% having used a CDMP dietetic service in the 12 months prior. By contrast, the majority (96.7%) of Eating Disorders MBS service users had consulted with a GP in the 12 months prior to their first Eating Disorders MBS service.

Overall Eating Disorders MBS items service use

The next sections describe the different aspects of the Eating Disorders MBS initiative, considering data on types and number of services provided, and the characteristics of both clients and providers. We focus on different phases of the program, considering commencement (which generally includes the initial preparation of an EDP), treatment services (differentiating between psychological treatment and dietetic health services), and reviews.

To provide an initial overview, our analysis shows that 99.9% of Eating Disorders MBS clients received an EDP on commencement in the program. Two-thirds (67.3%) of Eating Disorders MBS clients had received at least one treatment service, with 53.0% receiving psychology treatment, 44.5% receiving dietetic treatment and 30.2% receiving both psychology and dietetic treatment through the Eating Disorders MBS items initiative. Finally, only 26.2% of Eating Disorders MBS clients had received a review under the initiative.

In terms of the total number of services received/delivered through the Eating Disorders MBS items initiative up to December 2022: in the complete sample, there were a total of 544,368 services claimed under the initiative, including Eating Disorders MBS treatment plans, Eating Disorders MBS reviews, and Eating Disorders MBS psychological and dietetic treatment services. The breakdown of these services over time is presented in Table 1.7.



Table 1.7. Number of Eating Disorders MBS items services used by type and year

Year	Total services	Dietetic services	Psychological treatment	Plans	Reviews
2019	7,411	1,306	3,433	2,626	46
2020	148,328	34,570	94,023	14,080	5,655
2021	191,626	51,905	116,347	15,866	7,508
2022	197,003	57,363	116,573	15,734	7,333
Total	544,368	145,144	330,376	48,306	20,542

Commencements and plan preparation

For over 99.9% of Eating Disorders MBS service users, the EDP was the first service they received. A small number of treatment users did not receive a treatment plan, which could be due to administrative errors. The number of commencements each month is shown in Figure 1.3, which presents data overlapping for each year to help identify patterns of commencements within years. Figure 1.4 presents monthly commencements over the entire 3+ years and uses the ABS Remoteness Structure to differentiate commencements in major cities and those in the rest of Australia.

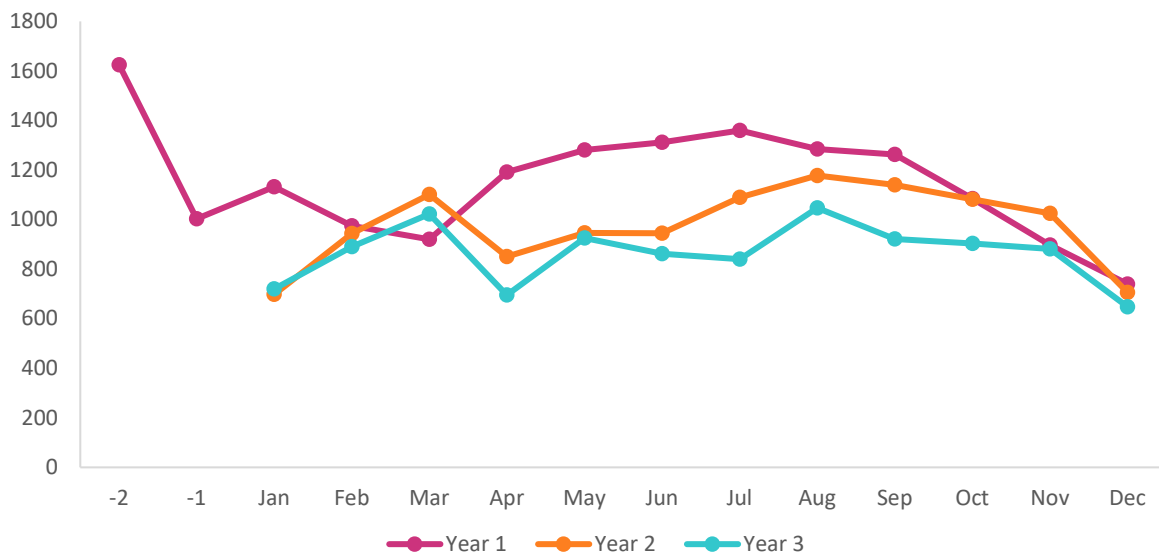


Figure 1.3. Annual trends in Eating Disorders MBS items commencements

November 2019, when the Eating Disorders MBS items launched, had the largest number of new commencements, and the number of new commencements was higher in most months (up until September) of the first year compared to subsequent years. A monthly pattern of new commencements is evident from year 2. Regression modelling confirms that new monthly commencements were lower in March, December, and January (potentially coinciding with provider holidays) than the other months. In addition, this modelling suggests (even after omitting the year 1+ data) that the number of new clients entering the Eating Disorders MBS initiative has been declining over time, by around 10 clients each month over the two-year period. This potentially reflects how continuity of treatment has restricted space for new clients (see discussion later).

The majority (80.20%) of initial plans were prepared for individuals living in major cities, followed by inner regional areas (14.50%), then outer regional (4.53%), and a small number from remote or very remote areas (0.73%). The number of plans prepared in major cities or other areas each month of



the initiative is shown in Figure 1.4 and shows an evident decline in number of initial plans over time in major cities while the number of plans being prepared in regional and remote Australia remained relatively consistent across the study period.

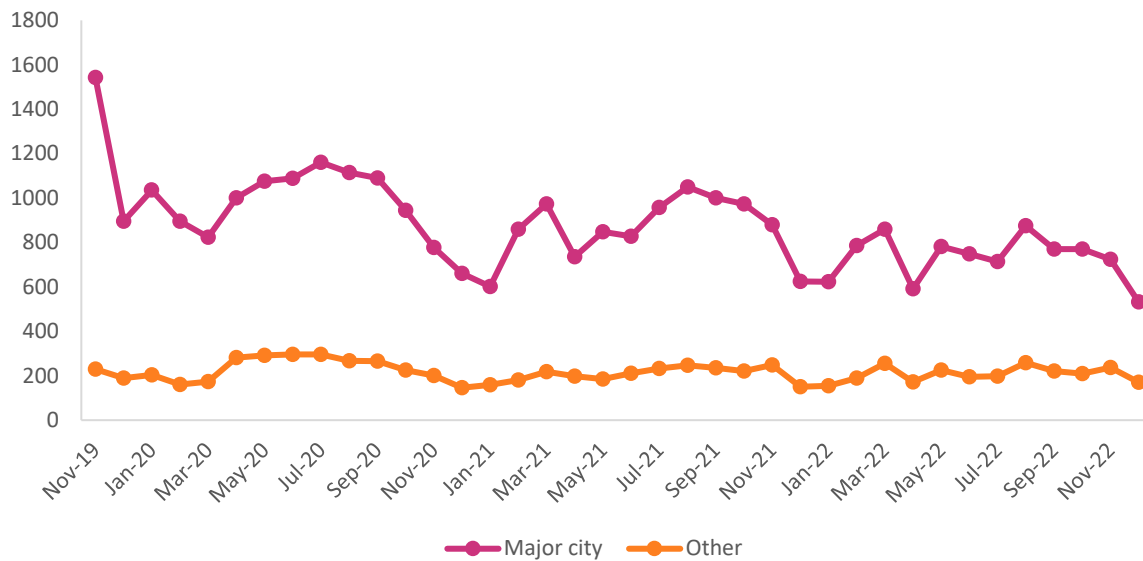


Figure 1.4. Number of Eating Disorder Plans prepared by location and month (November 2019 – December 2022)

Subsequent plan preparation

The majority of those with a plan had only one plan prepared ($n = 27,706$, 78.9%). A further 15.1% had two plans prepared, 5.6% had three plans, and 0.3% had four or more treatment plans prepared.

Consistent with the Eating Disorders MBS policy, for those clients who had multiple plans, the time between plans was almost always more than one year, with less than 1% of plans being prepared within 365 days of a previous plan. The average time between the first and second treatment plan was 451 days (median = 406, IQR = 378 to 479 days). The average time between plans decreased with each consecutive plan. The time between the second and third plan was on average 408 days (median = 387, IQR = 371 to 421 days) and the time between the third and fourth plan was on average 382 days (median = 371, IQR = 367 to 379 days). This trend might indicate increased familiarity with the Eating Disorders MBS initiative process, and an urgency to facilitate continuing treatment for those approaching or past the 12-month period and requiring a new EDP. However, it must be recognised that a relatively small number of clients have had more than two treatment plans at this stage (less than 6%).

While subsequent EDP were consistently prepared more than 12-months after the date of the initial plan, around 14% of clients had a Better Access mental health treatment plan prepared within 12 months of their first EDP. On average, the time between initial EDP and subsequent Better Access plan was 203 days (median = 216 day, IQR = 114 to 301 days). Just over half (50.2%) of these Better Access plans were prepared by the same provider who prepared the initial EDP.

Treatment plan providers and out-of-pocket costs

The majority (93.7%) of EDPs were prepared by a GP. EDPs were also prepared by psychiatrists (3.4%), paediatricians (1.5%), and other medical professionals (1.4%). The majority of EDPs incurred no cost to the clients (78.5%), however the rate varied by profession. Out-of-pocket costs were most often incurred for EDPs prepared by paediatricians (55.4%), then psychiatrists (28.4%), then GPs (20.9%), and least likely for EDPs provided by other medical professionals (4.4%).

Treatment service uptake and utilisation relative to related services

The use of the Eating Disorders MBS items was also examined in terms of impact on the use of psychological and dietetic services by those who need them. As a more specialised initiative, the number of clients in the Eating Disorders MBS initiative is small relative to the Better Access and CDMP programs. Because of this, any change in overall use of services attributable to the introduction of the Eating Disorders MBS items is dwarfed by fluctuations in Better Access and CDMP item use. From 2020 to 2022, there were 326,943 psychological services provided through the Eating Disorders MBS items, compared to 20,601,230 psychological services provided through Better Access. Over the same timeframe, there were 143,838 dietetic services provided through the Eating Disorders MBS items, and 1,117,742 dietetic services provided through the CDMP items.

To gain insight into whether introducing the Eating Disorders MBS items improved access to psychological and dietetic services among the target population, we identified the subgroup of Eating Disorders MBS clients who could be observed in the dataset for the 12 months prior to, and 12 months following, the preparation of their EDP, and examined the total number of psychological and dietetic services (whether through Better Access, CDMP, or Eating Disorders MBS) over that period of time. The results for psychological and dietetic treatments are shown separately in Figures 1.5 and 1.6.

For both types of treatment, in the lead up to first obtaining an EDP, there was a gradual increase in the number of services accessed. However, there was still a marked increase in the total number of services being accessed after the EDP was prepared. For both psychological and dietetic treatment services, the increase in services peaked in the month after obtaining the plan, with the number of psychological services 2.1 times higher, and dietetic services 7.2 times higher compared to the month immediately before obtaining the EDP. After this, the number of services accessed gradually decreases over the course of 12 months.

For psychological services, use of Eating Disorders MBS and Better Access services combined was slightly lower 12 months after obtaining an EDP than it was in the month before obtaining the treatment plan, while for dietetic services, Eating Disorders MBS and CDMP dietetic service use remained higher after 12 months compared to before the plan. Notably, there was very low baseline usage of dietetic treatment among those who later accessed dietetic treatment through the Eating Disorders MBS items. This may be because the CDMP is targeted more towards a much older population. In addition, the number of dietetic services being accessed decreased significantly by the end of the first 12 months, which may indicate that either need was being met within that timeframe and service users no longer required dietetic treatment, or that there may have been barriers to



continuing dietetic treatment. Only 5.2% of those using dietetic treatment services used all 20 sessions within their first 12 months.

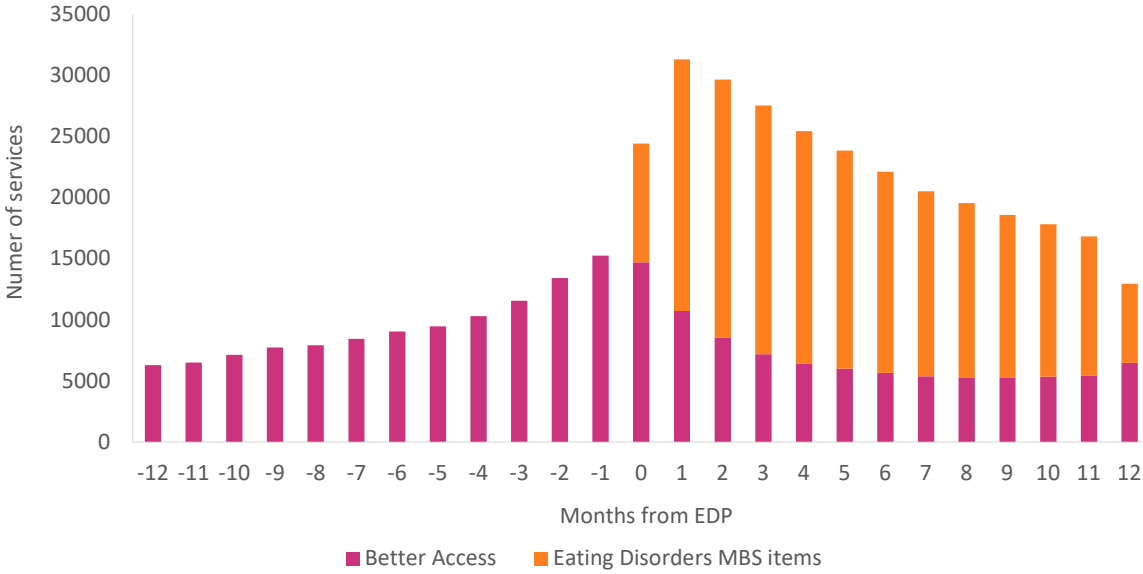


Figure 1.5. Number of psychological services provided through Better Access and Eating Disorders MBS items before and after obtaining an EDP

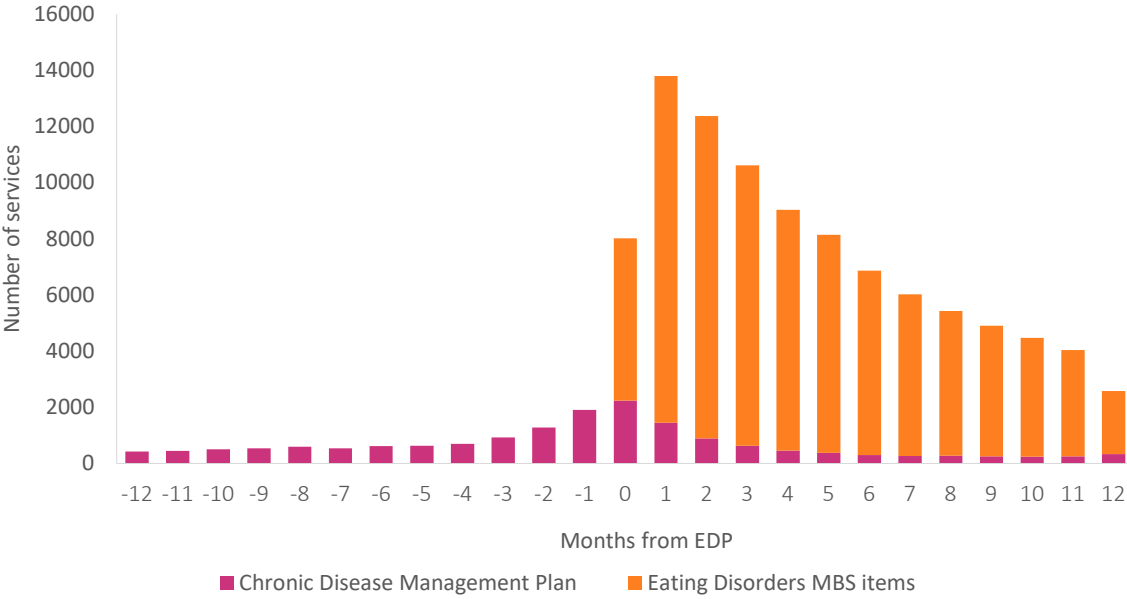
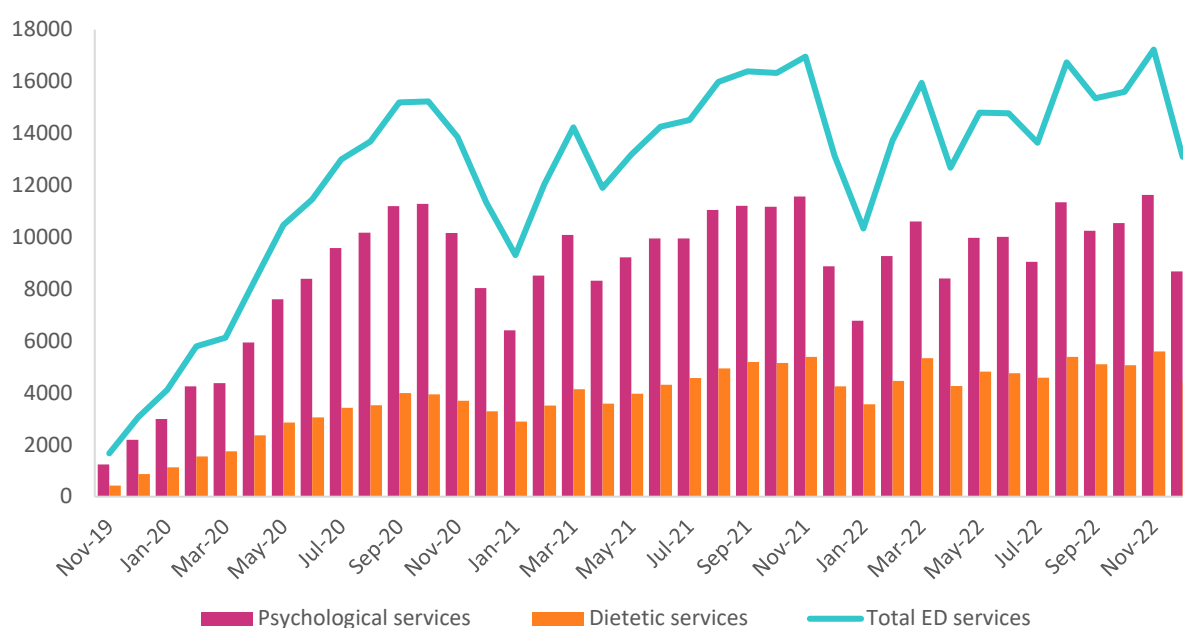


Figure 1.6. Number of dietetic services provided through the CDMP and Eating Disorders MBS items before and after obtaining an EDP

Overview of treatment service use

There were 475,520 Eating Disorders MBS treatment services provided through to December 2022, including 330,376 psychological treatment services and 145,144 dietetic health services. Less than six months after the launch of the Eating Disorders MBS items, COVID-19 related restrictions to movement were put in place in Australia. To facilitate the continued provision of health services, new telehealth Medicare items were introduced (including phone and video-call services). Due to the short period between the launch of the Eating Disorders MBS items and COVID-19 restrictions, it is difficult to discern the impact that the pandemic may have had on Eating Disorders MBS service uptake and utilisation. However, Figure 1.7 shows a steady increase in Eating Disorders MBS total treatment services from November 2019 through to November 2022. Figures 1.8 and 1.9 show the proportion of psychological and dietetic treatment services delivered via telehealth/phone services. These figures together suggest that the introduction of telehealth items assisted in maintaining the accessibility of services during this period. It is unclear whether uptake would have increased further if the pandemic had not occurred. The first drop in service use began in November 2020, and likely reflects a seasonal trend as it is also evident in 2021 and 2022, and may be explained by reduced capacity for treatment services during the holiday season.



Note. ED = eating disorder.

Figure 1.7. Total, psychological, and dietetic service use over time

Figure 1.7 also indicates that both psychological and dietetic services increased over time, with some monthly variation. While the absolute increase over time in the number of monthly treatment services is greater for psychology than dietetic services, the relative increase is greater for dietetic treatment. The number of monthly dietetic services reached a plateau towards the end of 2021, while psychological services did so a year earlier. This may indicate that Eating Disorders MBS psychology service providers reached full capacity earlier, or it could reflect that there is greater long-term treatment provided to clients receiving psychological services, reducing the number of new clients able to enter the program.

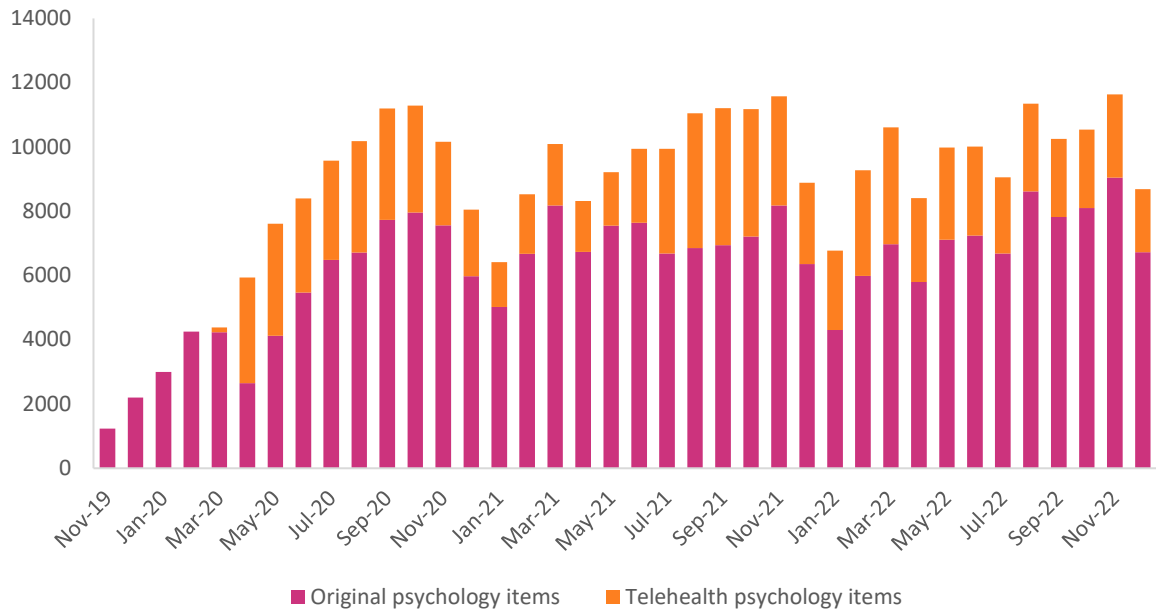


Figure 1.8. Breakdown of Eating Disorders MBS psychology services delivered face-to-face or by telehealth/phone

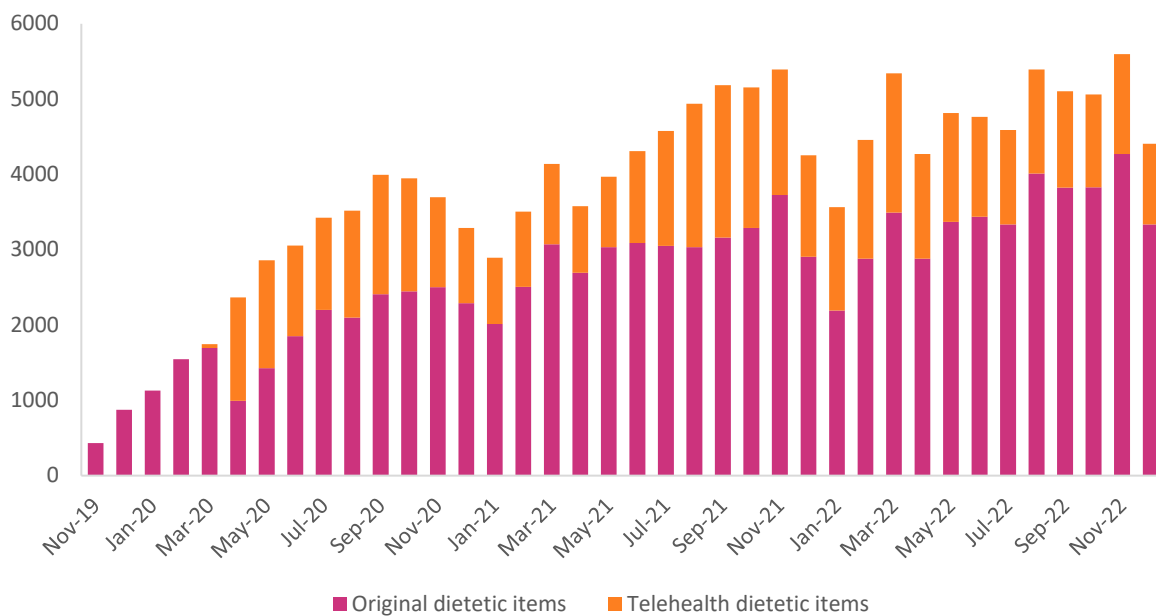


Figure 1.9. Breakdown of Eating Disorders MBS dietetic services delivered face-to-face or by telehealth/phone

For Eating Disorders MBS psychological services, there was some evidence that a greater percentage of clients from outer regional and remote locations were using telehealth and phone than those living in major cities or inner regional areas, though this difference was modest (37.3% of services via telehealth or phone in outer regional/remote versus 34.6% in major cities). However, for Eating Disorders MBS dietetic services, those living in major cities were much more likely to use telehealth compared to those outside of major cities, with those living in outer regional and remote areas being



the least likely to use dietetic services delivered via telehealth (Figure 1.10). Better Access psychology treatment showed a similar, though less pronounced pattern of results as the Eating Disorders MBS dietetic services, with higher rates of telehealth/phone treatment in major cities.

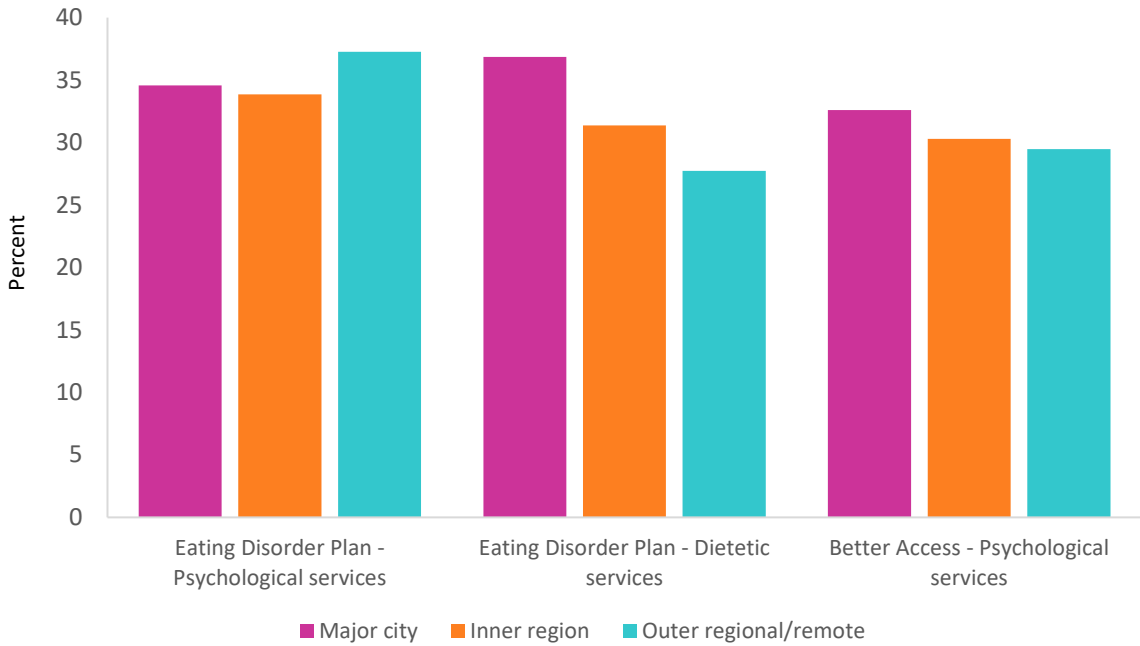


Figure 1.10. *Percent of services delivered by telehealth by treatment type and region*

The delivery of Eating Disorders MBS psychology treatment via telehealth or phone for psychological treatments increased the most in cities from 2020 to 2021, with small increases from year to year in other regions. In contrast, there were larger and more consistent increases in the use of the telehealth for dietetic services across all regions and years of the program.

The uptake of services can also be considered from the perspective of new and continuing users each year by differentiating between clients in their first year of treatment and those in their second or later treatment years (Figure 1.11). The number of new service users increased steadily from the commencement of the program through to late 2020. At this point, the initial cohort of Eating Disorders MBS clients was completing their first year and, consequently, the number of continuing users increased as a proportion of total users throughout 2021 and 2022. By the end of the study period in December 2022, the proportion of new to continuing users were similar. As discussed earlier, this may indicate that the pool of providers delivering the Eating Disorders MBS treatment services are functioning near maximum capacity, and while existing clients continue to access services over multiple years it may become increasingly difficult for new users to enter the program. These data cannot inform, however, whether community demand for the program has also peaked.

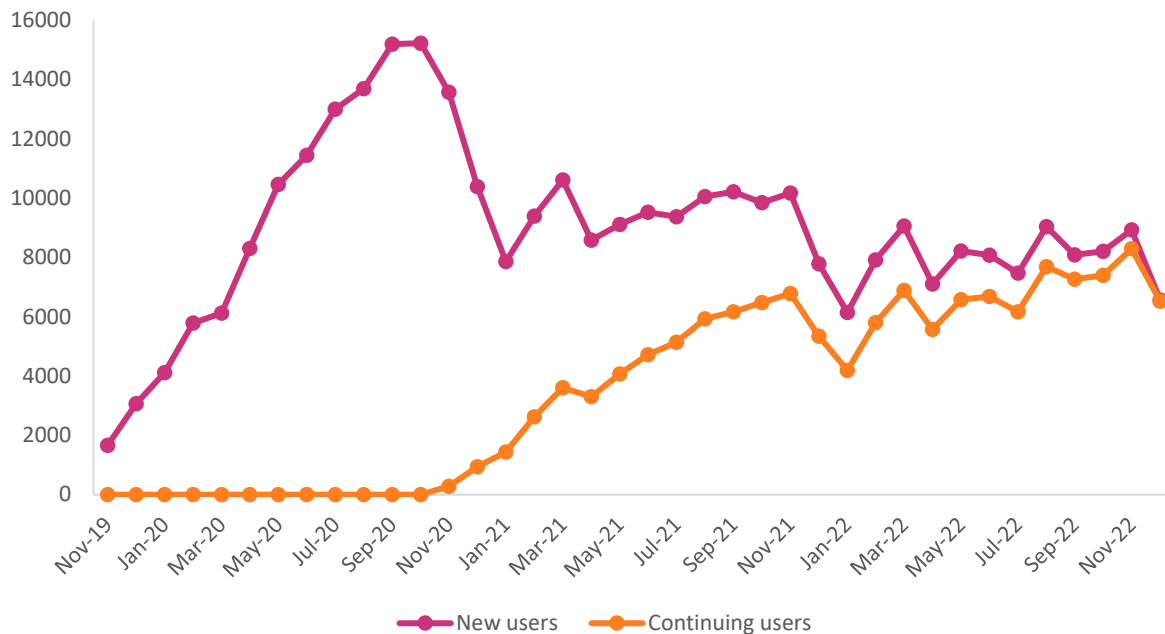


Figure 1.11. Number of Eating Disorders MBS services delivered by month, and as a function of whether person is receiving first year of service (Year 1) or beyond (Year 2+)

Uptake and utilisation of psychological and dietetic treatment services

Among all who commenced on the Eating Disorders MBS initiative, 66.4% received at least one treatment service (either dietetic or psychology) with 22.7% receiving only psychological treatment services, 14.1% receiving only dietetic services and 29.6% receiving both psychological and dietetic eating disorder treatment services.

Some people with an EDP had received psychological and dietetic services only through Better Access and the CDMP, respectively. This was more common for Better Access, where 33.5% of Eating Disorders MBS clients received psychological services through Better Access but not through Eating Disorders MBS items, and a further 44.7% received psychological treatment services through both Better Access and Eating Disorders MBS. In fact, only 7.6% of program participants relied exclusively on psychological treatment provided through the Eating Disorders MBS initiative. In total, only 14.3% of Eating Disorders MBS clients did not receive psychological treatment through either Better Access or the Eating Disorders MBS initiative.

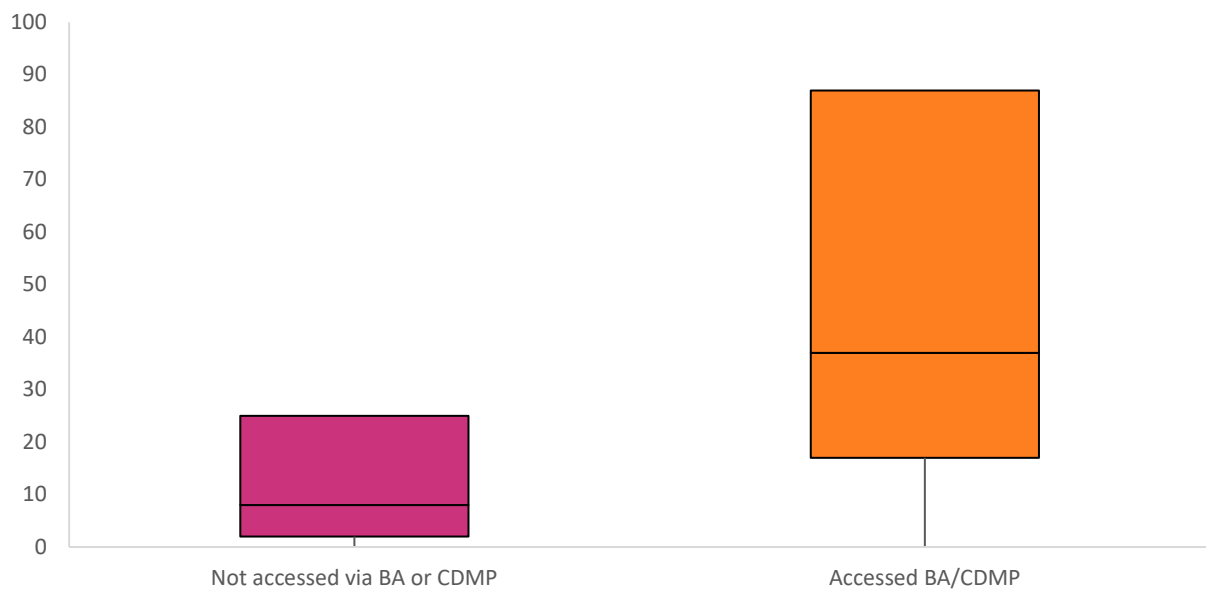
In comparison, almost half of all eating disorder clients (46.5%) received no dietetic services through either eating disorder or the CDMP. Of those who did, more (27.7% of all eating disorder clients) received dietetic treatment exclusively through Eating Disorders MBS items, 16.0% through both EDP and CDMP programs, and 9.9% through the CDMP only.

Wait time to first treatment service

Among those who accessed treatment services, the average time between obtaining an EDP and the first eating disorder treatment service was 42.6 days. However, the median was 15 days (IQR = 6 to 41 days) indicating that the mean is being inflated by outliers with very long wait times. 10% of those who received treatment waited 100 days or longer for their first treatment service.



We examined whether these long wait times for eating disorder services could be explained by service users accessing services through a different treatment plan, such as Better Access or the CDMP. Of Eating Disorders MBS service users who accessed treatments, 24.2% had used services under a Better Access plan and 5.7% had used services under a CDMP after receiving their EDP. As shown in Figure 1.12, the average time between obtaining an EDP and first eating disorder treatment service was shorter among those who only utilised Eating Disorders MBS services, with a mean wait time of 27.5 days, median of 10 days and IQR of 4 to 27 days. Meanwhile, those who used services under another scheme (Better Access or CDMP) had longer wait times between their plan and their first Eating Disorders MBS treatment service. For these individuals, the average eating disorder treatment wait time was 82.6 days, the median was 39 days, and the IQR was 19 to 89 days. This indicates that for some users, their apparent long wait time to first treatment service is artificially inflated as they received services through a pre-existing Better Access plan before commencing Eating Disorders MBS treatment services.



Note. BA = Better Access, CDMP = Chronic Disease Management Plan.

Figure 1.12. Wait time from initial EDP to first treatment, according to whether the service user accessed treatments claimed through Better Access or CDMP

Treatment duration

Among all individuals with a treatment plan, the average number of treatment services used over the full study period was 12.7 with a median of five treatments (IQR = 0 to 17 treatment services). A large proportion (32.7%) did not use any treatment services, and a small proportion (< 1%) used 100 or more treatments within the study period. The following section examines how services were used relative to the time since first EDP.

To better understand the patterns of Eating Disorders MBS treatment service use over time, we conducted another analysis restricted to a subset of cohorts ('in scope') who were observed in the PLIDA dataset for at least 12 months ($n = 25,564$, commencing prior to 1 January 2022), 24 months (n



= 14,694, commencing prior to January 2021), and 36 months ($n = 2,456$, commencing prior to 1 January 2020) after their first EDP.

The number of people accessing psychological and dietetic treatment services in each consecutive treatment year is presented in Figure 1.13. Within the first year of treatment, 55.6% received psychological treatment services, and 43.0% received dietetic treatment services. The average number of psychology treatments (12.9) was higher than the average number of dietetic treatments (7.5), but a greater proportion of the cohort received the maximum number of subsidised dietetic treatments under the eating disorder program ($n = 20$; 2.2% of the cohort) compared to the maximum number of subsidised psychology treatments ($n = 40$, 0.6% of the cohort).

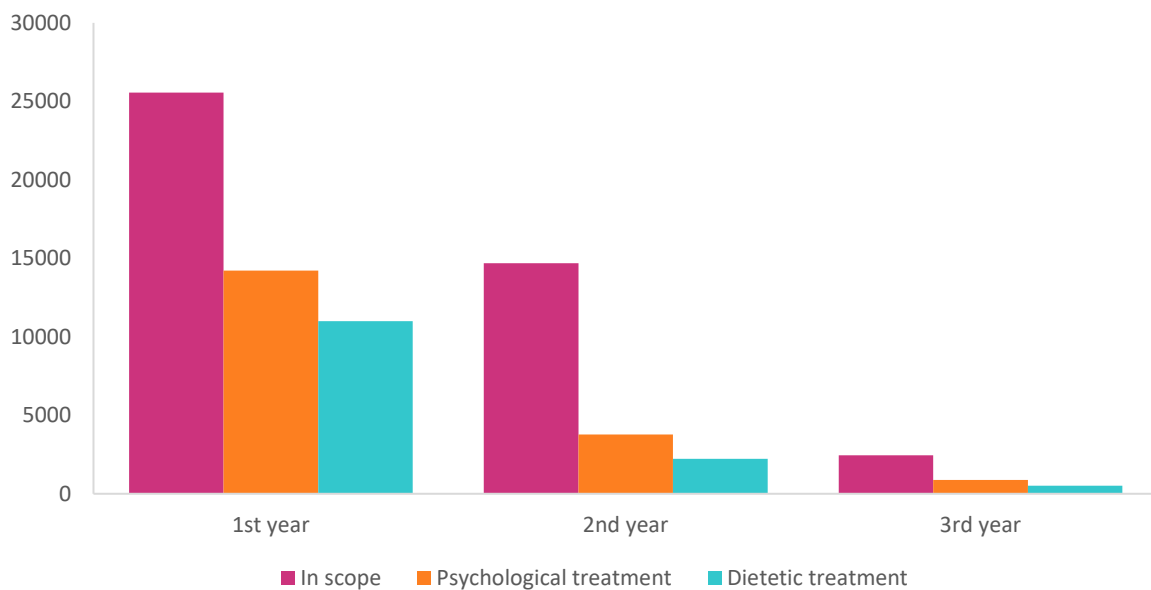


Figure 1.13. Number of individuals accessing eating disorder treatment by time in program

The proportion of service users accessing treatment in the second year since their first EDP reduced to 25.7% for psychological treatments and 15.2% for dietetic treatments. However, among those who did access treatment services, the mean number of psychological and dietetic treatment services accessed increased to 13.4 and 8.0, respectively. The distribution of service use over time is shown in Figure 1.14. The proportion of service users in their second year of treatment accessing the maximum number of subsidised sessions was higher compared to the first year, with 0.59% of the cohort receiving 40+ psychological services and 0.9% using 20+ dietetic services in the second year of treatment.

Only a small number of eating disorder clients were in scope for the third year of services. However, among those who had the opportunity to provide a full third year of data, 35.5% accessed psychological services, and 20.5% accessed dietetic services in the third year. The mean number of services used was fairly consistent with previous years, with clients on average using 13.9 psychological treatment services and 8.8 dietetic treatment services on average.

Across all three years, on average, fifty percent of those who received services received 10 or more psychological treatment services and six or more dietetic treatment services. Among these, the top 25% of users received 20 or more psychological treatment services and 12 or more dietetic services.

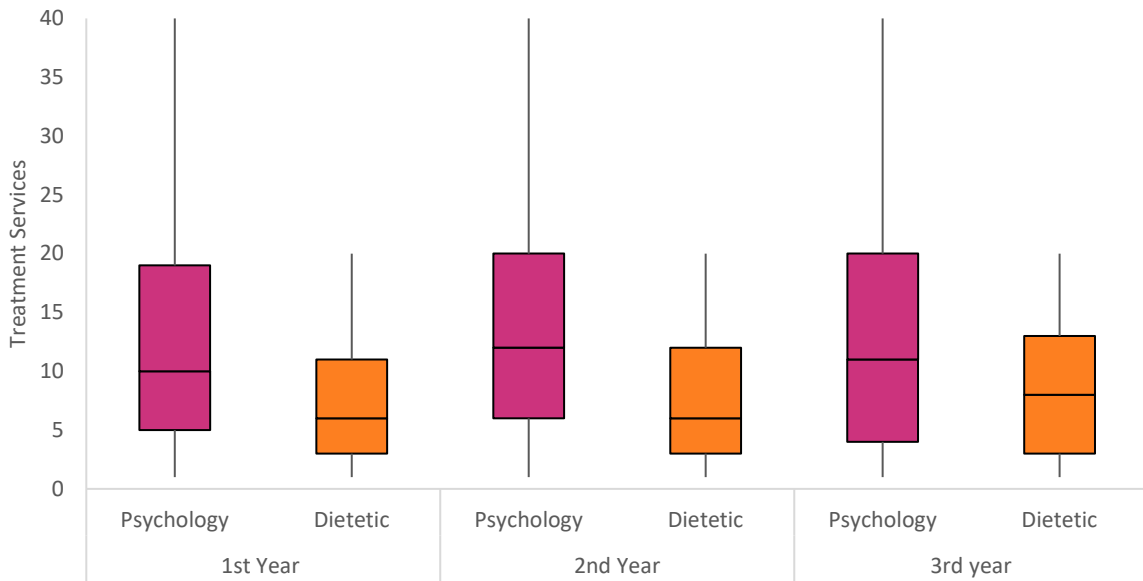


Figure 1.14. Number of treatment services claimed by year of treatment among treatment users

Overview of eating disorder treatment providers

Eating Disorders MBS treatment services may be provided by clinical psychologists, registered psychologists, social workers, occupational therapists, GPs or other medical professionals, and dietitians. Eating disorder patients may see multiple provider types over the course of their treatment. As stated previously, nearly one-third of individuals with an EDP did not receive any treatment. Among those who did receive at least one treatment, most (52.0%) received treatment from only one provider type. A large proportion (41.6%) received treatment from two provider types. Only 7.4% received treatment from three or more providers. Figure 1.15 shows the number of users by provider type.

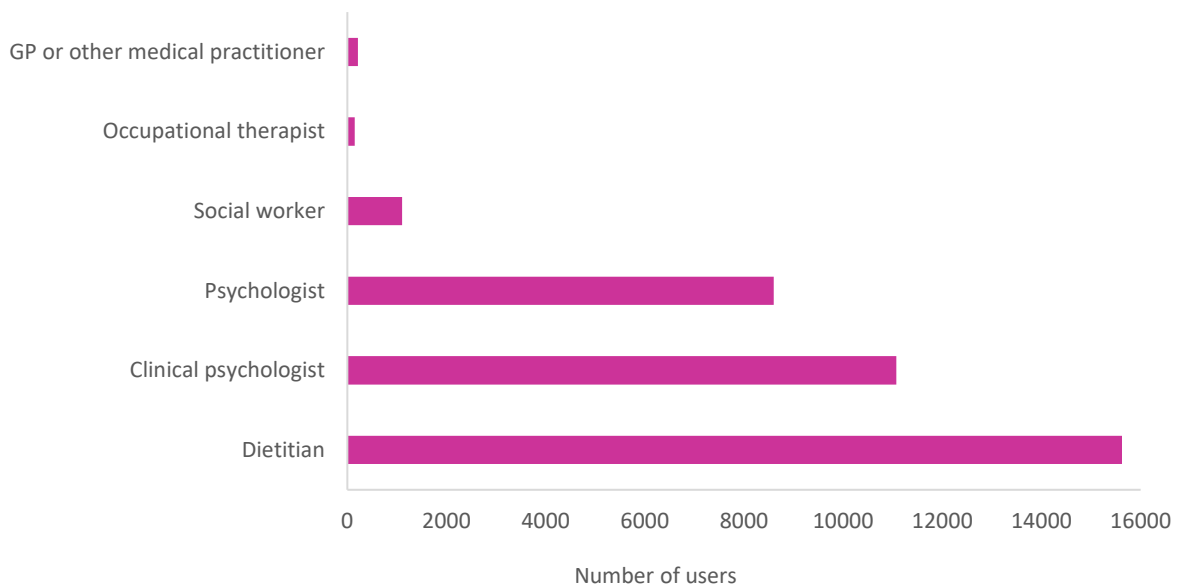


Figure 1.15. Number of individuals accessing treatment through each provider type



Among those who did receive treatment, two-thirds (66.1%) saw a dietitian as part of their treatment. Psychological treatment was more common but could be provided by different provider types. Most psychological treatment was provided by either a clinical (46.9%) or a registered psychologist (36.4%). Psychological treatment was also provided in part by social workers (4.7%), occupational therapists (0.6%), and GPs and or other medical professionals (0.91%). Figure 1.16 shows the proportion of service users who received treatment from multiple types of providers.

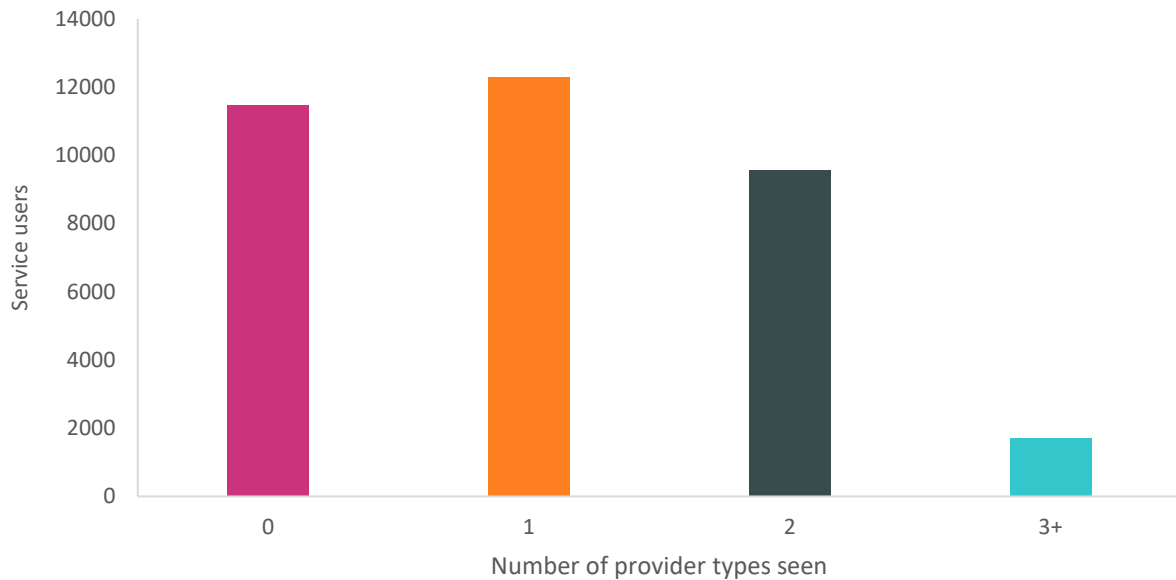


Figure 1.16. Number of individuals accessing treatment by number of provider types seen

Delivery of psychological treatment services

Psychological services were provided by 5,146 different providers from November 2019 to December 2022, providing 330,376 eating disorder psychosocial services. This increases to 572,147 services when including claims made under the Better Access scheme for those with an EDP. The mean number of Eating Disorders MBS services provided per practitioner was 64.2 (median = 18, IQR = 6 to 53), increasing to a mean of 111.2 services (median 51.5, IQR = 24 to 113) when including Better Access claims. The difference between the mean and median services provided indicates that the mean is skewed by a small proportion of practitioners delivering a large number of services.

The skew in service provision is demonstrated in Figure 1.17. We categorise providers into five categories based on the total number of eating disorder psychology services they had delivered: 10 or fewer, between 11 and 20, 21 to 149 services, 150 to 279 services, and 280 or more services. For each of these categories of service providers, Figure 1.17 shows the percent of overall eating disorder psychological services that were delivered by that group and the percent of providers in that group. For example, looking at the similarly coloured areas at the top of each of the bars shows the characteristics of providers who delivered 280 or more psychological treatment services. The first bar demonstrates that almost half of all eating disorder psychology services (46.4%) are delivered by this group, but as shown in the second bar, that it represents just 5.1% of eating disorder psychology providers. That is, over 153,000 services were delivered by just 260 providers (see Table 1.8). At the other end of the distribution, Figure 1.17 describes providers who delivered 10 or fewer eating



disorder psychology services, showing that this group of providers delivered less than three percent of total eating disorder psychology services (2.8%) but comprises 38.1% of the providers: that is, 9,201 services by 1,960 providers (each provider delivering less than 10 services each over the three years of data available). The disparity in experience and familiarity of the different providers with the Eating Disorders MBS items initiative means that more than half of all eating disorder providers (54.4%) delivered 20 or fewer services in total and only 6.7% of all services, while the top 10% of providers who delivered 150 services or more accounted for 62.2% of all provided services. These figures were not markedly changed when Better Access psychology services were also considered. The 1,960 providers who delivered 10 or fewer Eating Disorders MBS psychology services still only provided 26.3 combined Eating Disorders MBS and Better Access psychology services on average (median = 21, IQR = 10 to 36 services), and 530 providers had still delivered 10 or fewer services total psychology (Eating Disorders MBS or Better Access) treatment sessions.

While across all 5,146 Eating Disorders MBS items psychology providers the average number of eating disorder clients was 4.7 (median = 2, IQR = 1 to 4), a small number ($n = 53$) of Eating Disorders MBS items psychology treatment providers had 50 or more clients at an average of 80.3 (median = 72, IQR = 61 to 84).

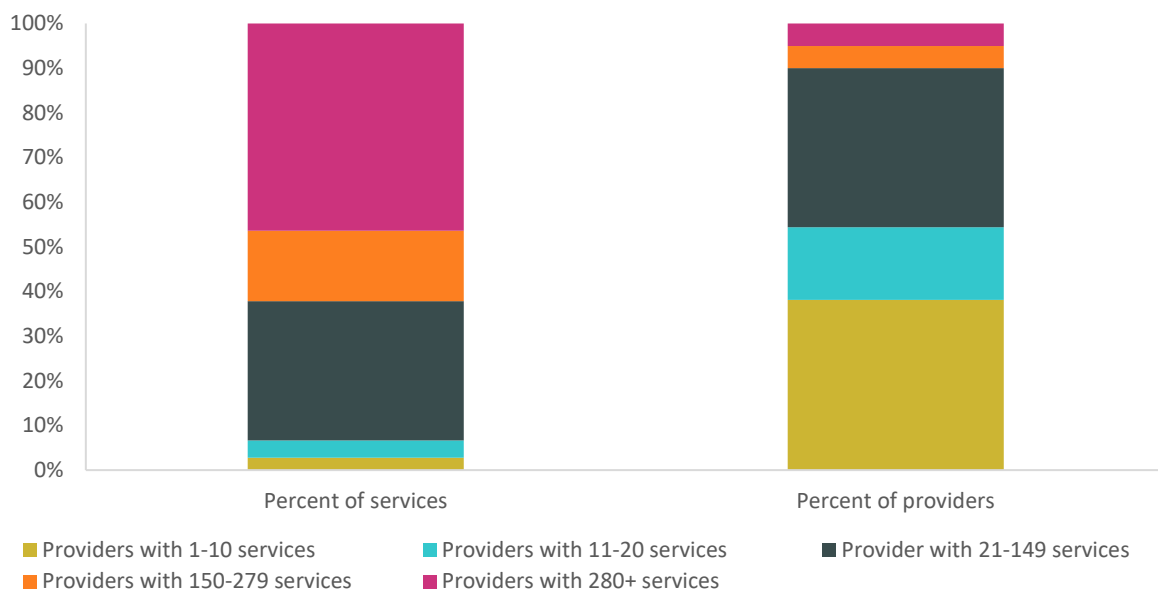


Figure 1.17. *Eating Disorder psychology providers: percent of services versus providers*

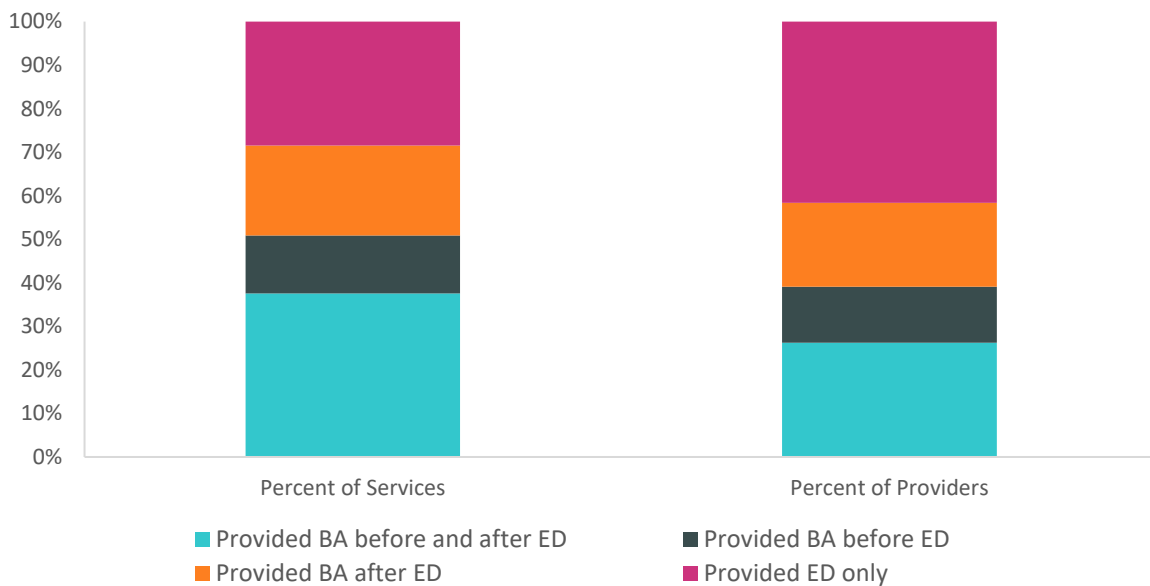
Table 1.8. Eating disorder psychology providers: number of providers and number of services

Providers who delivered:	Number of providers	Number of services
1 to 10 eating disorder services	1,960	9,201
11 to 20 eating disorder services	837	12,817
21 to 149 eating disorder services	1,836	102,983
150 to 279 eating disorder services	253	52,103
280 eating disorder services or more	260	153,272



The diversity of psychological treatment service providers is also evident in the distribution of number of clients being seen by providers. Over 99% of eating disorder psychology providers also delivered Better Access funded services. There were 19,931 unique recipients of eating disorder psychological services in the dataset, who had 24,349 relationships with providers (some received psychological services from more than one provider). Of these 24,349 client-provider relationships, 10,136 (41.6%) involved delivering only Eating Disorders MBS items psychological services, 4,671 (19.3%) involved delivery of Better Access treatment after receiving an Eating Disorder Plan, 3,128 (12.3%) involved delivering Better Access treatment prior to commencing use of Eating Disorders MBS items, and 6,394 (26.3%) involved delivering psychological treatment services through Better Access before and after commencing use of Eating Disorders MBS items. While making up 42% of the provider-client relationships, those who only delivered Eating Disorders MBS services comprised 93,989 Eating Disorders MBS services (28.5% of all Eating Disorders MBS psychological services), while those who only delivered Better Access after commencing use of Eating Disorders MBS items accounted for 68,291 services (20.7%), those who only provided Better Access services before Eating Disorders MBS item use delivered 43,867 Eating Disorders MBS services (12.9%) and those who provider Better Access psychology services before and after the client commenced use of Eating Disorders MBS items delivered 124,229 Eating Disorders MBS psychology services (37.6%).

Clients with a longer-term relationship with their psychology treatment provider received more services on average. The average number of Eating Disorders MBS psychology treatment services received was 9.3 for clients who only saw their provider through the Eating Disorders MBS items initiative, 14.0 for those who had a relationship with their provider through Better Access prior to commencing use of Eating Disorders MBS items, 14.6 for those who went on to receive Better Access treatment from their provider after commencing use of Eating Disorders MBS items, and 19.4 for clients who received Better Access treatment services from their provider prior to and continued after commencing use of Eating Disorders MBS items.



Note. ED = Eating Disorders MBS, BA = Better Access

Figure 1.18. Proportion of provider-client relationships offering Better Access and eating disorder psychological services



Delivery of dietetic treatment services

A total of 1,343 providers delivered dietetic treatment services from November 2019 to December 2022, providing 145,144 dietetic services under the Eating Disorders MBS items initiative, increasing to 165,258 services when including claims made under CDMP. The average number of Eating Disorders MBS services provided per individual provider was 108 (median = 19, IQR = 5 to 72) or 125.1 (median = 27, IQR = 9 to 93) when including CDMP claims.

Dietetic treatment services also showed a skew in the number of services provided, depicted in Figure 1.19. Again, we categorise providers into five groups based on the number of services delivered (see Table 1.9). Similar to the psychology treatment providers, Figure 1.19 shows how just 5% of eating disorder dietetic providers delivered almost half (47.7%) of all eating disorder dietetic treatment services, while 39.9% of providers delivered only 1.6% of overall dietetic treatment services.

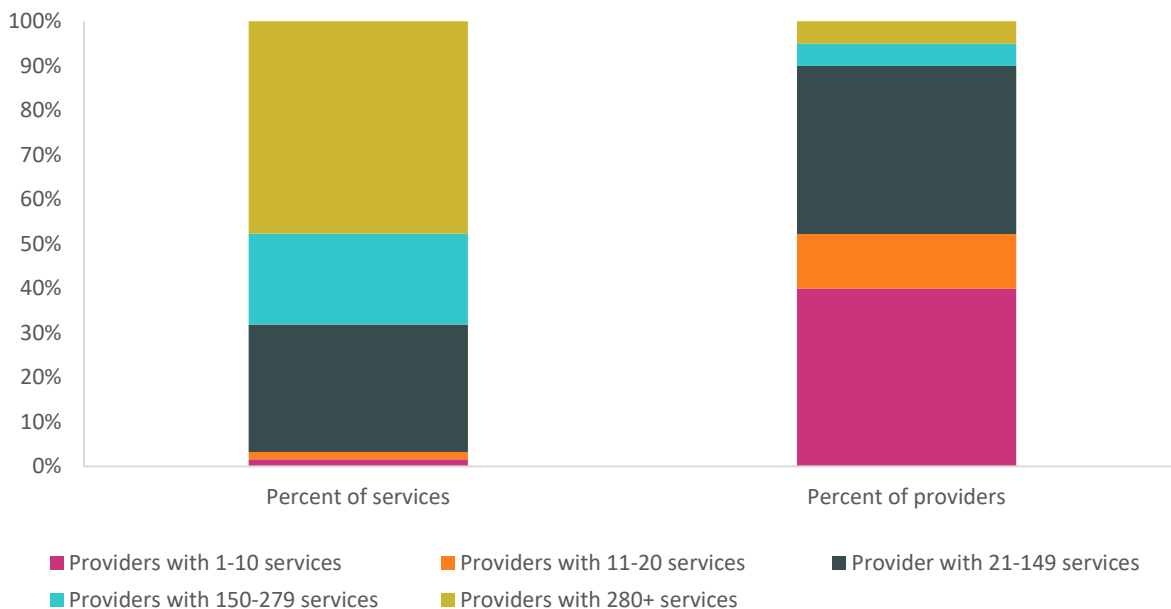


Figure 1.19. Eating Disorder dietetic providers percent of services versus providers

Table 1.9. Eating disorder dietetic providers: Number of providers and number of services

Providers who delivered:	Number of providers	Number of services
1 to 10 eating disorder services	536	2,264
11 to 20 eating disorder services	165	2,487
21 to 149 eating disorder services	507	41,454
150 to 279 eating disorder services	67	29,710
280 eating disorder services or more	68	69,229

Similar to psychological services, analysis of eating disorder dietetic services showed that a minority of service providers delivered the majority of services and saw the majority of eating disorder clients. There were 16,653 recipients of dietetic services in the dataset, with 19,571 relationships with providers (some clients received dietetic services from multiple providers). Across all dietetic

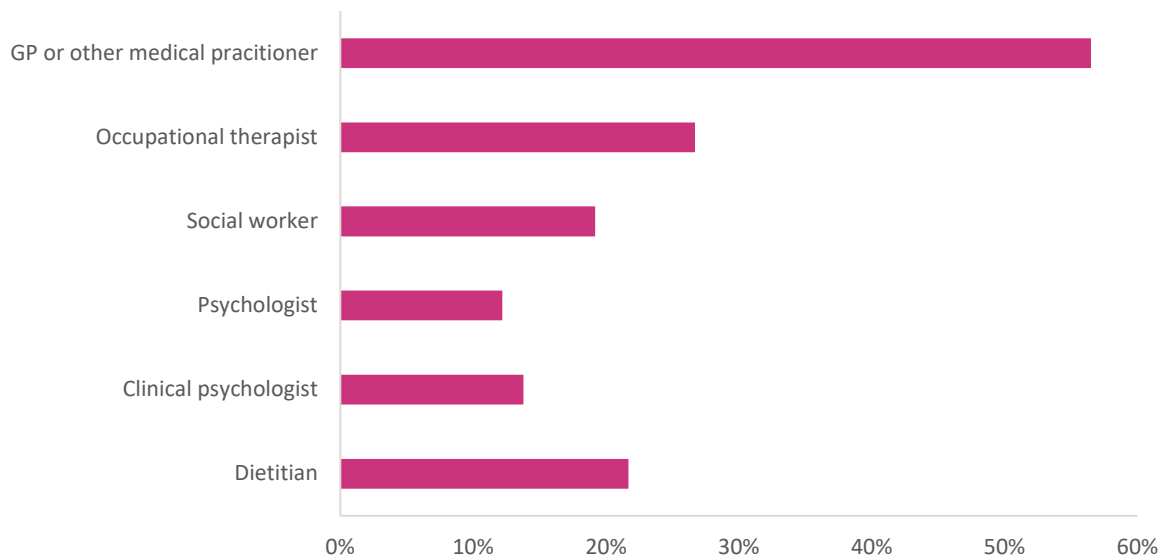


providers, the average number of clients seen was 14.6 (median = 4, IQR = 1 to 13). However, 108 dietetic treatment service providers had 50 or more clients (an average of 96.2 clients, median = 86, IQR = 64 to 115).

Treatment costs

The majority of Eating Disorders MBS treatment services incurred out-of-pocket costs, as only 15 – 16% of services are bulk billed on average. The cost of psychological treatment services varied by provider type. As shown in Figure 1.20, clinical psychologists and psychologists have the lowest rate of bulk billing/zero out-of-pocket costs, with GPs/other medical practitioners having the highest rates. Figure 1.21 presents data on the average out-of-pocket costs by profession when including or excluding those with no out-of-pocket costs.

The figures show how bulk billing rates influence the total average cost (being lowest for GPs and other medical practitioners and highest for psychologists and clinical psychologists), but that there is less variation when the cost of those who incur a cost is considered. While GPs, other medical practitioners, and occupational therapists were more likely to provide treatment at no cost, those who did charge out-of-pocket costs charged similarly to clinical psychologists. Psychologists tended to charge higher out-of-pocket costs than clinical psychologists, which may be due to psychologists receiving a smaller Medicare rebate for their services relative to clinical psychologists.



Note. GP = general practitioner.

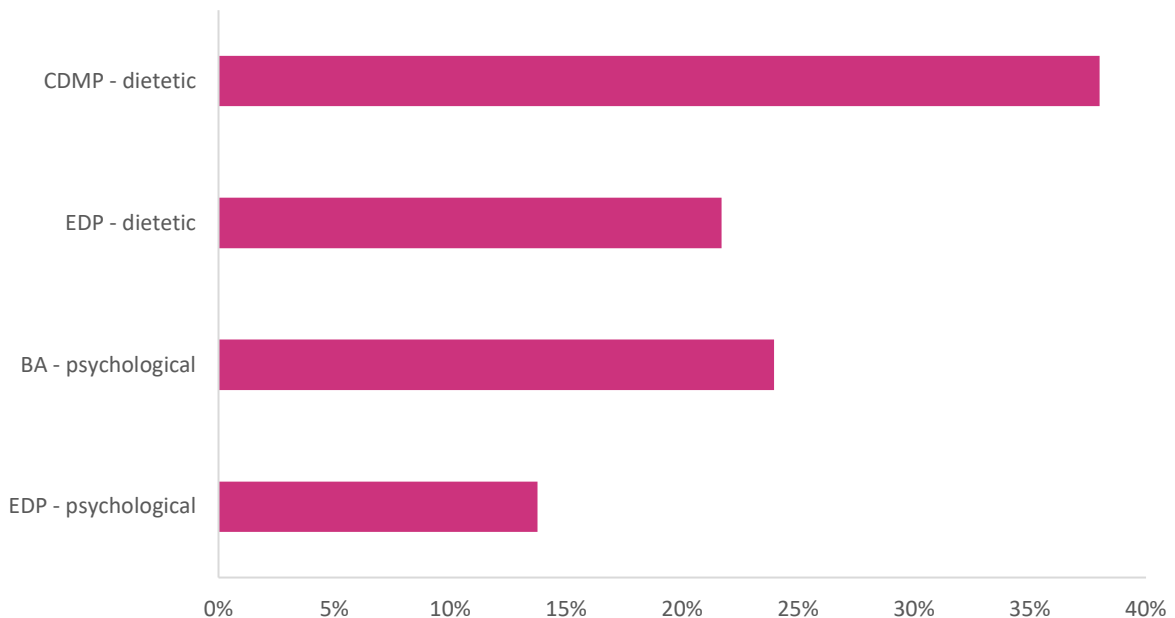
Figure 1.20. Percentage of Eating Disorders MBS psychological services provided at zero out-of-pocket cost from client, by profession



Note. GP = general practitioner, OMP = other medical practitioner.

Figure 1.21. Average out-of-pocket costs by profession when including or excluding those with no out-of-pocket costs

Compared to related services provided through Better Access (psychological) and the CDMP (dietetic), Eating Disorders MBS treatment services were less likely to be provided at no cost to the client (Figure 1.22). However, among those who do pay out-of-pocket costs for related services, the cost per treatment is slightly lower on average for those receiving services through the Eating Disorders MBS items initiative (Figure 1.23).



Note. CDMP = chronic diseases management plan, EDP = Eating Disorders MBS, BA = Better Access, psychological = psychological treatment services, dietetic = dietetic health services

Figure 1.22. Percent of eating disorder and related service users with no out-of-pocket costs



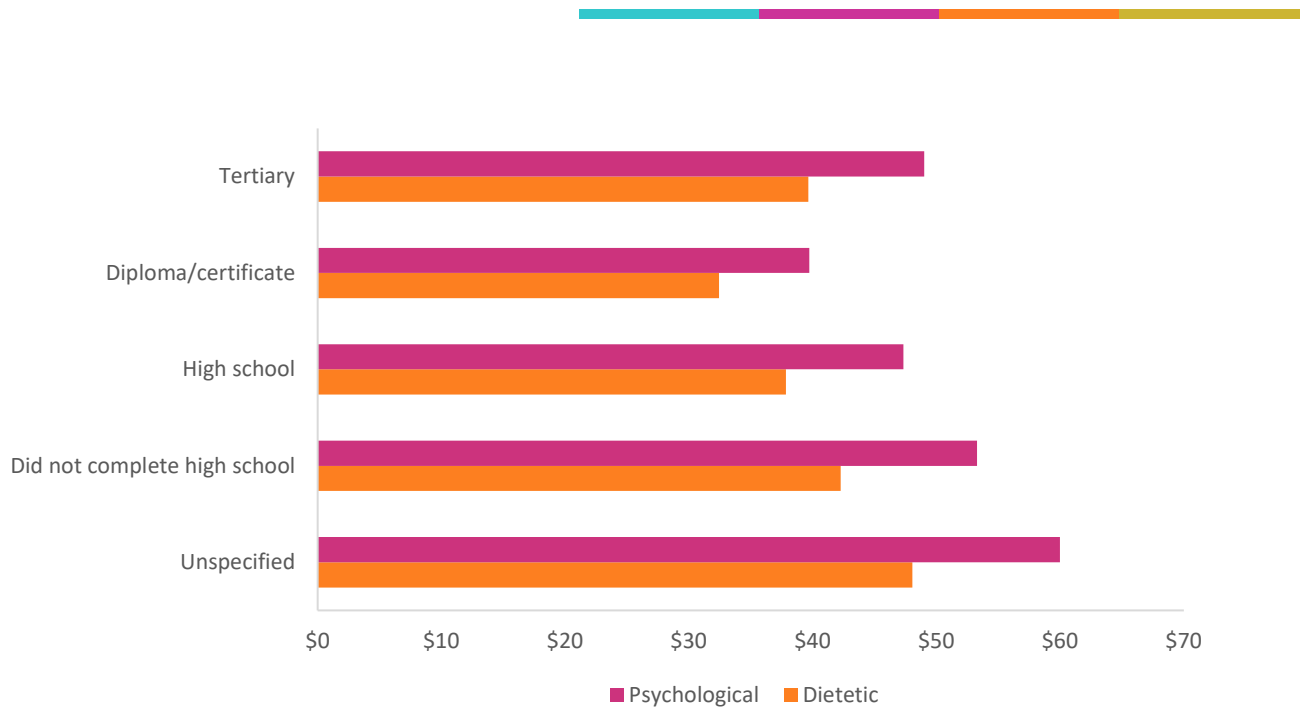
Note. CDMP = chronic diseases management plan, EDP = Eating Disorders MBS, BA = Better Access, psychological = psychological treatment services, dietetic = dietetic health services

Figure 1.23. Average treatment cost for eating disorder and related service users, including or excluding those with no out-of-pocket costs

Treatment costs by service user characteristics

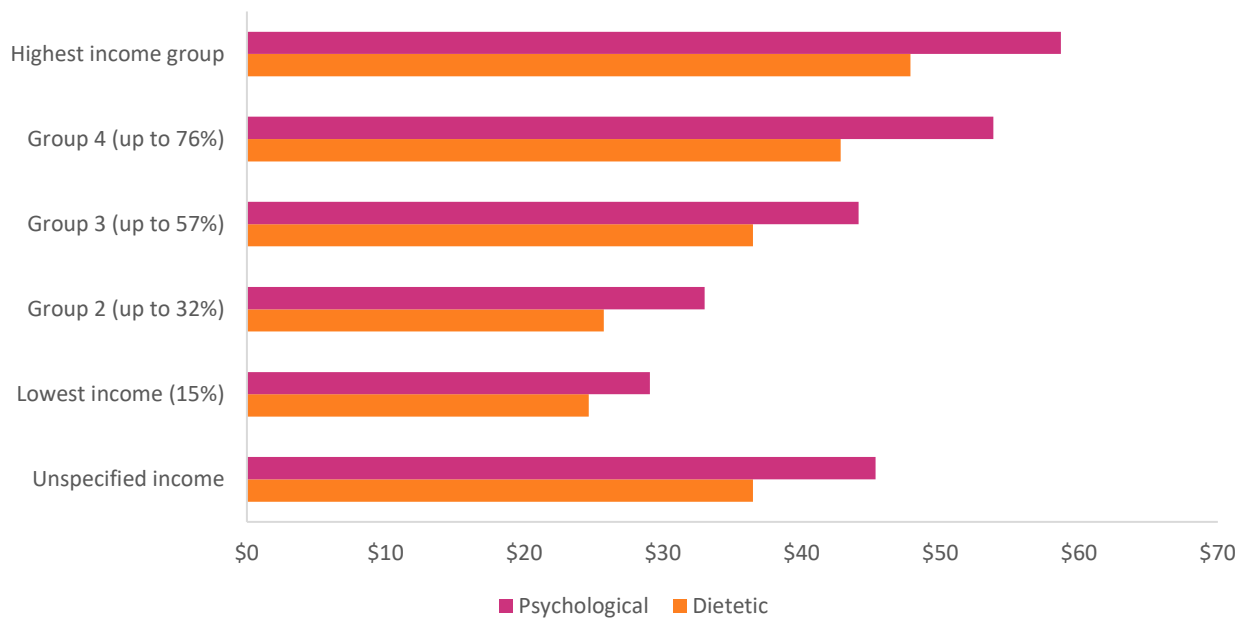
Figures 1.24 to 1.28 show the average out-of-pocket cost of psychological and dietetic treatments based on the client’s education, equivalised household income, employment status, age, and region. Costs for psychological treatment services were consistently higher than costs for dietetic services. Average treatment costs were higher for those with a tertiary education, those with higher equivalised household incomes, the employed, and younger service users. The results suggest the most disadvantaged clients are likely to be charged less by their Eating Disorders MBS providers, potentially reducing barriers to effective treatment. However, Figure 1.19 shows that the youngest clients were charged the highest rates. These categories were dominated by service users under 18 years of age, suggesting that these higher costs are due to having a parent paying for services. Subsequent analysis showed that those in the youngest (under 18) age group had the highest household income, suggesting the higher treatment charges reflected parental income.

When considering area differences (Figure 1.20), people living in remote or very remote regions had the highest average cost for psychological treatments, while those living in major cities paid the most on average for dietetic treatments. Costs were lowest for those living in outer regional areas, for individuals with a diploma or certificate as their highest level of educational attainment, those in the lowest income group, those not in the labour force, and those aged 50 years or older.



Note. Psychological = psychological treatment services, Dietetic = dietetic health services

Figure 1.24. Average out-of-pocket treatment costs by educational qualifications and treatment type



Note. Psychological = psychological treatment services, Dietetic = dietetic health services

Figure 1.25. Average out-of-pocket treatment costs by equivalised household income group and treatment type



Note. Psychological = psychological treatment services, Dietetic = dietetic health services
Figure 1.26. Average out-of-pocket treatment costs by labour force status and treatment type



Note. Psychological = psychological treatment services, Dietetic = dietetic health services

Figure 1.27. Average out-of-pocket treatment costs by age and treatment type

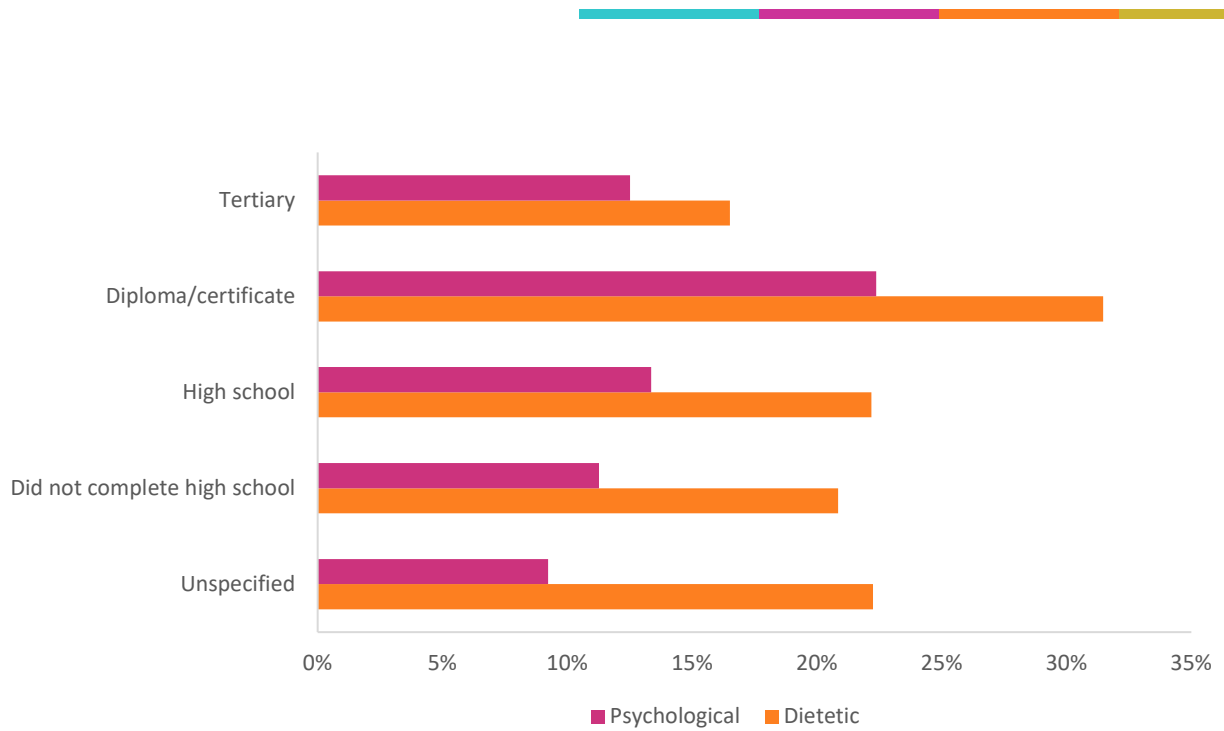


Note. Psychological = psychological treatment services, Dietetic = dietetic health services

Figure 1.28. Average out-of-pocket treatment costs by region

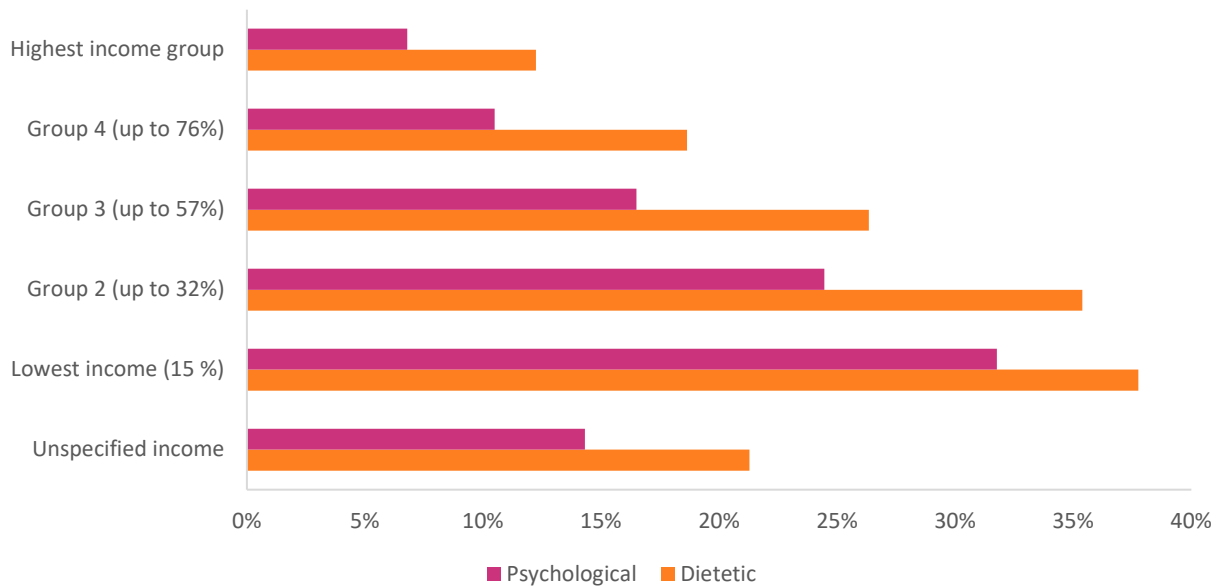
The percentage of services provided with no out-of-pocket costs also varied by service user characteristics. These are shown in Figures 1.29 to 1.33. There was a higher proportion of treatment services being provided at no out-of-pocket cost for dietetic as compared to psychological Eating Disorders MBS services. Otherwise, psychological and dietetic services showed similar trends in who was more likely to receive treatment at no cost. While those with a diploma or certificate level of education were the most likely to receive psychological treatment at no cost, they were the least likely to receive dietetic treatment at no cost.

Those most likely to receive treatment at no cost were those with a diploma/certificate, those in the lowest income group, those who were not in the labour force for psychological treatment or unemployed for dietetic treatment, those aged 50 years or older, and people living in outer regional areas.



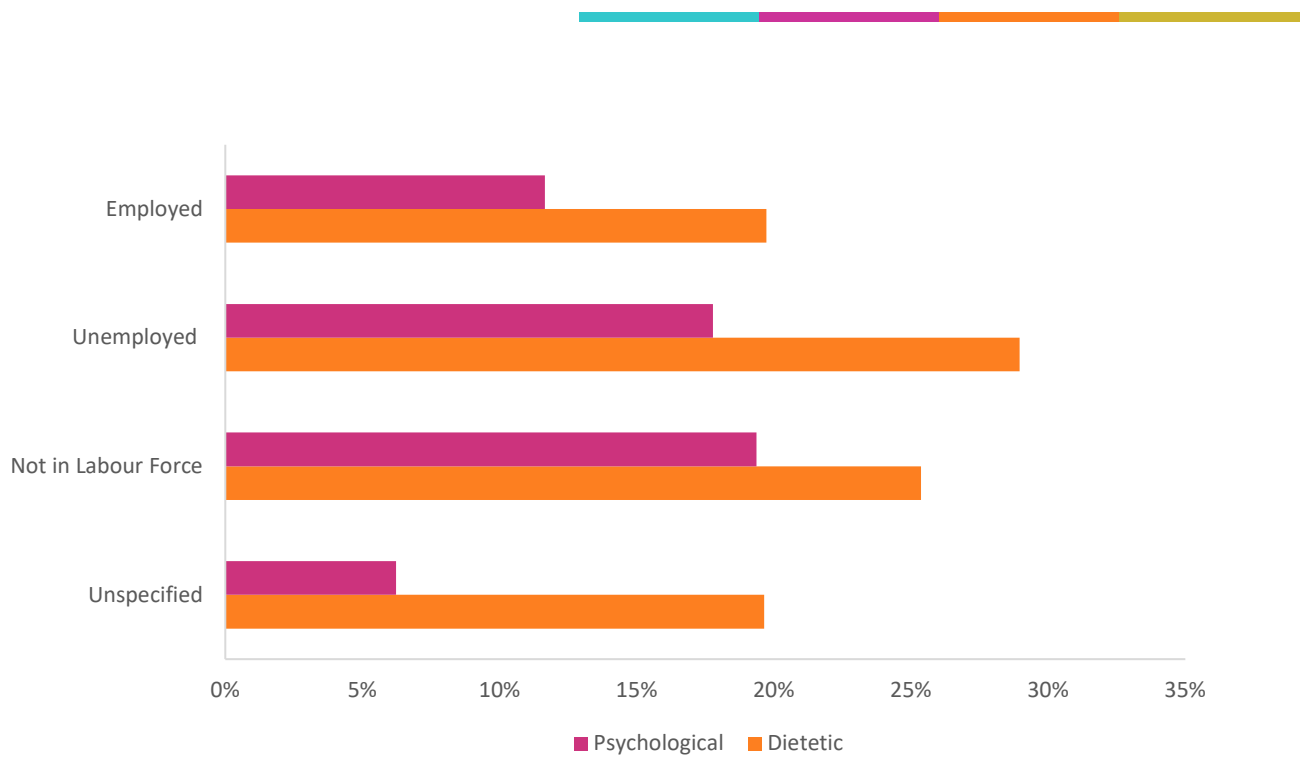
Note. Psychological = psychological treatment services, Dietetic = dietetic health services

Figure 1.29. Percentage of treatment services provided at no out-of-pocket cost by education level and treatment type



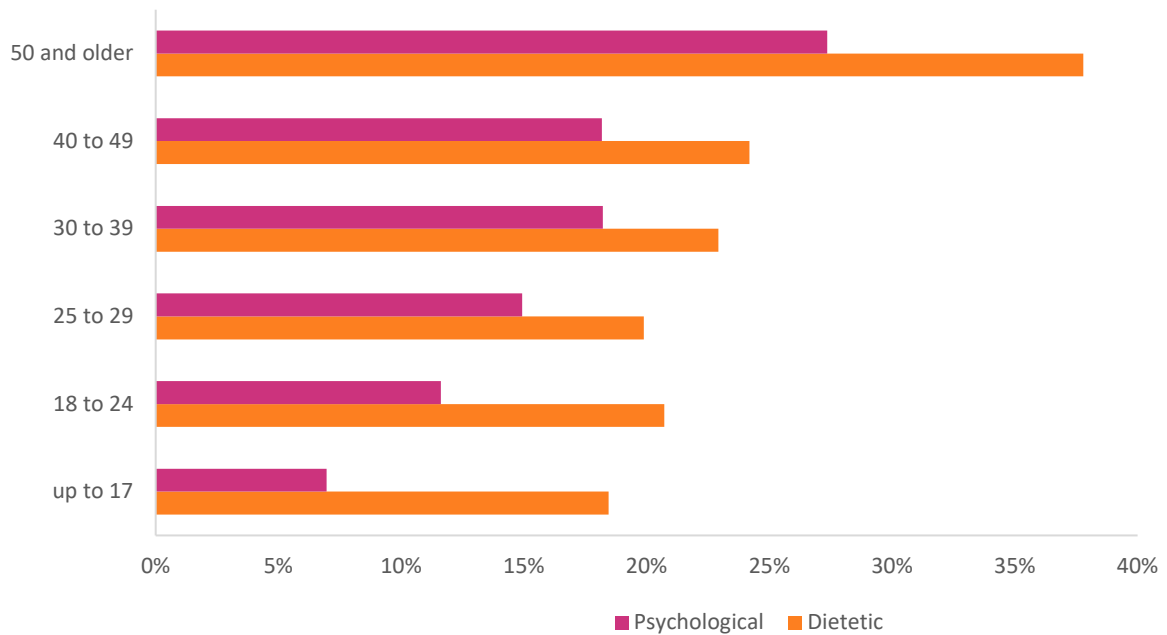
Note. Psychological = psychological treatment services, Dietetic = dietetic health services

Figure 1.30. Percentage of treatment services provided at no out-of-pocket cost by equivalised household income group and treatment type



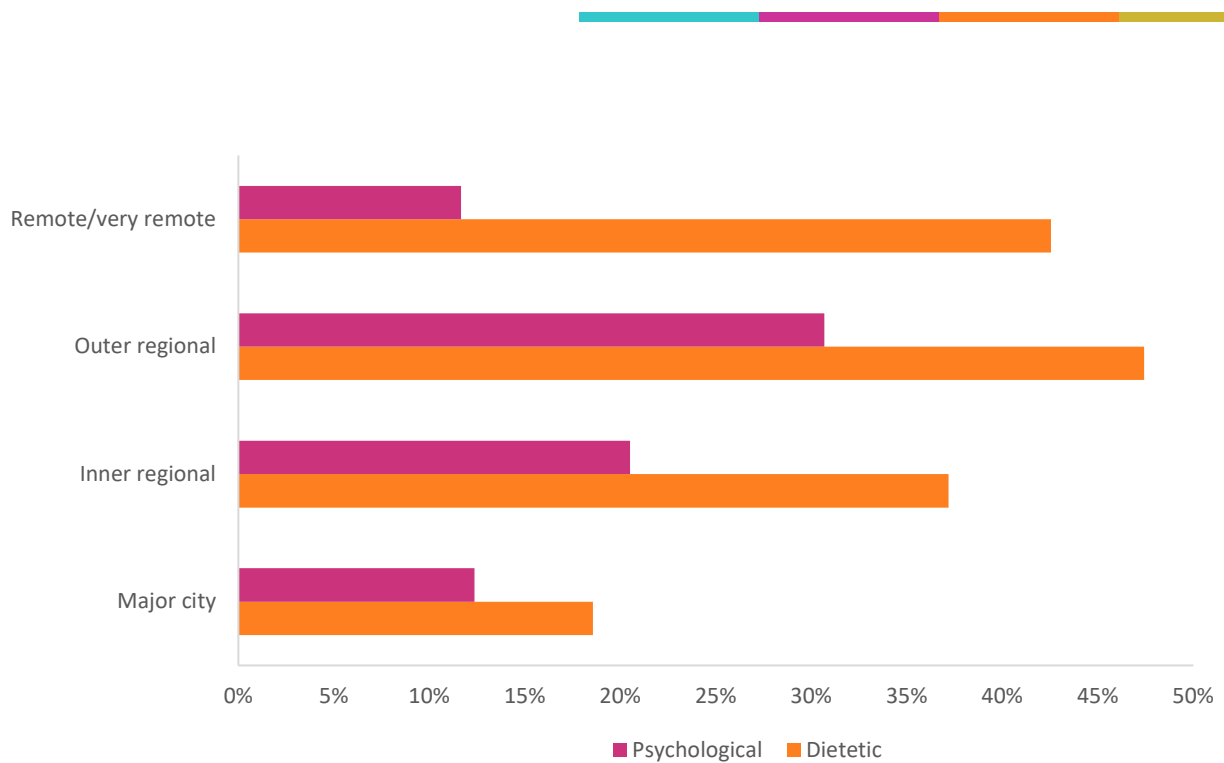
Note. Psychological = psychological treatment services, Dietetic = dietetic health services

Figure 1.31. Percentage of treatment services provided at no out-of-pocket cost by labour force status and treatment type



Note. Psychological = psychological treatment services, Dietetic = dietetic health services

Figure 1.32. Percentage of treatment services provided at no out-of-pocket cost by age and treatment type



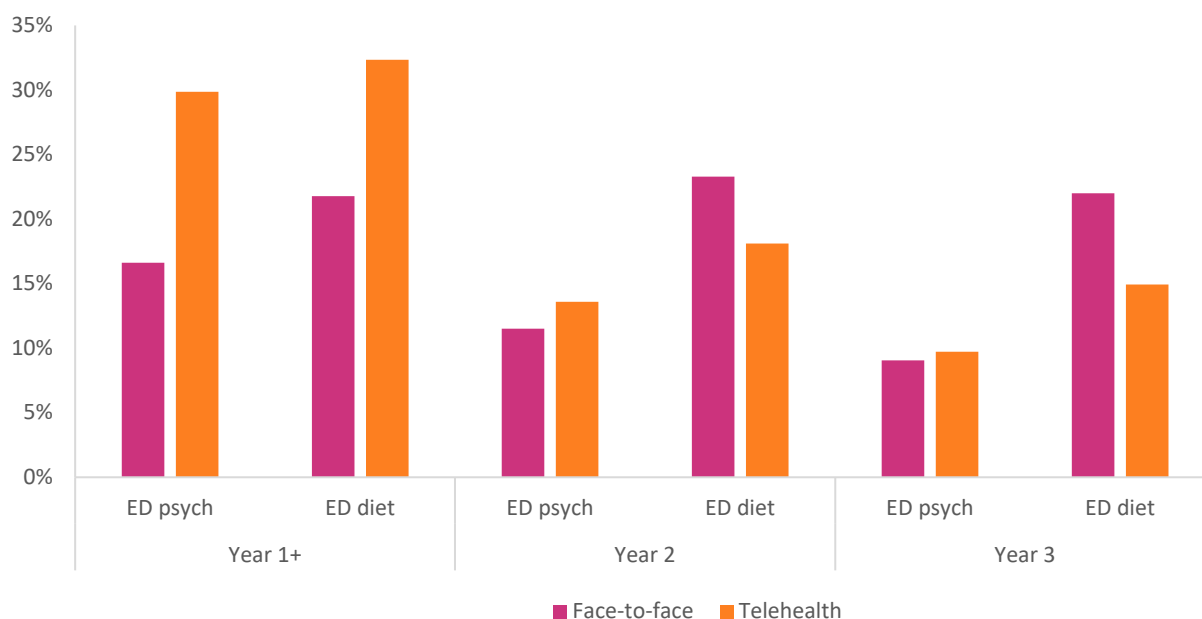
Note. Psychological = psychological treatment services, Dietetic = dietetic health services

Figure 1.33. Percentage of treatment services provided at no out-of-pocket cost by region and treatment type

Cost of telehealth

The final report from the Productivity Commission’s Mental Health inquiry noted that the expansion of telehealth mental health treatment services would increase access and may reduce patient costs ⁵.

Figure 1.34 presents data on the percentage of Eating Disorders MBS psychological and dietetic services that were bulk billed/incurred zero cost to the patient, stratified by whether they were delivered face-to-face or via telehealth/telephone in each year. At the beginning of the program in 2020, telehealth services were more likely than face-to-face services to be provided at zero cost to the patient than face-to-face treatments. However, from 2021 onwards, there was no difference in the percentage of zero cost treatment services provided via telehealth or face-to-face for psychological services, and there were fewer zero cost dietetic treatment services provided via telehealth than face-to-face from 2021 onwards. This suggests that while telehealth still provides additional modes of treatment, the cost benefit quickly eroded over time.



Note. ED Psych = Eating Disorders MBS psychological treatment services, ED diet = Eating Disorders MBS dietetic health services

Figure 1.34. Percentage of psychological and dietetic services provided at zero cost to the patient by delivery mode and year. Year 1+ refers to November 2019 – December 2020, Year 2 refers to 2021, Year 3 refers to 2022

Treatment reviews

The treatment review process under an EDP describes how up to 40 eating disorder psychological treatments can be provided to a client in a calendar year, with reviews required at regular intervals over each 12-month period to ensure a further course of treatment is recommended. The first review, typically undertaken by a GP, takes place after 10 sessions and assesses client progress against the plan decides whether a second course of treatment is recommended. The second and third reviews are undertaken after the 20th treatment session by a GP and specialist (psychiatrist or paediatrician) respectively. The final review, after 30 treatment sessions, is again undertaken by a GP.

Some concerns have been raised that the requirement for regular reviews, and in particular, difficulty arranging a specialist review after 20 sessions, may represent a roadblock that causes clients to prematurely exit the program. We found evidence of a steep drop in the overall number of psychology services received by Eating Disorders MBS clients at 12-months following the preparation of a plan in our analysis of treatment service use in the first 12-months. Therefore, understanding clients’ experiences with the review process is potentially critical.

The PLIDA data reveal that 73.8% of Eating Disorders MBS service users did not receive any reviews. A portion of these may be due to some in the cohort having insufficient time since commencing the program to need a review. Overall, 14.7% had received a single review, only 5.3% had received two reviews, 2.6% had received three reviews, and just 3.6% had more than three reviews. With the analysis restricted to individuals who commenced treatment prior to 2022 (and therefore had at least one full year of data available), review numbers were still low, with 68.6% of clients having

received no reviews, 16.6% having one review, 6.5% having two reviews, 3.4% having three reviews, and only 4.8% of these long-term clients having received four or more reviews (see Table 1.10).

Review preparation

In total, 20,542 reviews had been prepared for 9,989 people who obtained at least one review. The majority of reviews were conducted by GPs (83.1%), followed by psychiatrists (13.1%), paediatricians (2.8%), and other medical professionals (1.0%). GPs and other medical professionals provided most initial reviews (90.2%) but contrary to expectations, 7.6% of initial reviews were undertaken by psychiatrists and 2.2% by paediatricians.

Table 1.10. Percentage of Eating Disorders MBS clients by number of reviews and by time since commencement

Number of reviews	% with review, full cohort *	% with review, > 12 months since commencement **
0	73.8	68.63
1	14.7	16.62
2	5.3	6.54
3	2.65	3.43
4 or more	3.55	4.78

Note. There were 20,542 reviews in total. * $n = 38,130$, ** $n = 27,772$.

A total of 3,263 specialist reviews were conducted, but these were provided to only 2,316 individuals. While most clients only received one specialist review (75.9% of clients with a specialist review), some received multiple reviews from a psychiatrist or paediatrician, with 15.4% having received two specialist reviews and 8.6% having received three or more specialist reviews.

Time to first review

As shown in Table 1.11, the first review following the first treatment plan on average occurred after: 204 days, 8.4 eating disorder psychological treatment sessions, or 10.6 treatment sessions when considering both Eating Disorders MBS and Better Access psychological treatment. Some individuals received a review prior to any treatment sessions. When these individuals were excluded, the review was typically obtained after eight to 12 sessions (median = 10).

Table 1.11. Number of days and treatment session from first Eating Disorder Plan to first review

	Number of days	Number of Eating Disorders MBS psychological treatment sessions	Number of Eating Disorders MBS and Better Access psychological treatment sessions
Mean	204.4	8.4	10.6
Median	164	9	10
25th	105	3	7
75th	251	10	12

Notes. $N = 9,889$ individuals with at least one review.



These data also show that some clients received more than 10 eating disorder psychology treatment sessions before having their first review. To assess how common this was, we considered the proportion of clients with 11 or more treatment sessions who had not had a review. There were 9,782 individuals with 11 or more treatment sessions and almost half (47.9%) had not had a review. Among those with no review, the 11th session was an average of 230 days after their initial plan (median = 180, IQR = 120 to 275), and 4,031 had been using the initiative for less than a year (indicating most did not wait 12 months to be able to continue treatment without a review).

When the analysis includes sessions of psychology treatment provided through Better Access as well as Eating Disorders MBS items after receiving an EDP, there were 14,869 individuals with 11 or more treatments, and 67.3% had not had a review. The 11th treatment session was on average 263 days after their initial plan (median = 202, IQR = 128 to 334).

When we consider the 5,058 clients who had passed the milestone for the second and third reviews (those who had received 21 or more Eating Disorders MBS psychology treatments), 24.5% (1238) had not had any reviews and 37.0% had received only one review. Of those with no reviews, there was a mean of 373 days (median = 316, IQR = 224 to 479) between their initial EDP and their 21st session, and 60.9% of these clients received their 21st psychology treatment session within 12 months of commencing use of the Eating Disorders MBS items.

In total, only 2,316 Eating Disorders MBS clients had obtained a specialist review (from a psychiatrist or paediatrician) in the study period. The timing of the first specialist review in terms of days since commencement and number of treatment sessions is shown in Table 1.12. Most individuals who obtained a review did so before their 20th psychological treatment session, with a median of 16 when counting only Eating Disorders MBS psychological treatment services, or 17 when also including Better Access services. However, a portion of individuals obtained their first review without having yet claimed any psychological treatment services.

Table 1.12. Number of days from commencement to first review with a specialist

	Number of days	Number of Eating Disorders MBS psychological treatment sessions*	Number of Eating Disorders MBS and Better Access psychological treatment sessions**
Mean	275.9	16.4	18.76
Median	221	16	17
25th	140	8	10
75th	327	20	22

*Note. n = 2,316 with a specialist review. * 260 people had a specialist review prior to any psychological treatment. ** 186 people had their first specialist review prior to any Eating Disorders MBS or Better Access psychological treatment.*

Review out-of-pocket costs

The average out-of-pocket costs for reviews differ by profession. Paediatricians had the highest out-of-pocket costs, averaging \$64.06 (SE = \$4.19), with 37.8% of reviews conducted by paediatricians being bulk billed. Psychiatrists' out-of-pocket costs were slightly lower with an average cost of \$58.20

(SE = \$1.62), but a smaller proportion of reviews conducted by psychiatrists were bulk billed (33.1%). Reviews conducted by GPs and other medical professionals were considerably less expensive, costing \$8.33 (SE = \$0.16) and \$6.64 (SE = \$2.32) on average, respectively. Most reviews conducted by GPs (74.1%) and other medical professionals (87.1%) were bulk billed.

Characteristics of clients with reviews

Of the 9,989 individuals who had received at least one review, 9,357 could be linked to the Census data to assess their characteristics in comparison to the 25,687 individuals in the census-linked sample who did not have any reviews.

Age was related to having received at least one review, with children aged eight and under and older adults aged 70 and above being the least likely to receive a review (9.0% and 8.9%, respectively). Individuals aged 18 – 24 and 25 – 29 were the most likely to receive a review (29.8% and 28.7%, respectively). Females were more likely than males to receive a review (27.8% and 15.8%, respectively). Those speaking a language other than English at home were more likely to get a review (27.1% versus 22.3%). Those with a tertiary qualification or high school only qualification were the most likely to get a review (31.2% and 29.3% respectively) while those with a diploma or certificate, or no response for education were the least likely (22.4% and 21.0% respectively). Reviews were relatively equally spread among the employed, unemployed, and those not in the labour force. First Nations individuals were approximately half as likely to receive a review compared to non-First Nations individuals (14.3% versus 27.1%). Those in major cities were much more likely than those in outer regional or remote areas to receive a review (28.3% versus 18.9%).

Table 1.13. Characteristics of Eating Disorders MBS service users with reviews compared to all Eating Disorders MBS service users

Characteristic		Eating Disorders MBS (Total)	Eating Disorders MBS with review
Age	Under 18	26.4%	25.0%
	18 to 24	29.9%	33.4%
	25 to 29	13.4%	14.4%
	30 to 39	15.4%	15.4%
	40 to 49	7.8%	6.9%
	50 to 59	4.7%	3.7%
	60 and older	2.5%	1.3%
Sex (female)		91.2%	94.8%
Language other than English		8.0%	6.7%
First Nations people		2.8%	1.5%
Remoteness	Major city	80.2%	85.1%
	Inner region	14.6%	11.2%
	Outer region/remote	5.3%	3.7%
Highest level of educational attainment	Incomplete high school	22.1%	21.1%
	Complete high school	21.8%	24.0%
	Diploma or certificate	17.8%	15.0%

Characteristic	Eating Disorders MBS (Total)	Eating Disorders MBS with review
Tertiary	25.5%	29.9%
Undefined	12.7%	10.0%

Association between reviews and cessation of treatment

It has been speculated that the need for regular reviews, especially reviews from specialists which may be harder to obtain, may provide a barrier against ongoing (and potentially necessary) treatment for many eating disorder clients. To investigate this, the figures below consider rates of client cessation in the Eating Disorders MBS items initiative based on the number of psychology treatment services received. Figure 1.35, and considering the line representing psychology treatment services received within 12-months, shows that after receiving the first treatment, 6.6% of participants receive no further treatment, and then at two treatment sessions, 5.1% of those who received two treatment sessions drop out and receive no further Eating Disorders MBS psychology treatment. While not represented on the figure, it is important to recognise (and entirely understandable) that over time as the number of completed treatment sessions increases, the number of clients who make up the group (and the number exiting the program) is declining. Thus, the first group described in the first figure below comprises 9,005 clients who completed one Eating Disorders MBS psychology session and the decline of 6.6% of clients represents 591 clients dropping out. In contrast, at the 15th session, there are 3,579 clients remaining, with 249 clients dropping out but representing 6.7% of those who remain.

Figure 1.35 contrasts the number of treatment sessions received within 12 or 18 months since commencement (noting that the requirement for reviews relates to services within 12-months from the EDP). The graph considers only Eating Disorders MBS psychological treatment (excluding Better Access psychological services). Both lines on Figure 1.35 show clear peaks, representing sharp increases in the rate of treatment cessation after 10 treatments, 20 treatments, and 30 treatments, corresponding to when reviews are due to assess whether continued treatment is recommended. Importantly, these peaks are more pronounced when considering services received during a 12-month period since commencement than when considering an 18-month period. Some of the clients in the 18-month group would have reached these milestone services in their second year on the Eating Disorders MBS items initiative (following the preparation of a new EDP) and therefore did not require a review to continue.

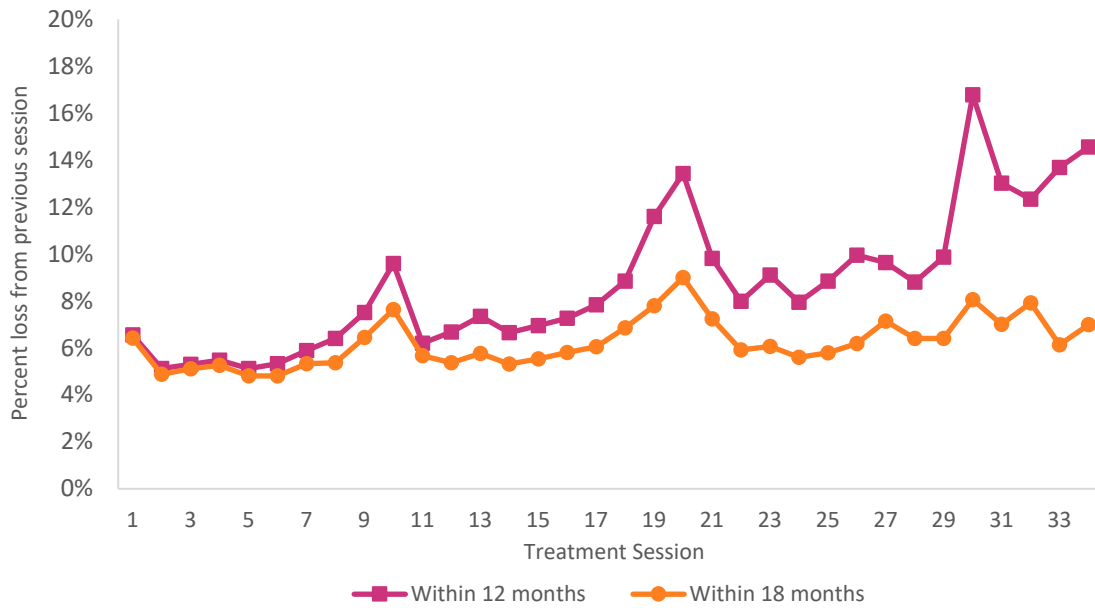


Figure 1.35. Eating Disorders MBS psychological treatment cessation rates by session number when considering first 12 or 18 months since commencement

When the analysis considered these milestones in the context of both Eating Disorders MBS and Better Access psychological treatment services, peaks in cessation rates are less defined at 10, 20, and 30 session milestones (Figure 1.36). While we understand that the timing of the reviews is based on receipt of both Better Access and Eating Disorders MBS psychological treatment sessions, it seems to be predominantly tied to Eating Disorders MBS psychology treatment sessions alone. This also raises questions about whether cessation at this point is largely self-directed based on client and provider understanding of the program, as the earlier analysis showed that many clients continue to receive Eating Disorders MBS psychology treatment services beyond these milestone points despite not having the requisite reviews.

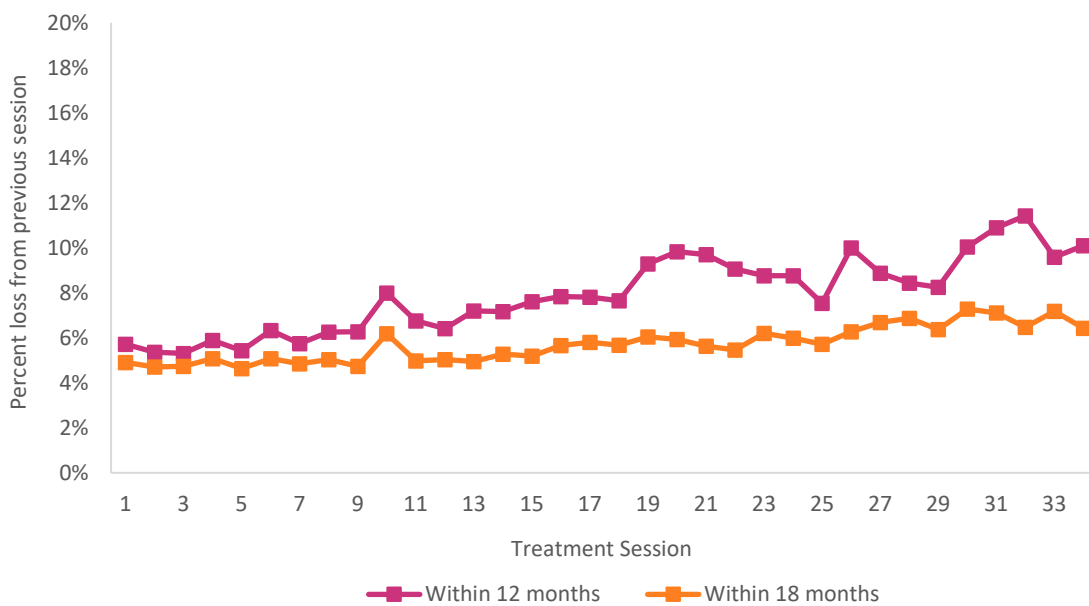




Figure 1.36. *Eating Disorders MBS and Better Access psychological treatment cessation rates by session number when considering first 12 or 18 months since commencement*

Figure 1.37 below extends this analysis and considers the timing of client cessation within a 12-month period stratified by the number of Eating Disorders MBS reviews received. Among those with no reviews, there is a sharp increase in cessation at the 10-session mark with just over 20% dropping out of treatment around their 10th Eating Disorders MBS psychological treatment session. Among those who continued past their 10th session without a review, there is a second peak in treatment cessation around their 20th treatment session, when another GP and specialist review is due. It is only a relatively small number of clients (350 of 4,648 originally) who continue beyond 20 sessions and fewer than 100 beyond 30 sessions without a review.

For those with one review, treatment cessation rates increased more gradually from the 8th treatment session, but then sharply increase to peak at over 20% around the 20th treatment session, when the specialist review is due. After this, cessation rates decline to 10% until the 30th treatment session where there is another spike with the cessation rate over 20% at the point where the final review is due. For those with more than one review, there is still an increase in cessation over time, but the first sharp spike in treatment cessation does not occur until the 30th session. This provides more compelling evidence that the drop out from the Eating Disorders MBS items initiative is most likely to occur at the milestone points when reviews are due, with the requirement of frequent reviews seeming to deter clients from continuing in treatment (or possibly more likely, providers advising clients they cannot continue treatment without a review).

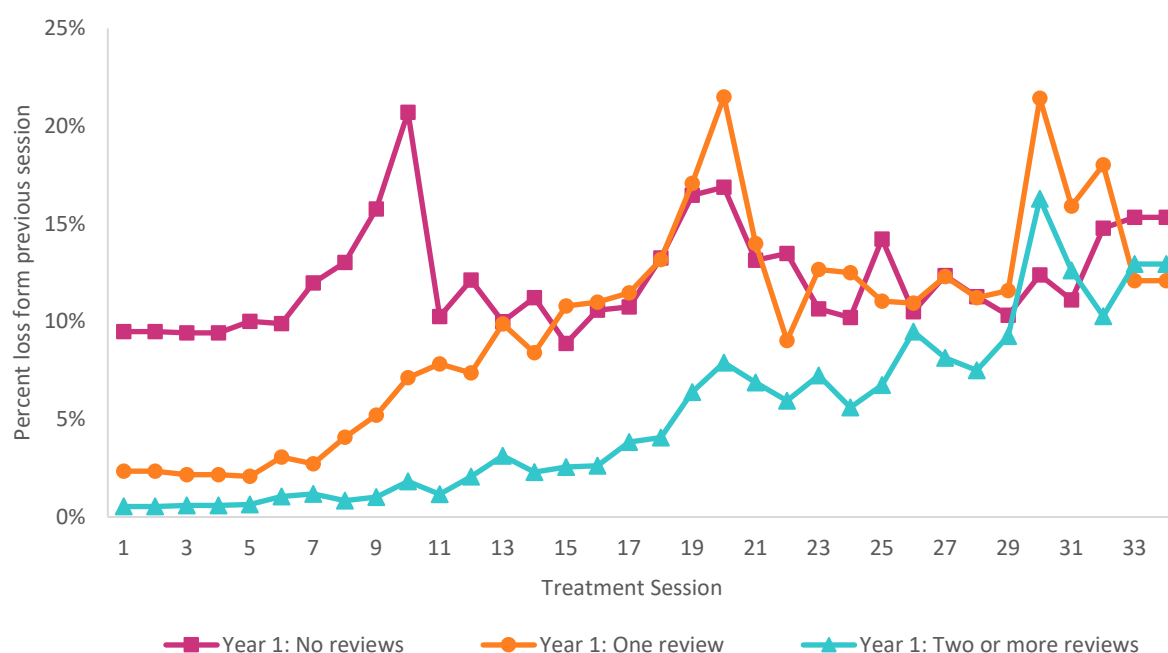


Figure 1.37. *Eating disorder psychological treatment cessation rates by session number based on number of reviews received*

The final figure in this section (Figure 1.38) again examines treatment cessation rates but this time is based on whether a specialist review had been obtained. For those who did not have a specialist review, the figure shows the same spikes increase demonstrating treatment cessation occurring



around 10, 20 and 30 sessions. Again, it is important to note that of those who initially commenced in the “no specialist review” group ($n = 7,995$), only 17% ($n = 1,370$) received a 21st treatment session, and less than 6% ($n = 447$) received a 31st treatment session within the first year. In contrast, for those who did receive at least one specialist review, treatment cessation gradually increased over time, with the dropout rate highest at the 30th treatment.

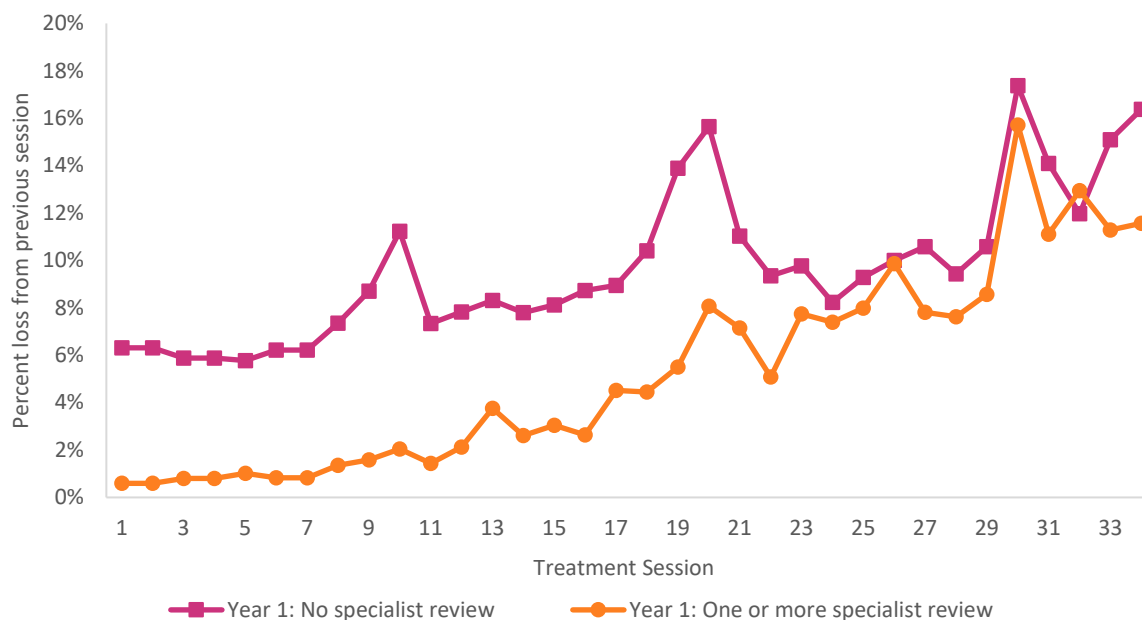



Figure 1.38. *Eating disorder psychological treatment cessation rates by session number based on number of specialist reviews obtained*

The results in this section indicate that the key review points and milestones in the Eating Disorders MBS items initiative are tied to a sharp increase in program cessation. This does not seem to represent a “hard” barrier, and there are many clients who continue with services beyond this point. These milestone points also do not appear to coincide closely with a period of 12-months on the program at which time the original EDP would expire. Importantly, the increased cessation at these review points is only tied to the number of Eating Disorders MBS psychology services received, not the sum of Eating Disorders MBS and Better Access treatments as would be expected.

It is speculated that some providers and/or clients have an understanding of how the program works and are acting accordingly (ceasing treatment despite potentially benefiting from further engagement and support). In contrast, others continue to receive and/or deliver services beyond these points regardless of compliance with the review schedule. While we did not have capacity within the evaluation timeline to pursue this point in more detail, it may be aligned with the extreme variability in provider experience with the Eating Disorders MBS items initiative program. Our analysis showed that the majority of psychology service providers had very little connection with the initiative, with over half of all providers delivering 20 or fewer Eating Disorders MBS psychology sessions in total. They may, therefore, not fully understand the program and may be making decisions about treatment cessation that those providers more familiar with the program are not making. While further work is needed to understand the drivers of these decisions to cease treatment at these points, it is clear the review process requires reconsideration. In addition, the



wide range of provider experiences with Eating Disorders MBS items initiative may also be leading to inequalities in the type of services and support that clients are receiving. Finally, ensuring that GPs and other initial referring providers are knowledgeable and familiar with the initiative parameters may also be a way to remove these apparent divergent interpretations in how the Eating Disorders MBS items initiative operates and variation in the level of treatment that clients receive.

Discussion


The present chapter drew upon the Person Level Integrated Data Asset (PLIDA) to address three broad aims: (1) to characterise uptake and utilisation of the Eating Disorders MBS items; (2) to contextualise use in terms of individual difference factors, such as level of socioeconomic (dis)advantage and other demographic factors (age, gender, language spoken at home, etc.) and engagement with other public health services (such as Better Access, NDIS, and CDMP); and (3) to describe cost- and service provider-related factors in service delivery.

PLIDA data indicated over 38,000 individuals have accessed Eating Disorders MBS services from inception to end of December 2022. Half of these recipients received 10 or more psychological services and six or more dietetic services from this plan, and a quarter of recipients received 20 or more psychological and 12 or more dietetic services, surpassing the level of services offered through other MBS-based programs such as Better Access and the CDMP. Even so, there was evidence of discontinuation in services associated with transition from plan preparation to first treatment (one-third of recipients did not proceed to receive any services), and from treatment to review sessions (less than one-third of recipients received review of progress that enables further sessions). Indeed, there was a clear pattern of elevated levels of cessation that peaked around those review times. This may reflect difficulties accessing reviews to continue services, a natural end-point following satisfactory cessation of original course of treatment, or low awareness of steps involved in accessing further sessions.

The median wait-time for first session was around 15 days, though 10% of recipients waited 100 days or more for services. For some, this delay coincided with having a pre-existing Better Access plan, suggesting they were completing psychological services through this scheme prior to transitioning to Eating Disorders MBS services. Wait times were lower for recipients who did not have a preceding Better Access plan in place (median = 10 days).

Wait times and overall number of services received may also reflect decreasing availability of healthcare providers, as there was clear evidence of plateau in new recipients of Eating Disorders MBS from late 2020 (psychological services) and 2021 (dietetic services) relative to number of existing recipients. Further to this, modelling revealed that the number of new recipients of Eating Disorders MBS services has been declining by approximately 10 people per month, despite number of services overall remaining relatively stable. There were also some evident differences in demographics (income, age, mental health) of recipients in the first 14 months of the initiative relative to subsequent years, suggesting potential for individuals with more severe presentations being prioritised in initial launch of this initiative.

On the service delivery side, it was clear that a small number of providers handled almost half of the treatment services. The remaining services were delivered by a large number of providers who each provided few services. While the reasons for this pattern cannot be discerned from PLIDA data, the



risk of healthcare providers with limited experience of the initiative offering services is consistent with observations from other studies (from healthcare providers, individuals with lived experience of an eating disorder, and carers) within this evaluation.

Individuals who accessed Eating Disorders MBS services tended to be younger, were most likely to identify as female, and reported substantially higher rates of mental illness than ABS general population statistics and also in comparison to Better Access and CDMP cohorts. However, as with these other MBS services, NDIS access was common for individuals who also utilised Eating Disorders MBS services, and almost half of individuals who received Eating Disorders MBS services had accessed psychological treatment services via MBS in the year prior to commencing Eating Disorders MBS access. There was much lower correspondence between prior access of the CDMP and subsequent Eating Disorders MBS service use.

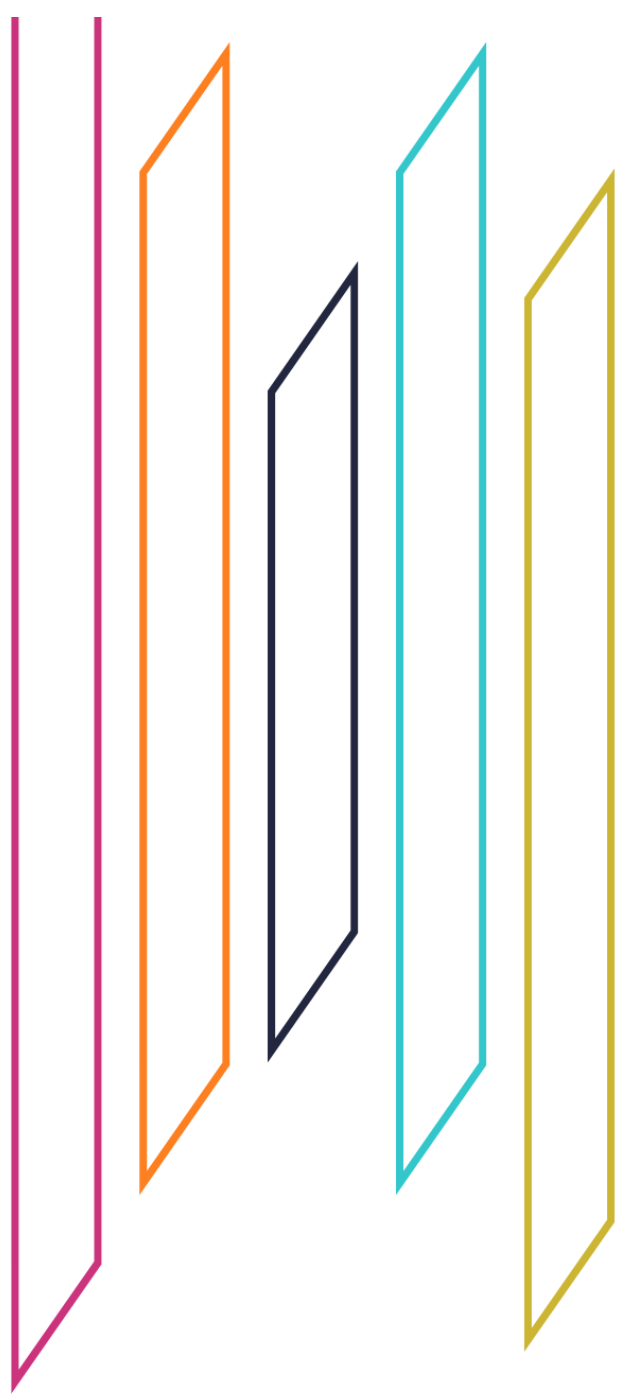
The majority of Eating Disorders MBS services incurred out-of-pocket costs for recipients, with possible exception of initial plan formulation for which approximately three-quarters of recipients received this without out-of-pocket costs. Relative to Better Access, Eating Disorders MBS services were less likely to be provided at no cost. On a per session basis, Eating Disorders MBS services incurred less out-of-pocket expenses for recipients, though it should be noted that this is in the context of receiving more services overall and, hence, a larger overall out-of-pocket expense. There was some evidence to suggest that the most disadvantaged individuals (lower income, lower level of education) were charged less in terms of out-of-pocket costs. Telehealth costs were comparable to in-person treatment services, though the flexibility that this method of delivery was most clearly observed in (modest) increased access to services among those living in rural and regional areas.



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Chapter 2.
Services
Australia Eating
Disorders MBS
Items Usage
(Study 2)





Chapter 2. Services Australia Eating Disorders MBS Items Usage (Study 2)

Exploration of patterns of use of Eating Disorders MBS Items: Uptake, utilisation, and costs

Introduction

This study involved an analysis of the uptake, utilisation, costs, and patterns of use of Eating Disorders MBS Items services, drawing on Medicare Benefits Schedule (MBS) data. With the Department of Health and Aged Care's assistance, we sourced aggregated, de-identified MBS data from Services Australia, for the period 1 November 2019 to 31 July 2023. From this, we developed profiles of use of Eating Disorders MBS Items services overall and for key item groups (e.g., preparation of eating disorder treatment and management plans [EDP], psychological treatment sessions), for all Australians and according to key consumer characteristics (e.g., age group, sex, and geographic area group). This enabled us to address research questions relating to patterns of use (e.g., the extent to which the Eating Disorders MBS Items have been taken up), accessibility (e.g., the extent to which access and patterns of use are impacted by where people live), affordability (e.g., bulk-billing rates and consumer co-payments), and typical trajectories of care under Eating Disorders MBS Items (e.g., the proportion of eating disorder treatment and management plans that are followed by treatment services, type of health professionals seen). This study provides context for other studies in the evaluation as it reports on all claims for Eating Disorders MBS Items services nationally.


Methods

Preparatory steps

Organising Eating Disorders MBS items into item groups

An initial step was to compile a complete list of Eating Disorders MBS Items. The list was based on materials supplied by the Department of Health and Aged Care, and classified each item on the following characteristics:

- item category and item sub-category – broad groupings of items according to their clinical purpose. The item categories were associated MBS items (including the sub-categories of preparation of an EDP and review of an EDP), psychological service sessions - whereby up to 40 sessions are available in a 12-month period (including the sub-categories of eating disorder psychological treatment service and group eating disorder psychological treatment service) and dietetic service sessions whereby up to 20 sessions are available in a 12-month period;
- provider type – general practitioners (GPs), other medical practitioners, clinical psychologists, psychologists, social workers, occupational therapists, dietitians, consultant paediatricians, or consultant psychiatrists; and
- mode of delivery – face-to-face, telehealth, or phone.



The list of Eating Disorders MBS Items is provided in the Final Report Appendix 1.

Documenting changes to the Eating Disorders MBS items initiative

Over time, several refinements have been made to the Eating Disorders MBS Items initiative. To facilitate our analyses of changing patterns of use following these refinements, we compiled a list of changes to the Eating Disorders MBS Items initiative over time. This is summarised in the Final Report Appendix 2.

Data supply

The data presented in this report were supplied by Services Australia in de-identified, aggregated form according to a set of specifications developed by our evaluation team. The scope of data provided included: summary data focused on the Eating Disorders MBS Items (as listed in the Final Report Appendix 1); and additional summary data on non-Eating Disorders MBS Items, which included items from the Better Access initiative and Chronic Disease Management Plan. The summaries included all services rendered from 1 November 2019 to 31 July 2023. The date of first service was set at 1st November 2019 because this was the date when the Eating Disorders MBS Items were introduced. The data were organised into reference periods defined by calendar years. Services Australia also provided population counts, based on the number of people enrolled in Medicare at the end of each calendar year.


Measures

The supplied data included summary statistics for various groupings of Eating Disorders MBS Items (based on the item characteristics described earlier). The summary statistics included counts of persons and services, the sum of provider fees charged and sum of MBS benefits paid, and out-of-pocket costs for services where a co-payment was made (median and interquartile range).

These summary statistics were stratified by age group (0 – 18 years, 19 – 39 years, and 40 years and over), sex (male, female), and geographic area group. Geographic area group was based on a classification used by the Australian Institute of Health and Welfare (AIHW) ¹, which utilises information about remoteness based on the Australian Bureau of Statistics (ABS) Australian Statistical Geography Standard (ASGS) ² and comprise five categories (i.e., major cities, inner regional areas, outer regional areas, remote areas, and very remote areas). As a consumer's age or address may change during the reference period, their characteristics at the last date of service in the reference period were applied to all services for that consumer in the reference period.

Out-of-pocket costs to consumers were calculated as the provider fee charged minus the MBS benefit paid. Generally, all services are bulk-billed or have a non-zero co-payment, however it is possible that for a small percentage of services the patient is billed but with a zero co-payment. For this study, only services for which the consumer contributed a non-zero co-payment are included in out-of-pocket cost estimates. Therefore, the percentages of bulk-billed services and services with out-of-pocket costs may not sum to exactly 100%.

Services Australia applied cell suppression to the summary statistics when the number of consumers was between 1 and 5. For this report, cell sizes of less than 6 are not reported and will be



represented as “*” while cells with no data will be represented as “-”. Where necessary, we applied consequential suppression so that the suppressed cell values cannot be calculated.

Statistical analyses

We converted counts of persons and services to crude rates per 1,000 population, to enable comparisons in uptake (i.e., the number of persons using services) and utilisation (i.e., the number of services used) over time, adjusted for population growth. We converted provider fees charged, MBS benefits paid, and out-of-pocket costs to 2022 – 2023 values using the ABS Consumer Price Index for medical and hospital services^{3,4}. For out-of-pocket costs, we reported median values (rather than the average or mean) as this is the preferred option in cases where data may be skewed, for example where most people have low out-of-pocket costs, but a small number of people have high costs. This is a frequently used approach to reporting out-of-pocket costs^{5,6}. The median out-of-pocket cost is the cost at the midpoint of the distribution of all out-of-pocket costs, so there is an equal probability of an out-of-pocket cost falling above or below the median cost. Note that, because the median reflects the distribution of all included values for a particular group, there can be greater variation in out-of-pocket costs for population subgroups than for the overall population.

In most cases, we present descriptive profiles of counts, rates, percentages, medians (and inter-quartile ranges), and average annual change in those statistics. We also reported the number of patients that utilised both an EDP and other health initiatives (Better Access and Chronic Disease Management).

Approvals

Monash University Human Research Ethics Committee approved the study (MUHREC ID: 38197). The Services Australia External Request Evaluation Committee approved the data request (EREC ID: RMS3134).

Acknowledgements

All data reported in this study were supplied by Services Australia.

Results

Uptake of Eating Disorders MBS items services

In 2022, more than 20,000 Australians received at least one Eating Disorders MBS service of any kind (see Table 2.1). This equates to approximately one in every 1,300 Australians in 2022 (the most recent year for which a full 12 months of data were available). When adjusted for population growth, there was a 14% average increase per year in the number of people using Eating Disorders MBS services since 2020 (2019 was not included in the calculation because there were only 2 months’ worth of data for that year).

In 2022, more than 11,000 people (one in every 2,273 Australians) received at least one Eating Disorders MBS psychological treatment service (i.e., a service claimed using the psychological treatment service provided by GPs/other medical practitioners, clinical psychologists, psychologists,

social workers, or occupational therapists; see Table 2.1). Adjusted for population growth, the number of persons that received this type of treatment through the Eating Disorders MBS items increased by an average of 15% per year since 2020.

In 2022, about 9,000 people (one in every 2,941 Australians) received at least one Eating Disorders MBS dietetic health service (Table 2.1). Adjusted for population growth, the number of persons treated by dietitians through the Eating Disorders MBS items increased by an average of 28% per year since 2020.

Table 2.1. Uptake of any Eating Disorders MBS items service and any Eating Disorders MBS Items treatment service, 2019 – 2023

		2019	2020	2021	2022	Average Annual Change (%) 2020-2022	2023 (up to 31 July)
Any ED-MBS items service	Persons	2,520	15,424	19,817	20,067	15	17,088
	Rate (per 1,000)	0.10	0.60	0.77	0.77	14	0.65
	% of ED-MBS users	100	100	100	100	0	100
Any ED-MBS items psychological treatment service	Persons	1,104	8,511	11,206	11,399	17	10,890
	Rate (per 1,000)	0.04	0.33	0.43	0.44	15	0.42
	% of ED-MBS users	44	55	57	57	1	64
Any ED-MBS items dietetic health service	Persons	536	5,547	8,364	8,961	29	7,207
	Rate (per 1,000)	0.02	0.22	0.32	0.34	28	0.27
	% of ED-MBS users	21	36	42	45	12	42

Note. Data include all claims for services received from 1 November 2019 to 31 July 2023. Rates are crude rates per 1,000 total population. The denominator for ‘% of Eating Disorders MBS users’ is the number of people who received any Eating Disorders MBS Items service. ‘Any ED-MBS Items service’ refers to a service provided under any of the Eating Disorders MBS Items in Final Report Appendix 1. ‘Any ED-MBS Items psychological treatment service’ refers to a service provided under any of the following Eating Disorders MBS Items Final Report Appendix 1: psychological treatment services delivered by GPs/other medical practitioners, clinical psychologists, psychologists, social workers, and occupational therapists. ‘Any ED-MBS items dietetic health service’ refers to a service provided under the following Eating Disorders MBS Items in Final Report Appendix 1: dietetic health services delivered by dietitians.

Items related to GPs and other medical professionals

Levels of uptake varied across key item groups as defined by provider type and clinical purpose. In 2022, GPs and other medical practitioners prepared an EDP for approximately 15,000 Australians (or 74% of all people who received any Eating Disorders MBS items) and reviewed an EDP (non-specialist review) for more than 4,500 Australians (or 22% of all people who received any Eating Disorders MBS items; Table 2.2). A large majority of these services were provided by GPs. The rate of persons receiving an EDP and review of an EDP from GPs increased modestly between 2020 and 2021 but remained stable between 2021 and 2022. In contrast, the rate of persons receiving similar services

from other medical professionals was 0.01 or less per 1,000 population. Since the introduction of the Eating Disorders MBS items in 2019, the uptake of psychological treatment services provided by GPs and other medical practitioners was very low relative to the total population and to all people who received any Eating Disorders MBS service (< 1% of all people who received any Eating Disorders MBS items).

Table 2.2. Uptake of Eating Disorders MBS items services delivered by GPs and other medical practitioners, 2019 – 2023

		2019	2020	2021	2022	Average Annual Change (%) 2020 – 2022	2023 (up to 31 July)
Preparation of an EDP (GP)	Persons	2,370	12,912	14,710	14,749	7	10,415
	Rate (per 1,000)	0.09	0.51	0.57	0.57	6	0.40
	% of ED-MBS users	94	84	74	73	-6	61
Review of an EDP (GP)	Persons	*	3,219	4,338	4,493	19	3,306
	Rate (per 1,000)	*	0.13	0.17	0.17	18	0.13
	% of ED-MBS users	*	21	22	22	4	19
Psychological treatment service (GP)	Persons	*	51	75	45	4	16
	Rate (per 1,000)	*	< 0.01	< 0.01	< 0.01	2	< 0.01
	% of ED-MBS users	*	< 1	< 1	< 1	-13	< 1
Preparation of an EDP (OMP)	Persons	*	203	192	121	-21	39
	Rate (per 1,000)	*	0.01	0.01	< 0.01	-22	< 0.01
	% of ED-MBS users	*	1	1	1	-32	0
Review of an EDP (OMP)	Persons	-	21	33	32	27	4
	Rate (per 1,000)	-	< 0.01	< 0.01	< 0.01	26	< 0.01
	% of ED-MBS users	-	< 1	< 1	< 1	9	< 1
Psychological treatment service (OMP)	Persons	*	*	*	*	*	-
	Rate (per 1,000)	*	*	*	*	*	-
	% of ED-MBS users	*	*	*	*	*	-

Note. EDP = eating disorder treatment and management plan; GP = general practitioners; OMP = other medical practitioners; '*' reflects data were suppressed because the raw value is less than 6; '-' reflects no data. Data include all claims for services received from 1 November 2019 to 31 July 2023. Rates are crude rates per 1,000 total population. The denominator for '% of ED-MBS users' is the number of people who received any Eating Disorders MBS Items service (see Table 2.1).

Items related to allied health professionals

In 2022, the uptake of Eating Disorders MBS services delivered by allied health professionals was highest for dietitians (approximately 9,000 persons or 0.34 per 1,000 population), followed by clinical psychologists (approximately 6,500 persons or 0.25 per 1,000 population), and psychologists (approximately 4,800 persons or 0.18 per 1,000 population; Table 2.3). On average, the uptake of

these services grew steadily between 2020 and 2022; 28% for dietitians, 12% for clinical psychologists, and 23% for psychologists.

Uptake was comparatively much lower for psychological treatment services delivered by occupational therapists (52 people or < 0.01 per 1,000 population) and social workers (approximately 550 people or 0.02 per 1,000 population) in 2022. Uptake increased by 327% per year on average for psychological treatment services delivered by occupational therapists and increased by 43% for psychological treatment services delivered by social workers, however the numerical rate was still very low.

Table 2.3. Uptake of Eating Disorders MBS items services delivered by allied health professionals, 2019 – 2023

		2019	2020	2021	2022	Average Annual Change (%) 2020 – 2022	2023 (up to 31 July)
Psychological treatment services (clinical psychologists)	Persons	714	5,168	6,422	6,519	13	6,170
	Rate (per 1,000)	0.03	0.20	0.25	0.25	12	0.24
	% of ED-MBS users	28	34	32	32	-2	36
Psychological treatment services (psychologists)	Persons	312	3,196	4,640	4,777	24	4,422
	Rate (per 1,000)	0.01	0.13	0.18	0.18	23	0.17
	% of ED-MBS users	12	21	23	24	7	26
Psychological treatment services (occupational therapists)	Persons	*	5	36	52	332	39
	Rate (per 1,000)	*	< 0.01	< 0.01	< 0.01	327	< 0.01
	% of ED-MBS users	*	0	0	0	252	0
Psychological treatment services (social workers)	Persons	*	288	536	548	44	477
	Rate (per 1,000)	*	0.01	0.02	0.02	43	0.02
	% of ED-MBS users	*	2	3	3	23	3
Dietetic health services (dietitians)	Persons	536	5,547	8,364	8,961	29	7,207
	Rate (per 1,000)	0.02	0.22	0.32	0.34	28	0.27
	% of ED-MBS users	21	36	42	45	12	42

Note. ‘*’ reflects data were suppressed because the raw value is less than 6; ‘-’ reflects no data. Data include all claims for services received from 1 November 2019 to 31 July 2023. Rates are crude rates per 1,000 total population. The denominator for ‘% of ED-MBS users’ is the number of people who received any Eating Disorders MBS Items service (see Table 2.1).

Items related to consultant psychiatrists and consultant paediatricians

Services delivered by consultant psychiatrists and consultant paediatricians made up a relatively small share of total Eating Disorders MBS services (Table 2.4), noting that the Eating Disorders MBS services offered by these health professionals are limited to preparation and review of an EDP, and do not include any items for treatment. In 2022, consultant psychiatrists prepared an EDP for approximately 415 Australians (0.02 per 1,000), and a review of an EDP for 744 (0.03 per 1,000). Both the rate of preparations and reviews increased by 14% and 10% per year, on average, respectively since 2020. On the other hand, the uptake of services delivered by consultant paediatricians was lower; approximately 200 people received a preparation of an EDP (0.01 per 1,000) and 110 received a review of an EDP (< 0.01 per 1,000).

Table 2.4. Uptake of Eating Disorders MBS items services delivered by consultant psychiatrists and consultant paediatricians, 2019 – 2023

		2019	2020	2021	2022	Average Annual Change (%) 2020 – 2022	2023 (up to 31 July)
Preparation of an EDP (consultant psychiatrists)	Persons	74	471	860	415	15	235
	Rate (per 1,000)	< 0.01	0.02	0.03	0.02	14	0.01
	% of ED-MBS users	3	3	4	2	-5	1
Review of an EDP (consultant psychiatrists)	Persons	11	632	860	744	11	534
	Rate (per 1,000)	< 0.01	0.02	0.03	0.03	10	0.02
	% of ED-MBS users	< 1	4	4	4	-4	3
Preparation of an EDP (consultant paediatricians)	Persons	8	169	217	202	11	70
	Rate (per 1,000)	< 0.01	0.01	0.01	0.01	10	0.02
	% of ED-MBS users	< 1	1	1	1	-4	< 1
Review of an EDP (consultant paediatricians)	Persons	*	68	104	109	29	82
	Rate (per 1,000)	*	< 0.01	< 0.01	< 0.01	27	< 0.01
	% of ED-MBS users	*	< 1	1	1	11	< 1

Note. EDP = eating disorder treatment and management plan; '*' reflects data were suppressed because the raw value is less than 6; '-' reflects no data. Data include all claims for services received from 1 November 2019 to 31 July 2023. Rates are crude rates per 1,000 total population. The denominator for '% of ED-MBS users' is the number of people who received any Eating Disorders MBS Items service (see Table 2.1).

Utilisation of Eating Disorders MBS items services

In 2022, approximately 196,000 Eating Disorders MBS services were delivered. Adjusted for population growth, this represents an average annual increase of 16% from approximately 147,000 services in 2020 (Table 2.5). In 2022, approximately 115,000 Eating Disorders MBS psychological

treatment services were delivered, an average annual increase of 13% from 92,000 in 2020. Psychological treatment services made up 59% of total Eating Disorders MBS services in 2022. This percentage decreased slightly from 63% in 2020. In 2022, approximately 57,000 Eating Disorders MBS dietetic health services were delivered, an average annual increase of 32% from 34,000 in 2020. Dietetic health services made up one third (29%) of total Eating Disorders MBS services in 2022. This percentage has been growing steadily from 23% in 2020.

Table 2.5. Utilisation of any Eating Disorders MBS items service and any Eating Disorders MBS Items treatment service, 2019 – 2023

		2019	2020	2021	2022	Average Annual Change (%) 2020 – 2022	2023 (up to 31 July)
Any ED-MBS items service	Services	7,209	146,708	190,404	196,170	16	130,829
	Rate (per 1,000)	0.28	5.75	7.38	7.53	15	4.99
	% of ED-MBS services	100	100	100	100	0	100
	Ratio (sessions/ persons)	2.86	9.51	9.61	9.78	1	7.66
Any ED-MBS items psychological treatment service	Services	3,219	91,911	114,768	115,376	13	79,292
	Rate (per 1,000)	0.13	3.60	4.45	4.43	11	3
	% of ED-MBS services	45	63	60	59	-3	61
	Ratio (sessions/ persons treated)	2.92	10.80	10.24	10.12	-3	7.28
Any ED-MBS items dietetic health service	Services	1,173	33,611	51,159	56,682	32	35,076
	Rate (per 1,000)	0.05	1.32	1.98	2.18	30	1.34
	% of ED-MBS services	16	23	27	29	12	27
	Ratio (sessions/ persons treated)	2.19	6.06	6.12	6.33	2	4.87

Note. Data include all claims for services received from 1 November 2019 to 31 July 2023. Rates are crude rates per 1,000 total population. ‘Any ED-MBS Items service’ refers to a service provided under any of the Eating Disorders MBS Items in Final Report Appendix 1. ‘Any ED-MBS Items psychological treatment service’ refers to a service provided under any of the following Eating Disorders MBS Items in Final Report Appendix 1: psychological treatment services delivered by GPs/other medical practitioners, clinical psychologists, psychologists, social workers, and occupational therapists. ‘Any ED-MBS items dietetic health service’ refers to a service provided under the following Eating Disorders MBS Items in Final Report Appendix 1: dietetic health services delivered by dietitians.

Items related to specific provider type

Tables 2.6 – 2.8 summarise the utilisation of Eating Disorders MBS services for key item groups. From 2020, several items made up less than 1% of all Eating Disorders MBS services and these are: psychological treatment delivered by GPs, other medical professionals, and occupational therapists and preparation and review of an EDP delivered by other medical professionals, consultant psychiatrists, and consultant paediatricians. Excluding these items, the largest relative increases in utilisation rates were for items relating to: psychological treatment services delivered by social workers (average annual increase of 35% from 2020 to 2022); dietetic health services (30%); psychological treatment services delivered by psychologists (18%); review of an EDP by GPs (15%); psychological treatment services delivered by clinical psychologists (8%); and preparation of an EDP delivered by GPs (6%).

Table 2.6. Utilisation of Eating Disorders MBS items services delivered by GPs and other medical practitioners, 2019 – 2023

		2019	2020	2021	2022	Average Annual Change (%) 2020 – 2022	2023 (up to 31 July)
Preparation of an EDP (GP)	Services	2,370	12,952	14,711	14,751	7	10,415
	Rate (per 1,000)	0.09	0.51	0.57	0.57	6	0.40
	% of ED-MBS services	33	9	8	8	-8	8
Review of an EDP (GP)	Services	*	4,522	5,989	6,018	16	3,922
	Rate (per 1,000)	*	0.18	0.23	0.23	15	0.15
	% of ED-MBS services	*	3	3	3	< 1	3
Psychological treatment service (GP)	Services	*	283	341	166	-15	87
	Rate (per 1,000)	*	0.01	0.01	0.01	-16	< 0.01
	% of ED-MBS services	*	< 1	< 1	< 1	-30	< 1
Preparation of an EDP (OMP)	Services	*	203	192	121	-21	39
	Rate (per 1,000)	*	0.01	0.01	< 0.01	-22	< 0.01
	% of ED-MBS services	*	< 1	< 1	< 1	-33	< 1
Review of an EDP (OMP)	Services	-	21	45	49	62	5
	Rate (per 1,000)	-	< 0.01	< 0.01	< 0.01	60	< 0.01
	% of ED-MBS services	-	< 1	< 1	< 1	35	< 1
Psychological treatment service (OMP)	Services	*	*	*	*	*	-
	Rate (per 1,000)	*	*	*	*	*	-
	% of ED-MBS services	*	*	*	*	*	-

Note. EDP = eating disorder treatment and management plan; GP = general practitioners; OMP = other medical practitioners; '*' reflects data were suppressed because the raw value is less than 6; '-' reflects no data. Data include all claims for services received from 1 November 2019 to 31 July 2023. Rates are crude rates per 1,000 total population.

Table 2.7. Utilisation of Eating Disorders MBS items services delivered by allied health professionals, 2019 – 2023

		2019	2020	2021	2022	Average Annual Change (%) 2020 – 2022	2023 (up to 31 July)
Psychological treatment services (clinical psychologists)	Services	2,108	56,367	66,215	66,569	9	45,084
	Rate (per 1,000)	0.08	2.21	2.57	2.55	8	1.72
	% of ED-MBS services	29	38	35	34	-6	34
Psychological treatment services (psychologists)	Services	848	29,184	40,226	40,673	19	28,561
	Rate (per 1,000)	0.03	1.14	1.56	1.56	18	1.09
	% of ED-MBS services	12	20	21	21	2	22
Psychological treatment services (occupational therapists)	Services	*	76	203	448	144	291
	Rate (per 1,000)	*	0.00	0.01	0.02	141	0.01
	% of ED-MBS services	*	< 1	<1	< 1	110	< 1
Psychological treatment services (social workers)	Services	*	2,683	4,634	4,685	37	3,271
	Rate (per 1,000)	*	0.11	0.18	0.18	35	0.12
	% of ED-MBS services	*	2	2	2	16	3
Dietetic health services (dietitians)	Services	1,173	33,611	51,159	56,682	32	35,076
	Rate (per 1,000)	0.05	1.32	1.98	2.18	30	1.34
	% of ED-MBS services	16	23	27	29	12	27

Note. '*' reflects data were suppressed because the raw value is less than 6; '-' reflects no data. Data include all claims for services received from 1 November 2019 to 31 July 2023. Rates are crude rates per 1,000 total population.

Table 2.8. Utilisation of Eating Disorders MBS items services delivered by consultant psychiatrists and consultant paediatricians, 2019 – 2023

		2019	2020	2021	2022	Average Annual Change (%) 2020 – 2022	2023 (up to 31 July)
Preparation of an EDP (consultant psychiatrists)	Services	74	472	452	415	-6	235
	Rate (per 1,000)	< 0.01	0.02	0.02	0.02	-7	0.01
	% of ED-MBS services	1	< 1	< 1	< 1	-19	< 1
Review of an EDP (consultant psychiatrists)	Services	11	689	934	805	11	566
	Rate (per 1,000)	<0.01	0.03	0.04	0.03	10	0.02
	% of ED-MBS services	< 1	< 1	< 1	< 1	-6	< 1
Preparation of an EDP (consultant paediatricians)	Services	8	169	217	202	11	70
	Rate (per 1,000)	< 0.01	0.01	0.01	0.01	10	< 0.01
	% of ED-MBS services	< 1	< 1	< 1	< 1	-5	< 1
Review of an EDP (consultant paediatricians)	Services	*	108	195	154	30	92
	Rate (per 1,000)	*	<0.01	0.01	0.01	28	< 0.01
	% of ED-MBS services	*	< 1	< 1	< 1	8	< 1

Note. EDP = eating disorder treatment and management plan; ‘*’ indicates data were suppressed because the raw value is less than 6; ‘-’ indicates no data. Data include all claims for services received from 1 November 2019 to 31 July 2023. Rates are crude rates per 1,000 total population.

The ratio of persons treated (Table 2.1) to psychological treatment sessions delivered (Table 2.5) provides an approximation of the average number of Eating Disorders MBS psychological treatment sessions used per person each year. In 2022, the ratio was 1:10.12 (Table 2.9). That is, an average of approximately 10 sessions were used for every one person who received Eating Disorders MBS psychological treatment (from any provider) in 2022. This ratio has slightly decreased over time (by 3% per year) from 1:10.80 in 2020.

The ratio of psychological treatment to persons treated varied considerably across provider types. In 2022, the ratio was highest for psychological treatment services delivered by clinical psychologists (1:10.21) and lowest for psychological treatment services delivered by GPs/other medical practitioners (1:3.69). With the exception of dietitians, ratios decreased between 2020 to 2022 for all providers with the largest decline observed for GPs. In 2022, 6.33 sessions were used for every one person who received Eating Disorders MBS dietetic health services, up from 6.12 sessions in the previous year and an increase of 2% annually, on average, since 2020.

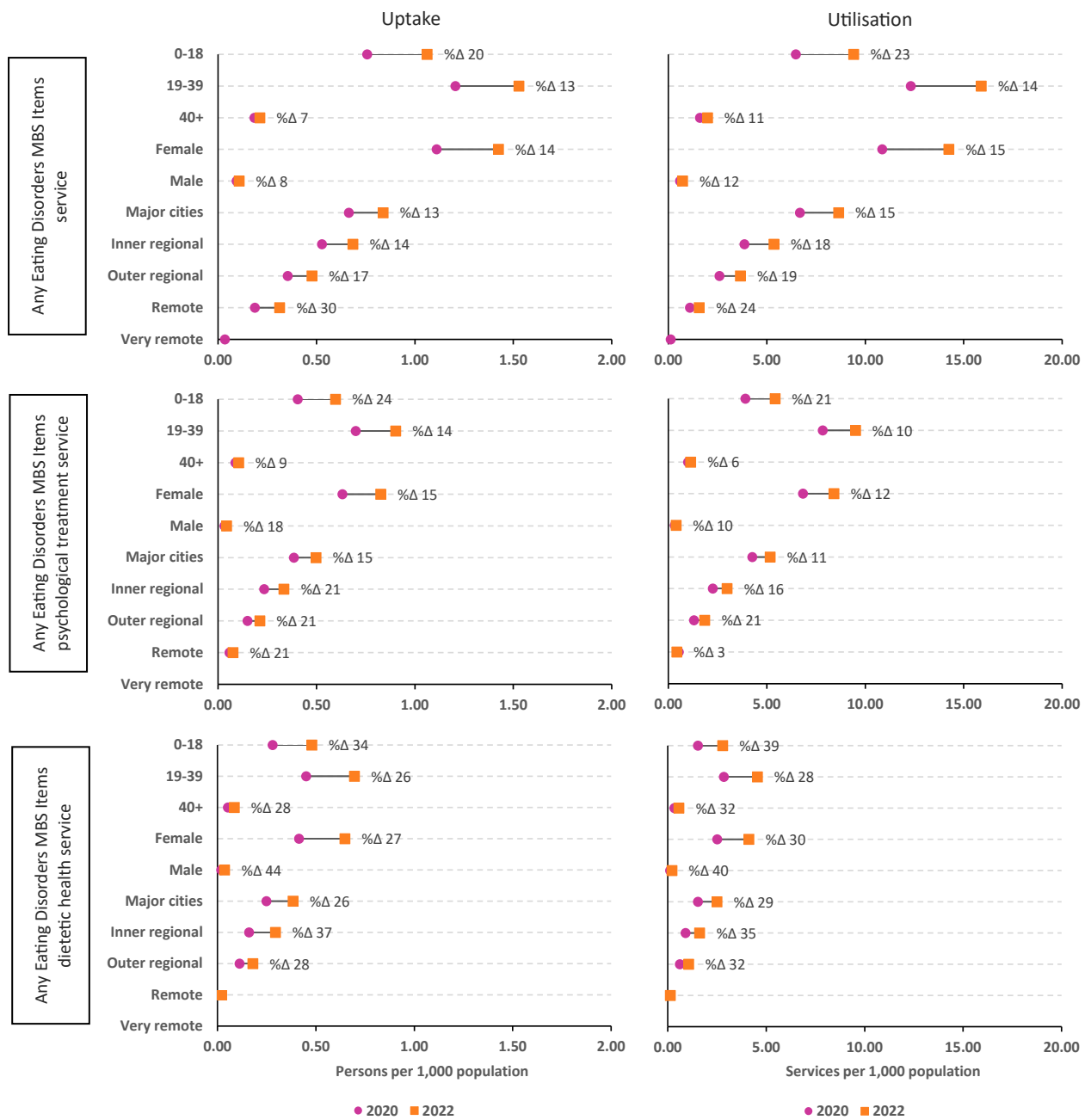
Table 2.9. Average number of services per person for selected item groups, 2019 – 2023

	2019	2020	2021	2022	Average Annual Change (%) 2020 – 2022	2023 (up to 31 July)
Any ED-MBS Items psychological treatment	2.92	10.80	10.24	10.12	-3	7.28
Psychological treatment (GPs/other medical practitioners)	*	5.48	4.55	3.69	-18	5.44
Psychological treatment (clinical psychologists)	2.95	10.91	10.31	10.21	-3	7.31
Psychological treatment (psychologists)	2.72	9.13	8.67	8.51	-3	6.46
Psychological treatment (occupational therapists)	*	15.20	5.64	8.62	-5	7.46
Psychological treatment (social workers)	*	9.32	8.65	8.55	-4	6.86
Dietetic health services (dietitians)	2.19	6.06	6.12	6.33	2	4.87

Note. ‘*’ reflects data were suppressed because the raw value is less than 6; ‘-’ reflects no data. Data include all claims for services received from 1 November 2019 to 31 July 2023. ‘Any ED-MBS Items psychological treatment service’ refers to a service provided under any of the following Eating Disorders MBS Items in Final Report Appendix 1: psychological treatment services delivered by GPs/other medical practitioners, clinical psychologists, psychologists, social workers, and occupational therapists.


Uptake and utilisation according to consumer characteristics

Figures 2.1 through 2.4 show patterns of uptake and utilisation of Eating Disorders MBS services according to consumers’ age group, sex, and where they live, and how these patterns have changed over time. In years 2020 to 2022, rates of uptake and utilisation (per 1,000 population) were highest among females (compared to males), people aged 19 – 39 years (compared to those aged 0 – 18 and 40 and over), and people living in major cities and inner regional areas (compared to people living in outer regional, remote, and very remote areas).



Note. '% Δ', average annual percentage change 2020 – 2022. 'Any Eating Disorders MBS Items service' refers to a service provided under any of the Eating Disorders MBS Items in Final Report Appendix 1. 'Any Eating Disorders MBS Items psychological treatment service' refers to a service provided under any of the following Eating Disorders MBS Items in Final Report Appendix 1: psychological treatment services delivered by GPs/other medical practitioners, clinical psychologists, psychologists, social workers, and occupational therapists. 'Any Eating Disorders MBS items dietetic health service' refers to a service provided under the following Eating Disorders MBS Items in Final Report Appendix 1: dietetic health service services delivered by dietitians.

Figure 2.1. Rates of uptake and utilisation of any Eating Disorders MBS Items service and any Eating Disorders MBS Items treatment service, by age, sex, and geographic location, 2020 – 2022

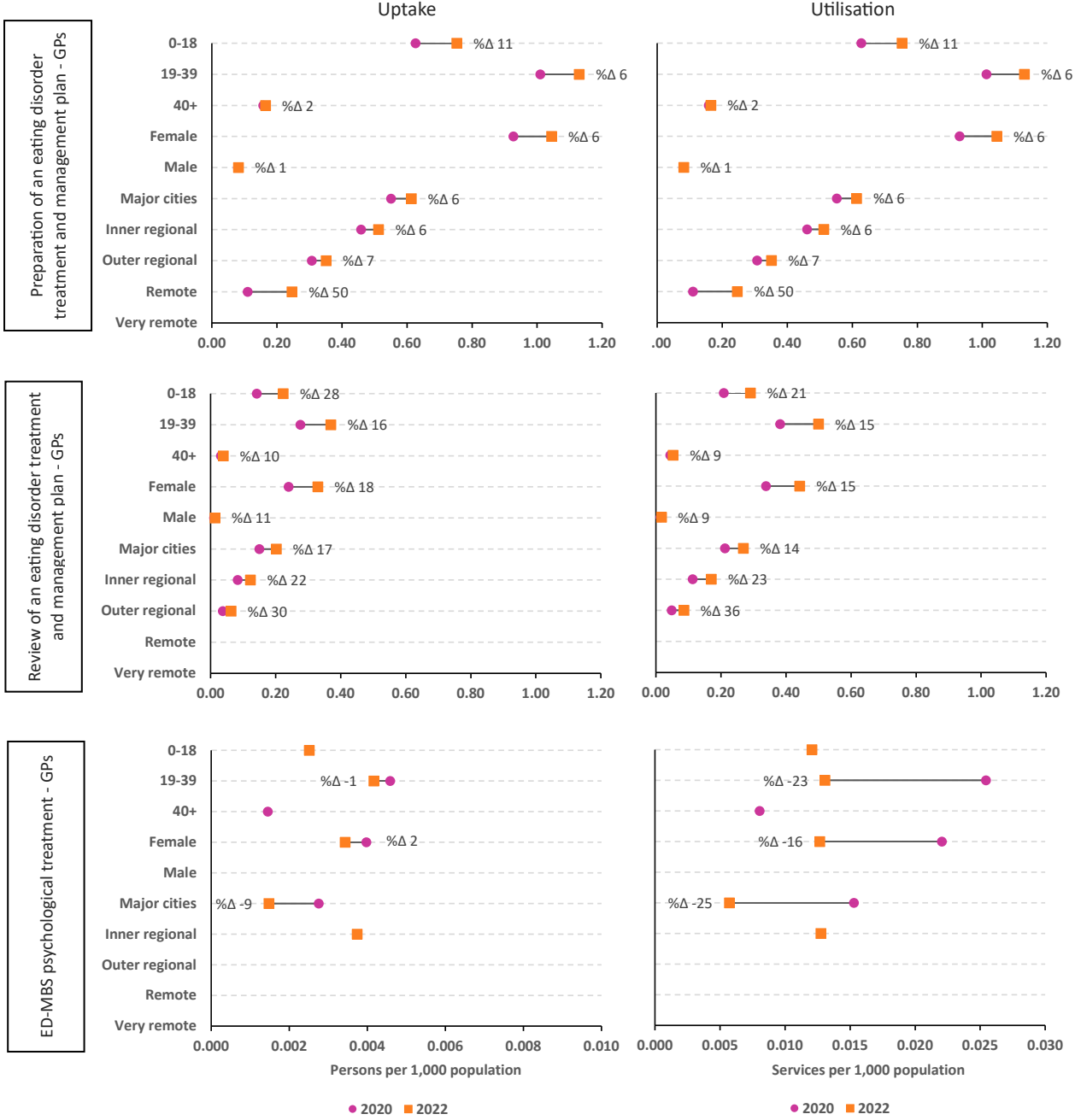


Levels of uptake and utilisation (per 1,000 population) have changed over time, with increases particularly apparent for some of these same groups – females and people aged 19 – 39 years (Figure 2.1). Rates of uptake and utilisation of Eating Disorders MBS psychological treatment and dietetic services also increased for people in remote areas, although they remained lower than for people living in major cities or inner regional areas. Notably, the uptake and utilisation of dietetic services were very low among people living in remote or very remote areas.

Figures 2.2 to 2.4 show corresponding patterns across different item groups. This includes services offered by (a) GPs and other medical professionals, (b) allied health professionals, and (c) consultant psychiatrists and consultant paediatricians. With respect to age and sex, these tended to show broadly similar patterns to the overall Eating Disorders MBS items patterns in Figure 2.1. For example, for most item groups, uptake and utilisation was highest among those aged 19 – 39 years. However, there were some exceptions. For example, the uptake and utilisation of preparation of an EDP delivered by other medical professionals and consultant psychiatrists decreased over time for females and across all age groups. This trend was also observed in the same consumer groups for services related to psychological treatment delivered by GPs.

Also noticeable were the variable patterns according to geographic area. For example, people living in outer regional, remote, and very remote areas utilised predominantly psychological treatment sessions delivered by allied health professionals and had zero usage of equivalent services delivered by GPs and other medical professionals. In contrast, people living in major cities and inner regional areas accessed treatment from all types of service providers, although there was a decline in the uptake and utilisation of psychological treatment services delivered by GPs and other medical professionals between 2020 and 2022. It is worth noting that the growth rates (i.e., average annual percentage change) of uptake and utilisation in regional and remote areas were higher than major cities for several item groups, namely services offered by GPs and allied health professionals. However, despite the growth in most item groups for regional and remote areas, the overall rates (i.e., per 1,000 population) were generally lower compared to those for major cities.

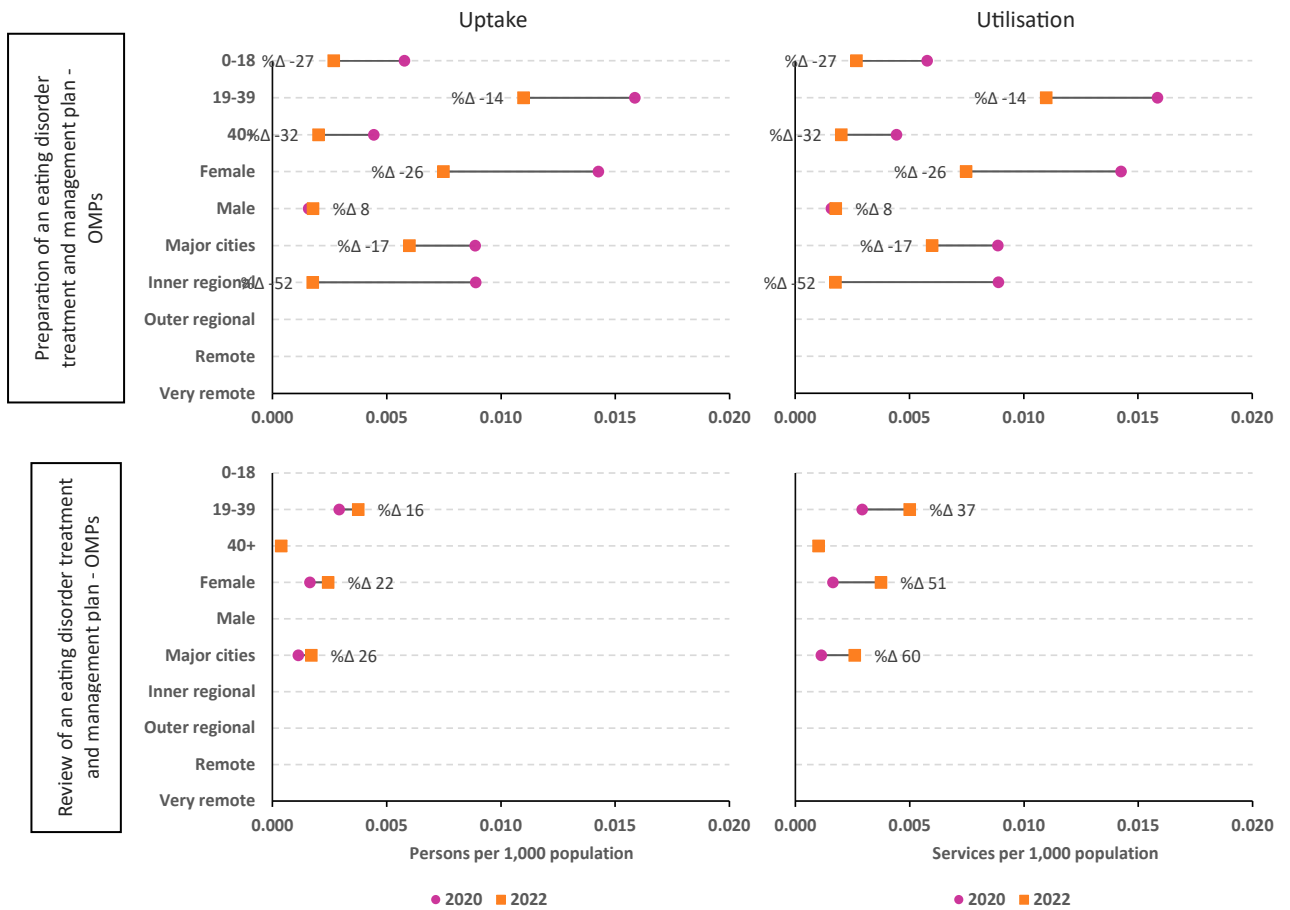
Rates of uptake and utilisation also changed over time in different ways across different item groups. For example, between 2020 and 2022, people aged 0 – 18 years experienced the highest annual percentage increase (on average) for psychological treatment and dietetic services compared to their older counterparts. Among females, there was an increase in uptake and utilisation of all item groups with the exception of preparation of an EDP delivered by other medical practitioners and consultant psychiatrists and psychological treatment service delivered by GPs. Generally, the average annual increase in these rates for all item groups, with the exception of preparation of an EDP delivered by other medical practitioners and dietetic health services by dietitians, was higher compared to those for males.



Note. '% Δ', average annual percentage change 2020 – 2022. EDP = eating disorder treatment and management plan; OMPs = other medical practitioners.

Panel A: General practitioners

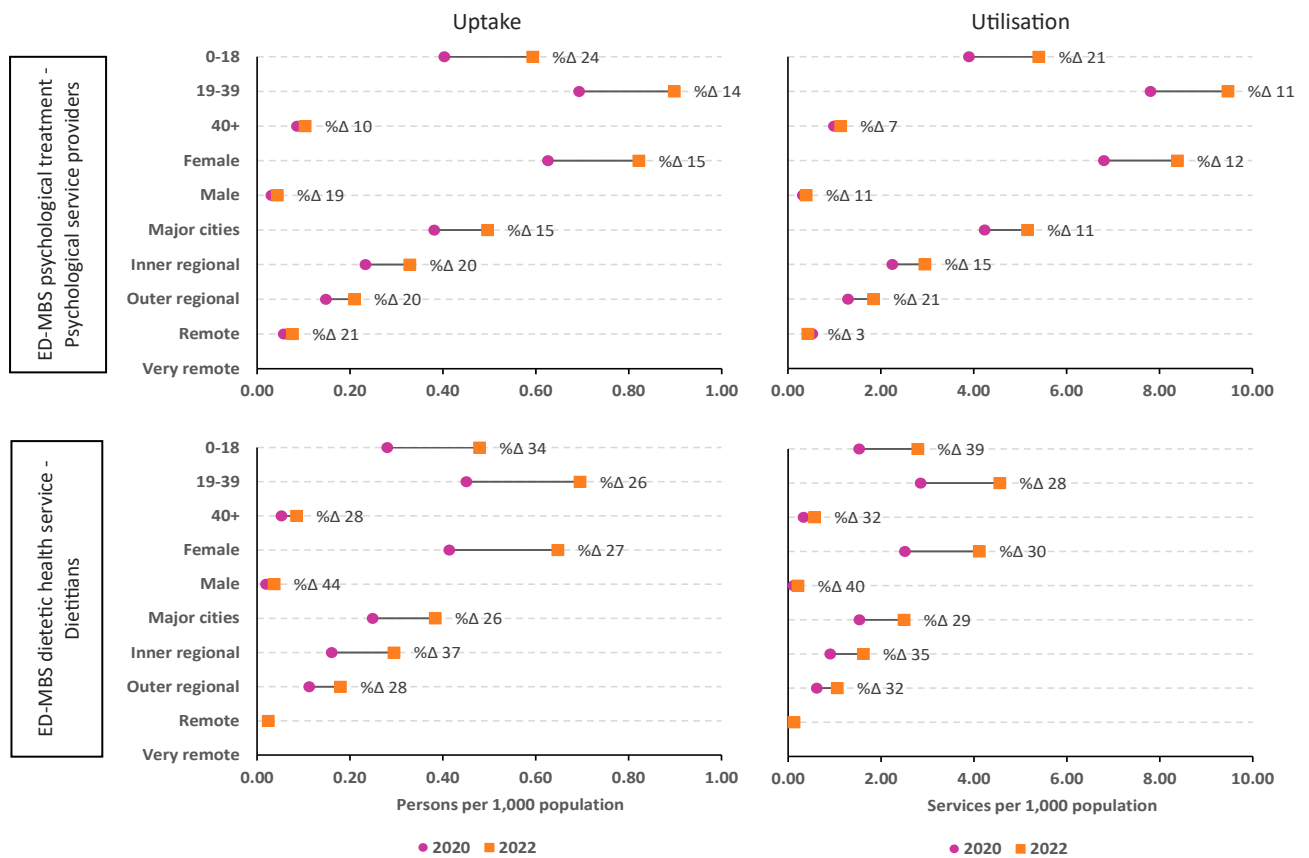
Figure 2.2. Rates of uptake and utilisation of Eating Disorders MBS Items services delivered by GPs and other medical practitioners, by age, sex, and geographic location, 2020 – 2022



Note. '% Δ', average annual percentage change 2020 – 2022. EDP = eating disorder treatment and management plan; OMPs = other medical practitioners.

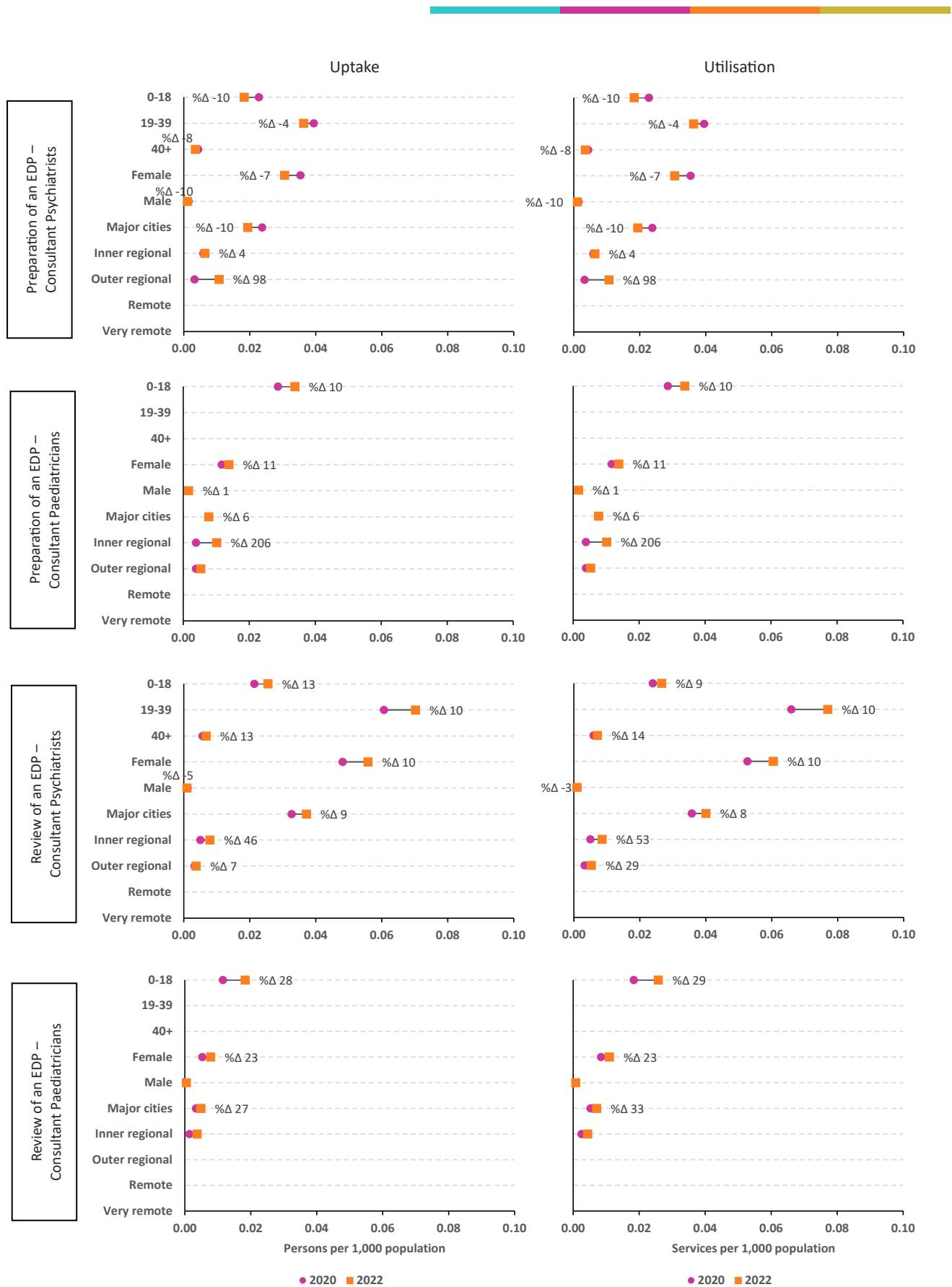
Panel B: Other medical practitioners

Figure 2.2. Rates of uptake and utilisation of Eating Disorders MBS Items services delivered by GPs and other medical practitioners, by age, sex, and geographic location, 2020 – 2022



Note. '% Δ', average annual percentage change 2020 – 2022. 'ED-MBS psychological treatment – Psychological service providers' refers to a service delivered by clinical psychologists, psychologists, social workers, and occupational therapists.

Figure 2.3. Rates of uptake and utilisation of Eating Disorders MBS Items services delivered by allied health professionals, by age, sex, and geographic location, 2020 – 2022



Note. '% Δ', average annual percentage change 2020 – 2022.

Figure 2.4. Rates of uptake and utilisation of Eating Disorders MBS Items services delivered by consultant psychiatrists and consultant paediatricians, by age, sex, and geographic location, 2020 – 2022

Affordability to consumers

In 2022, approximately 19% of all Eating Disorders MBS services were bulk billed, an average annual decrease of 20% per year from 30% in 2020 (Table 2.10). Conversely, 80% of services in 2021 involved a co-payment by the consumer, an increase of 8% each year from 69% in 2020. If a co-payment was made, the median out-of-pocket cost per service grew steadily from \$37.78 per service in 2020 to \$42.26 per service in 2022 (average annual increase of 6%). During the first seven months of 2023, the percentage of services for which the consumer made a co-payment increased to 83% and the median out-of-pocket cost per service increased to \$80.35.

In 2022, approximately 9% of Eating Disorders MBS psychological treatment services were bulk billed, down from 20% in 2020, while 90% involved a consumer co-payment, up from 78% in 2020. These 2022 percentages remained consistent up until 31 July 2023. The median co-payment increased, on average, by 14% per year (\$39.35 in 2020 to \$51.21 in 2022) and continued to increase to \$88.35 in 2023 (up until 31 July).

In 2022, approximately 19% of Eating Disorders MBS dietetic health services were bulk billed, down from 25% in 2020, while 80% involved a consumer co-payment, up from 74% in 2020. These trends continued in the first seven months of 2023. As described earlier in the methods section, the percentages of bulk-billed services and services with out-of-pocket costs do not sum to exactly 100% due to a small proportion of services where the patient was billed but with a zero co-payment. The median co-payment increased, on average, by 6% per year (\$31.85 in 2020 to \$36.01 in 2022) and continued to increase to \$59 in 2023 (up until 31 July).

Table 2.10. Bulk-billing and out-of-pocket costs paid by consumers, for any Eating Disorders MBS Items services and any Eating Disorders MBS Items treatment services, 2019 – 2023


		2019	2020	2021	2022	Average Annual Change (%) 2020 – 2022	2023 (up to 31 July)
Any ED-MBS items service	Services	7,209	146,708	190,404	196,170	16	130,829
	Services bulk-billed (%)	35	30	22	19	-20	17
	Services with OOP (%)	63	69	77	80	8	83
	Median OOP (\$)	24.26	37.78	38.01	42.26	6	80.35
	OOP 25th percentile (\$)	15.78	18.95	19.49	21.13	6	26.80
	OOP 75th percentile (\$)	74.25	93.46	98.50	105.91	6	118.35
	Any ED-MBS items	3,219	91,911	114,768	115,376	13	79,292

		2019	2020	2021	2022	Average Annual Change (%) 2020 – 2022	2023 (up to 31 July)
psychological treatment service	Services bulk-billed (%)	10	20	12	9	-32	9
	Services with OOP (%)	88	78	87	90	8	91
	Median OOP (\$)	24.20	39.35	44.05	51.21	14	88.35
	OOP 25th percentile (\$)	16.60	19.41	19.93	21.34	5	27.65
	OOP 75th percentile (\$)	74.66	97.07	99.76	106.39	5	120.35
	Any ED-MBS items	Services	1,173	33,611	51,159	56,682	32
dietetic health service	Services bulk-billed (%)	9	25	20	19	-13	14
	Services with OOP (%)	89	74	78	80	4	86
	Median OOP (\$)	24.79	31.85	32.56	36.01	6	59.00
	OOP 25th percentile (\$)	10.76	15.34	18.46	20.97	17	25.80
	OOP 75th percentile (\$)	54.02	65.40	87.56	100.51	24	114.00

Note. OOP = out-of-pocket. Data include all claims for services received from 1 November 2019 to 31 July 2023. Fees charged, benefits paid, and out-of-pocket costs are expressed in 2022–2023 dollars. Estimates of out-of-pocket costs are based on services for which a co-payment was charged. ‘Any ED-MBS Items service’ refers to a service provided under any of the Eating Disorders MBS Items in Final Report Appendix 1. ‘Any ED-MBS Items psychological treatment service’ refers to a service provided under any of the following Eating Disorders MBS Items in Final Report Appendix 1: psychological treatment services delivered by GPs/other medical practitioners, clinical psychologists, psychologists, social workers, and occupational therapists. ‘Any ED-MBS items dietetic health service’ refers to a service provided under the following Eating Disorders MBS Items Final Report Appendix 1: dietetic health services delivered by dietitians.

Tables 2.11 – 2.13 profile bulk-billing rates and out-of-pocket costs for key Eating Disorders MBS item groups. These show that the percentage of services which were bulk-billed or, conversely, for which a co-payment was made by the consumer were dependent on the type of provider and service the consumer received. Notably:

- The item groups with the highest rates of bulk-billing were preparation of an EDP delivered by GPs, other medical practitioners, and consultant psychiatrists and review of an EDP delivered by GPs and other medical practitioners (all had bulk-billing rates of 50% or higher in all years 2019 to 2023 year to date). Most of these rates declined between 2020 and 2022. The item groups with the lowest rates of bulk-billing were psychological treatment services delivered by psychologists (8% in 2022), psychological treatment services delivered by clinical psychologists (9% in 2022) and psychological treatment services delivered by social



workers (12% in 2022). These item groups also had large decreases in bulk-billing rates between 2020 and 2022 (-30%, -33%, and -28%, respectively).

- In 2022, for GPs, services relating to the delivery of psychological treatment involved a co-payment more frequently (72% of services) than services for the preparation or review of an EDP (26% – 31%; Table 2.11).
- Most of the psychological treatment services delivered by clinical psychologists, psychologists, and social workers in 2022 involved a co-payment (88% – 91%), compared to 72% of services delivered by occupational therapists (Table 3.12). About 80% of dietetic health services involved a co-payment.
- For consultant psychiatrists, most services for review of an EDP involved a co-payment (68%), compared to less than one-third of services for preparing an EDP (21%). Similarly, for consultant paediatricians, 60% of services for review of an EDP involved a co-payment (60%), compared to 36% of services for preparing an EDP (Table 2.13).
- Between 2019 and 2021, the percentage of services for which a co-payment was made increased for all item groups except psychological treatment services delivered by occupational therapists, preparation of an EDP delivered by consultant psychiatrists and consultant paediatricians and review of an EDP delivered by consultant paediatricians. The increase was highest for psychological treatment services delivered by GPs and occupational therapists (124% and 81% average annual increase, respectively), preparation and review of an EDP delivered by GPs (39% and 34%, respectively), and preparation of an EDP delivered by consultant psychiatrists (17%). During the first seven months of 2023, the percentage of services for which the consumer paid a co-payment increased across all providers and item groups except for clinical psychologists and psychologists, which remained stable.

For services at which a co-payment was paid, the out-of-pocket cost varied depending on the type of provider that the consumer saw:

- In 2022, for services delivered by GPs/other medical practitioners, the median co-payment varied between \$20.97 (interquartile range [IQR] = \$11.44 – \$53.38) for review of an EDP and \$57.93 (IQR \$29.55 – \$147.96) for psychological treatment services. For services delivered by allied health professionals, the median co-payment varied between \$27.70 (IQR = \$22.19 – \$111.21) for psychological treatment services delivered by occupational therapists and \$54.81 (IQR = \$24.25 – \$118.35) for psychological treatment services delivered by psychologists. For consultant psychiatrist or paediatrician services, the median co-payment varied between \$61.80 (IQR = \$30.03 – \$133.39) for review of an EDP (consultant psychiatrists) and \$127.09 (IQR = \$63.55 – \$172.69) for preparation of an EDP (consultant paediatricians).
- Between 2020 and 2022, average annual change in median out-of-pocket costs was modest for services rendered by GPs, consultant psychiatrists and consultant paediatricians (change of no more than +/- 10%), with the exception of review of an EDP delivered by consultant psychiatrists which increased by 14% annually. On the other hand, the average annual change in median out-of-pocket costs for all allied health professional services was generally higher, ranging from 7% (dietitians) to 22% (social workers). For the first seven months of 2023, median co-payments for all types of providers and item groups showed considerable increases compared to 2022, with the exception of preparation of an EDP delivered by consultant paediatricians.

Table 2.11. Bulk-billing and out-of-pocket costs paid by consumers, for Eating Disorders MBS Items services delivered by GPs and other medical practitioners, 2019 – 2023

		2019	2020	2021	2022	Average Annual Change (%) 2020 – 2022	2023 (up to 31 July)
Preparation of an EDP (GP)	Services	2,370	12,952	14,711	14,751	7	10,415
	Services bulk-billed (%)	79	85	78	72	-8	63
	Services with OOP (%)	17	13	20	26	39	34
	Median OOP (\$)	28.35	52.05	45.14	46.34	-5	51.00
	OOP 25th percentile (\$)	12.57	28.92	21.78	21.18	-14	30.00
	OOP 75th percentile (\$)	58.46	77.68	69.37	70.11	-5	75.75
Review of an EDP (GP)	Services	*	4,522	5,989	6,018	16	3,922
	Services bulk-billed (%)	*	81	73	66	-10	57
	Services with OOP (%)	*	17	25	31	34	39
	Median OOP (\$)	*	19.99	20.75	20.97	2	40.00
	OOP 25th percentile (\$)	*	10.69	10.94	11.44	3	15.55
	OOP 75th percentile (\$)	*	53.53	54.62	53.38	0	64.20
Psychological treatment service (GP)	Services	*	283	341	166	-15	87
	Services bulk-billed (%)	*	83	57	22	-47	13
	Services with OOP (%)	*	15	42	72	124	87
	Median OOP (\$)	-	-	-	57.93	-	139.70
	OOP 25th percentile (\$)	-	-	-	29.55	-	29.90
	OOP 75th percentile (\$)	-	-	-	147.96	-	139.70
Preparation of an EDP (OMP)	Services	*	203	192	121	-21	39.00
	Services bulk-billed (%)	*	98	92	95	-1	92
	Services with OOP (%)	*	*	*	*	*	*
	Median OOP (\$)	*	*	*	*	*	*
	OOP 25th percentile (\$)	*	*	*	*	*	*
	OOP 75th percentile (\$)	*	*	*	*	*	*
Review of an EDP (OMP)	Services	-	21	45	49	62	5
	Services bulk-billed (%)	-	95	80	69	-15	80
	Services with OOP (%)	-	*	*	*	*	*
	Median OOP (\$)	-	*	*	*	*	*
	OOP 25th percentile (\$)	-	*	*	*	*	*
	OOP 75th percentile (\$)	-	*	*	*	*	*
Psychological treatment service (OMP)	Services	*	*	*	*	*	-
	Services bulk-billed (%)	*	*	*	*	*	-
	Services with OOP (%)	*	*	*	*	*	-
	Median OOP (\$)	*	*	*	*	*	-
	OOP 25th percentile (\$)	*	*	*	*	*	-
	OOP 75th percentile (\$)	*	*	*	*	*	-

Note. OOP = out-of-pocket; EDP = eating disorder treatment and management plan; OMP = other medical professionals. '*' denotes data were suppressed because the raw value is less than 6; '-' denotes no data. Data include all claims for services received from 1 November 2019 to 31 July 2023. Fees charged, benefits paid, and

out-of-pocket costs are expressed in 2022 – 23 dollars. Estimates of out-of-pocket costs are based on services for which a co-payment was charged.

Table 2.12. Bulk-billing and out-of-pocket costs paid by consumers, for Eating Disorders MBS Items services delivered by allied health professionals, 2019 – 2023


		2019	2020	2021	2022	Average Annual Change (%) 2020 – 2022	2023 (up to 31 July)
Psychological treatment services (clinical psychologists)	Services	2,108	56,367	66,215	66,569	9	45,084
	Services bulk-billed (%)	9	20	12	9	-33	9
	Services with OOP (%)	88	78	87	91	8	91
	Median OOP (\$)	23.09	39.76	43.34	48.14	10	87.30
	OOP 25th percentile (\$)	16.02	18.19	19.03	19.75	4	25.85
	OOP 75th percentile (\$)	74.25	89.05	98.50	101.09	7	113.65
Psychological treatment services (psychologists)	Services	848	29,184	40,226	40,673	19	28,561
	Services bulk-billed (%)	8	17	10	8	-30	8
	Services with OOP (%)	89	80	89	91	7	91
	Median OOP (\$)	25.37	46.50	46.34	54.81	9	100.35
	OOP 25th percentile (\$)	19.58	21.51	22.16	24.25	6	29.40
	OOP 75th percentile (\$)	92.20	109.10	111.68	118.35	4	130.35
Psychological treatment services (social workers)	Services	*	2,683	4,634	4,685	37	3,271
	Services bulk-billed (%)	*	22	15	12	-28	8
	Services with OOP (%)	*	76	84	88	8	91
	Median OOP (\$)	*	28.54	31.42	42.26	22	80.95
	OOP 25th percentile (\$)	*	19.24	17.86	19.49	1	30.15
	OOP 75th percentile (\$)	*	81.46	87.67	97.65	10	105.95
Psychological treatment services (occupational therapists)	Services	*	76	203	448	144	291
	Services bulk-billed (%)	*	43	8	28	75	24
	Services with OOP (%)	*	32	89	72	81	76
	Median OOP (\$)	*	20.75	24.75	27.70	16	85.95
	OOP 25th percentile (\$)	*	15.00	19.44	22.19	22	21.00
	OOP 75th percentile (\$)	*	23.89	111.30	111.21	183	110.95
Dietetic health services (dietitians)	Services	1,173	33,611	51,159	56,682	32	35,076
	Services bulk-billed (%)	9	25	20	19	-13	14
	Services with OOP (%)	89	74	78	80	4	86
	Median OOP (\$)	23.79	31.85	31.64	36.01	7	59.00
	OOP 25th percentile (\$)	10.76	15.34	18.46	20.97	17	25.80
	OOP 75th percentile (\$)	54.02	76.03	87.56	100.51	15	114.00

Note. OOP = out-of-pocket; ‘*’ denotes data were suppressed because the raw value is less than 6; ‘-’ denotes no data. Data include all claims for services received from 1 November 2019 to 31 July 2023. Fees charged, benefits paid, and out-of-pocket costs are expressed in 2022-23 dollars. Estimates of out-of-pocket costs are based on services for which a co-payment was charged.

Table 2.13. Bulk-billing and out-of-pocket costs paid by consumers, for Eating Disorders MBS Items services delivered by consultant psychiatrists and consultant paediatricians, 2019 – 2023

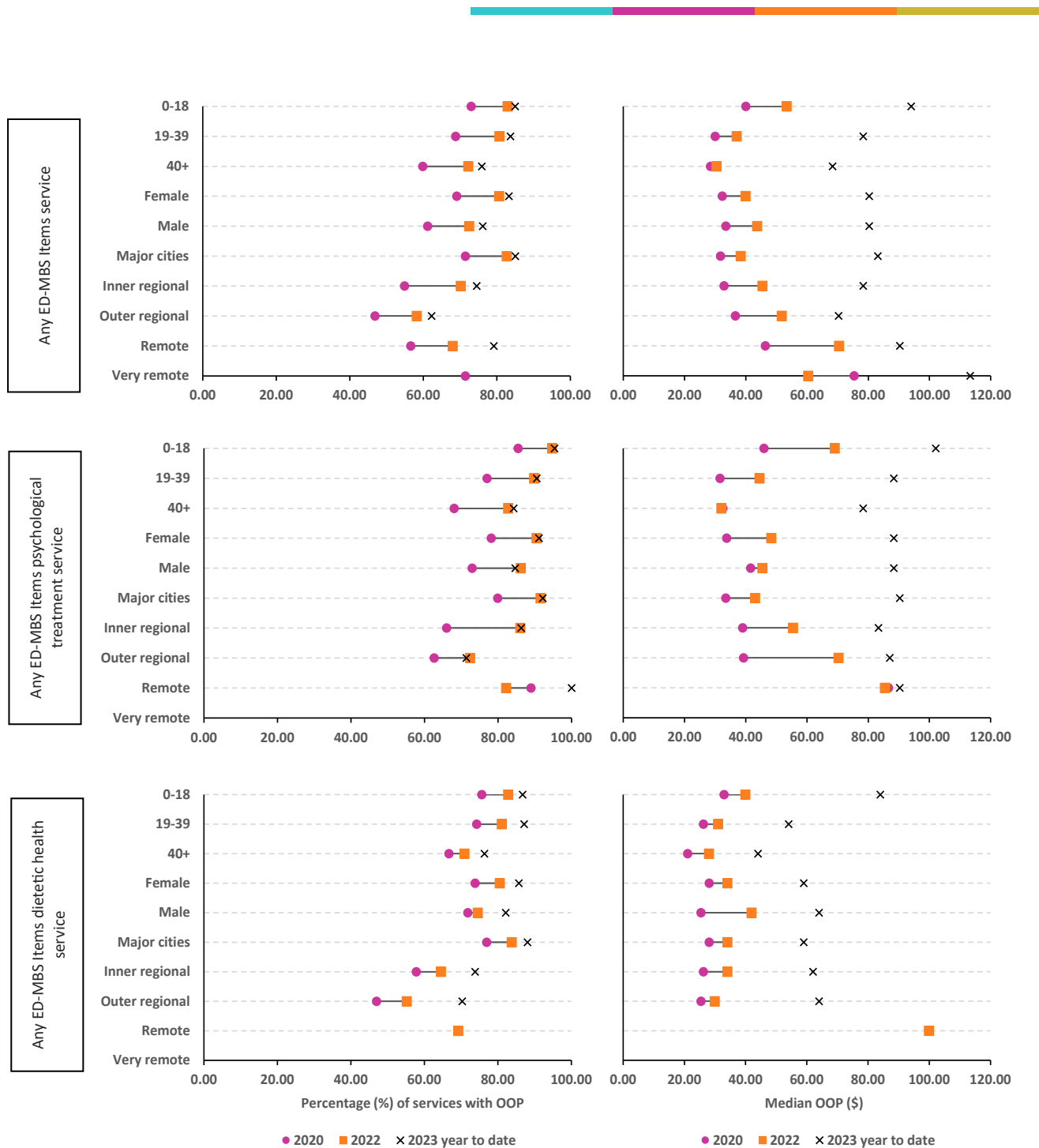
		2019	2020	2021	2022	Average Annual Change (%) 2020 – 2022	2023 (up to 31 July)
Preparation of an EDP (Consultant psychiatrist)	Services	74	472	452	415	-6	235
	Services bulk-billed (%)	64	71	59	66	-2	68
	Services with OOP (%)	22	17	27	21	17	23
	Median OOP (\$)	38.06	82.36	101.99	81.97	2	117.15
	OOP 25th percentile (\$)	20.34	54.93	59.90	39.35	-13	51.80
	OOP 75th percentile (\$)	72.03	147.9	203.92	205.09	19	262.85
Review of an EDP (Consultant psychiatrist)	Services	11	689	934	805	11	534
	Services bulk-billed (%)	*	26	20	19	-13	14
	Services with OOP (%)	82	57	68	68	10	80
	Median OOP (\$)	15.90	48.36	48.35	61.80	14	70.00
	OOP 25th percentile (\$)	13.56	22.78	27.39	30.03	15	38.35
	OOP 75th percentile (\$)	36.42	118.5	139.62	133.39	7	191.85
Preparation of an EDP (Consultant paediatrician)	Services	8	169	217	202	11	70
	Services bulk-billed (%)	*	31	33	47	24	39
	Services with OOP (%)	100	54	64	36	-13	56
	Median OOP (\$)	82.08	139.5	130.69	127.09	-5	120.00
	OOP 25th percentile (\$)	26.72	75.74	65.34	63.55	-8	59.25
	OOP 75th percentile (\$)	134.1	242.5	182.36	172.69	-15	159.25
Review of an EDP (Consultant paediatrician)	Services	*	108	195	154	30	82
	Services bulk-billed (%)	*	39	30	29	-13	37
	Services with OOP (%)	*	57	67	60	3	76
	Median OOP (\$)	*	69.75	66.81	72.65	2	150.10
	OOP 25th percentile (\$)	*	31.10	34.14	37.97	11	60.00
	OOP 75th percentile (\$)	*	130.6	143.05	186.77	20	225.10

Note. OOP = out-of-pocket; EDP = eating disorder treatment and management plan; '*' denotes data were suppressed because the raw value is less than 6; '-' denotes no data. Data include all claims for services received from 1 November 2019 to 31 July 2023. Fees charged, benefits paid, and out-of-pocket costs are expressed in 2022-23 dollars. Estimates of out-of-pocket costs are based on services for which a co-payment was charged.



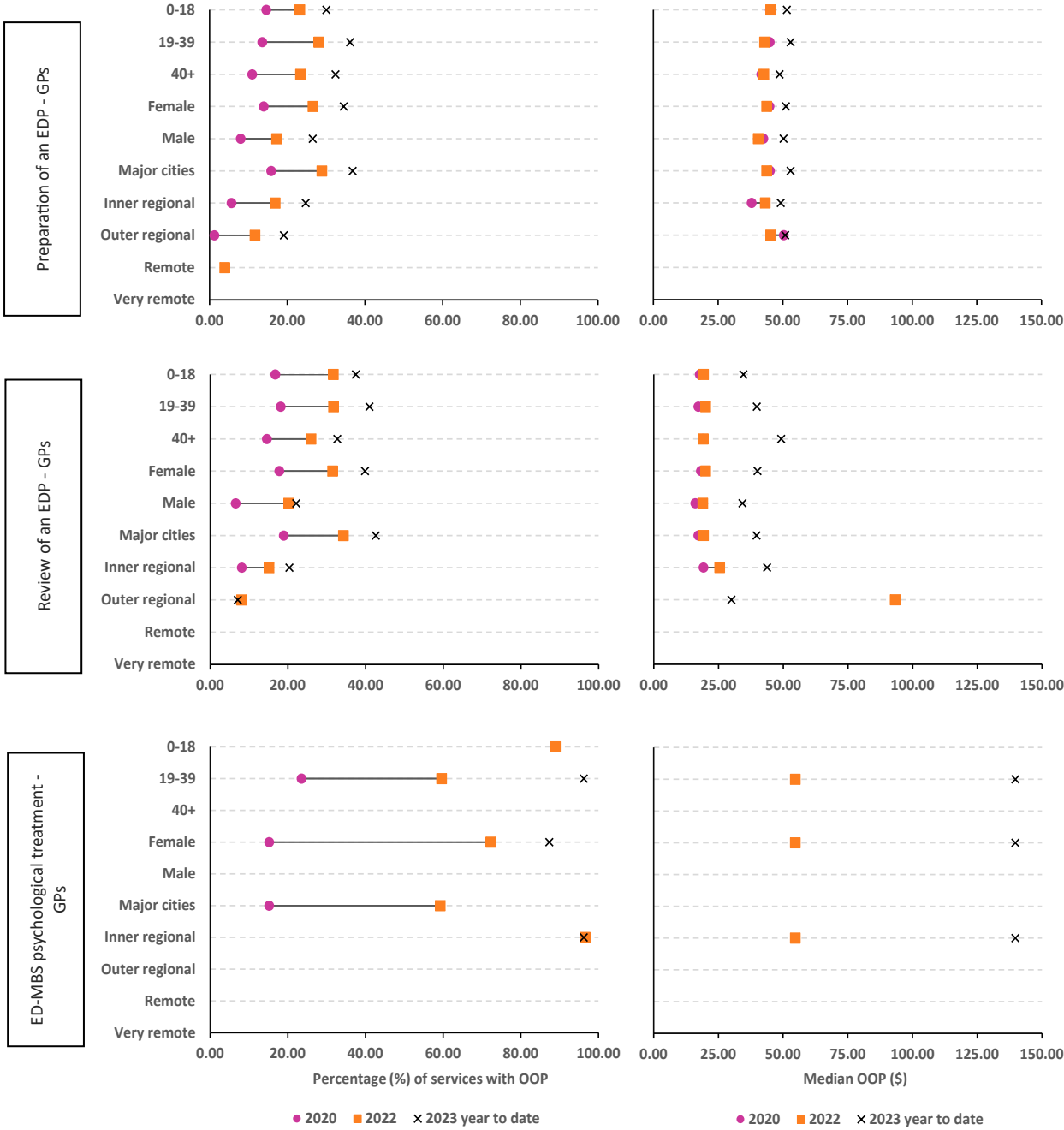
Figures 2.5 to 2.8 profile differences in co-payment rates and median out-of-pocket costs between sociodemographic groups and over time. These show that:

- Overall, co-payment rates tended to be higher for people aged 0 – 18 years, compared to those aged 19 – 39 and 40 and over. Median out-of-pocket costs were likely to be lower for people aged 40 and over, compared to all other age groups.
- Co-payment rates tended to be higher for females. However, there is no clear trend for median out-of-pocket costs. For example, the costs were slightly higher in males for any Eating Disorders MBS services while higher for females in several item groups (preparation of an EDP by GPs, psychological treatment services by clinical psychologists and psychologists).
- There was a gradient in co-payment rates whereby those living in major cities were more likely to make a co-payment compared to those in inner regional and outer regional areas (Figure 2.5). This was generally true across most providers and item groups where data was available. However, it is notable that this gradient did not necessarily extend to people living in remote areas – in some instances, the co-payment rates in remote areas were higher than outer regional areas.
- Overall, median co-payments were higher for people in regional and remote areas compared to major cities except for dietitian-related services (Figure 2.5). These patterns, however, varied across providers and item groups.



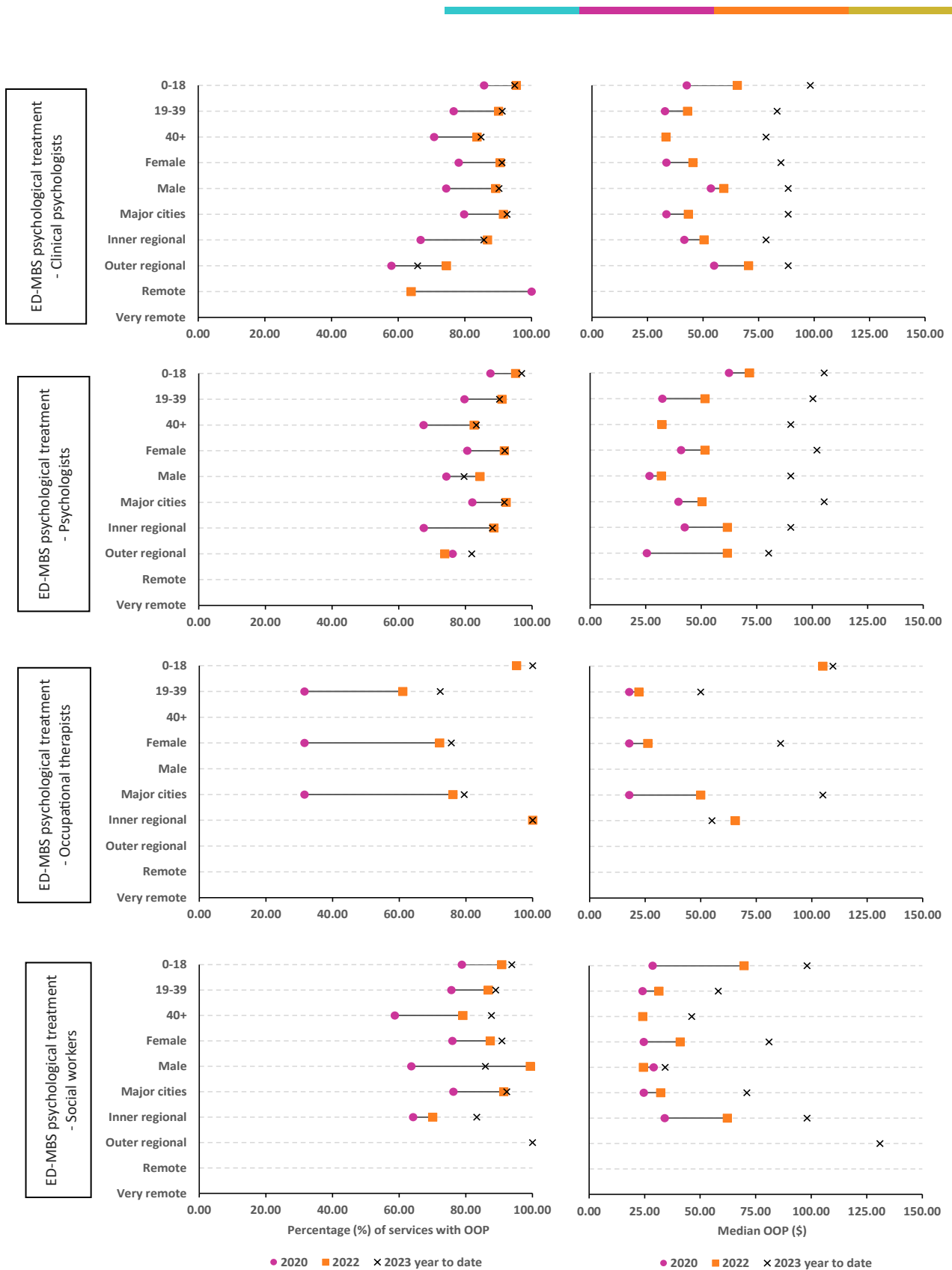
Note. 'Any ED-MBS Items service' refers to a service provided under any of the Eating Disorders MBS Items in Final Report Appendix 1. 'Any ED-MBS Items psychological treatment service' refers to a service provided under any of the following Eating Disorders MBS Items in Final Report Appendix 1: psychological treatment services delivered by GPs/other medical practitioners, clinical psychologists, psychologists, social workers, and occupational therapists. 'Any ED-MBS items dietetic health service' refers to a service provided under the following Eating Disorders MBS Items in Final Report Appendix 1: dietetic health services delivered by dietitians. The '2023 year to date' represents data available up to 31 July 2023.

Figure 2.5. Out-of-pocket costs for any Eating Disorders MBS items service and any Eating Disorders MBS items treatment service, by age, sex, and geographic location, 2020 – 2023



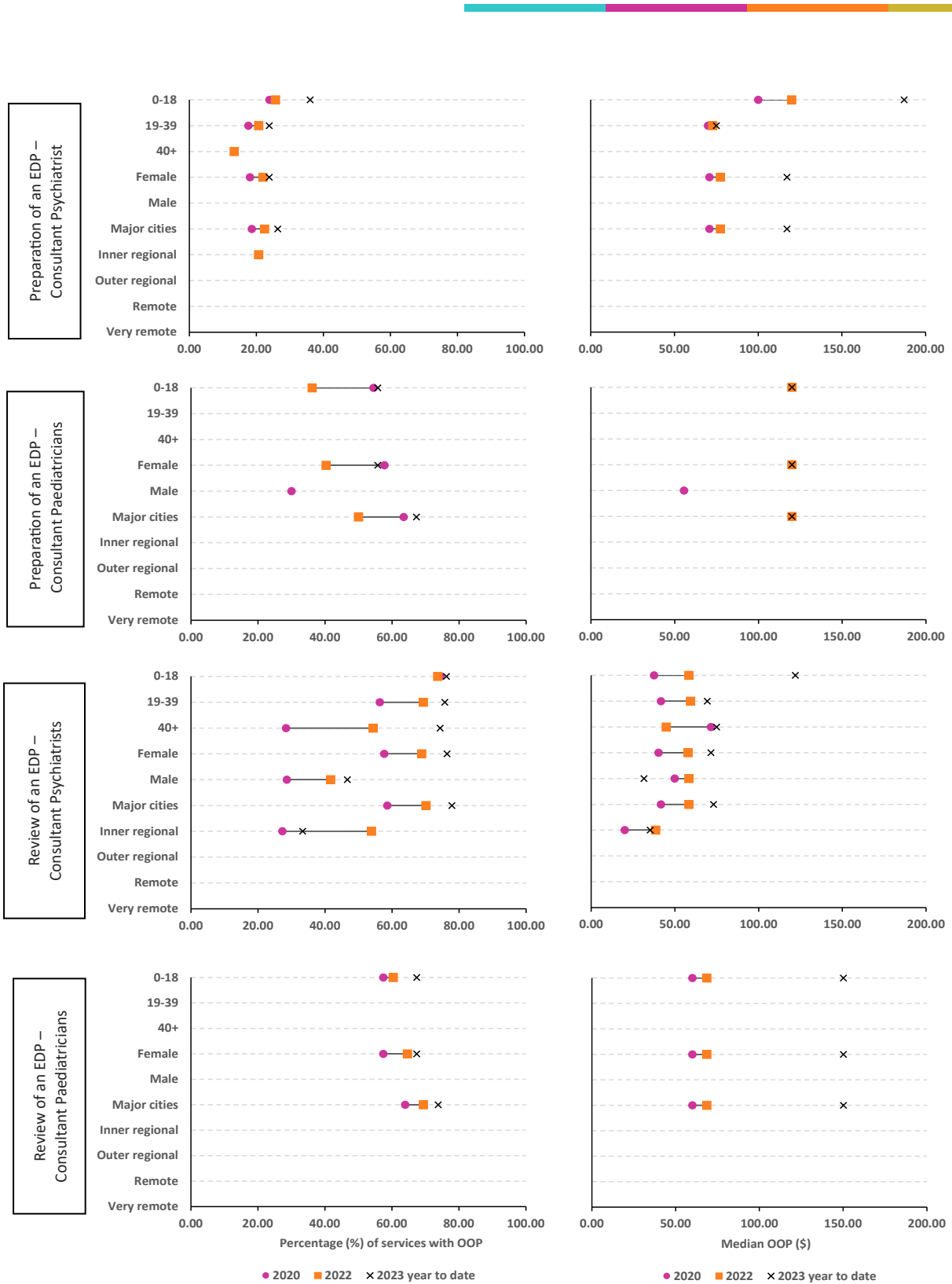
Note. EDP = eating disorder treatment and management plan. The '2023 year to date' represents data available up to 31 July 2023.

Figure 2.6. Out-of-pocket costs for Eating Disorders MBS Items services delivered by GPs by age, sex, and geographic location, 2020 – 2023



Note. The '2023 year to date' represents data available up to 31 July 2023.

Figure 2.7. Out-of-pocket costs for Eating Disorders MBS Items services delivered by allied health professionals, by sociodemographic factors, 2019 – 2022



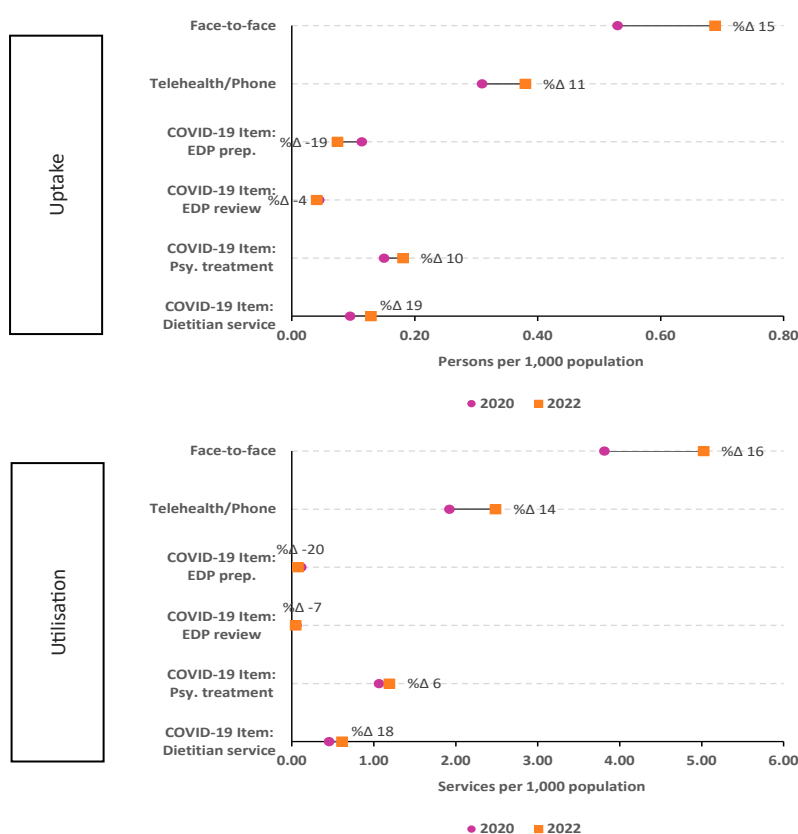
Note. EDP = eating disorder treatment and management plan. The '2023 year to date' represents data available up to 31 July 2023.

Figure 2.8. Out-of-pocket costs for Eating Disorders MBS Items services delivered by consultant psychiatrists and consultant paediatricians, by age, sex, and geographic location, 2020 – 2023

Changes in uptake and utilisation in response to initiative refinements

As described in the Final Report Appendix 2, there have been several changes to the Eating Disorders MBS Items initiative since 2019. Most of these changes relate to new item numbers that were added to help reduce the risk of community transmission of COVID-19 and to provide protection for patients and health care providers. One major change to Eating Disorders MBS Items has been the introduction of telehealth and phone treatment services in response to the COVID-19 pandemic. These new telehealth and phone items (referred to as “COVID-19 items” hereafter) were introduced on 13 March 2020 and replicated the existing face-to-face treatment, consultation, plan, and review items, and were available to all eligible consumers without geographical restriction.

Although not the main contributor of services during this period, the uptake and utilisation of COVID-19 items for psychological treatment and dietetic health services increased between 2020 and 2022 (Figure 2.19). Face-to-face services remained the most popular mode, followed by pre-COVID-19 telehealth/ phone services while the least used item was COVID-19 item for review of an EDP.



Note. ‘% Δ’, average annual percentage change 2020 – 2022. EDP prep = eating disorder treatment and management plan preparation; Psy. Treatment = psychological treatment.

Figure 2.9. Uptake and utilisation of Eating Disorders MBS Items services, by mode of delivery, 2020 – 2022

With the exception of COVID-19 items for preparation and review of an EDP, all delivery modes experienced an increase in average annual change (19% for COVID-19 dietitian services, 15% for face to-face and 11% for pre-COVID-19 telehealth/phone services). The same trend was also observed in the utilisation of these services.

Table 2.14 presents the differences in uptake rates of Eating Disorders MBS COVID-19 treatment items between sociodemographic groups and over time. In years 2020 to 2022, rates of uptake for psychological treatment (by any provider) were highest among females (compared to males), people aged 19 – 39 years (compared to those aged 0 – 18 and 40 and over), and people living in major cities and inner regional areas (compared to people living in outer regional, remote, and very remote areas). The same trend is observed for dietetic health services. Across all demographics, the average annual change was higher in dietetic health services compared to psychological treatment.

Table 2.14. Rates of uptake of sessions of COVID-19 treatment items by age, sex, and geographic location, 2019 – 2023

		2019	2020	2021	2022	Average Annual Change (%) 2020-2022	2023 Year to Date
ED-MBS psychological treatment – Any provider, COVID-19 items only	0 – 18	.	0.15	0.20	0.20	17	0.12
	19 – 39	.	0.34	0.40	0.41	10	0.35
	40+	.	0.04	0.04	0.04	5	0.04
	Female	.	0.29	0.34	0.35	10	0.27
	Male	.	0.01	0.01	0.01	4	0.01
	Major cities	.	0.18	0.21	0.21	10	0.17
	Inner regional	.	0.10	0.11	0.12	13	0.11
	Outer regional	.	0.04	0.05	0.06	18	0.05
	Remote	.	0.01	*	*	*	*
Very Remote	.	*	*	*	*	*	
ED-MBS dietetic health service – Dietitians, COVID-19 items only	0 – 18	.	0.10	0.16	0.14	22	0.08
	19 – 39	.	0.21	0.30	0.29	19	0.23
	40+	.	0.02	0.03	0.03	19	0.03
	Female	.	0.18	0.25	0.24	18	0.18
	Male	.	0.01	0.01	0.01	26	0.01
	Major cities	.	0.11	0.16	0.15	18	0.11
	Inner regional	.	0.06	0.08	0.09	25	0.06
	Outer regional	.	0.03	0.03	0.03	-2	0.03
	Remote	.	*	*	*	*	*
Very Remote	.	*	*	*	*	*	

Note. ‘*’ denotes data were suppressed because the raw value is less than 6; ‘-’ denotes no data. Data include all claims for services received from 1 November 2019 to 31 July 2023. Rates are crude rates per 1,000 total population.

Typical patterns of Eating Disorders MBS items treatment

The next few analyses explore patterns of treatment following preparation of an eating disorder treatment and management plan (EDP). For these analyses, the year refers to the year in which the EDP was prepared, however the services that followed may have been used in the same calendar year as the plan or in the subsequent year. Note that a consumer can continue the same EDP for 12 months only, and a new plan needs to be created at the end of 12 months for access to continuing

treatment services. The following patient groups of interest have been identified as representing typical treatment scenarios:

Group 1 refers to those that have used an EDP but did not receive any psychological treatment or dietetic health services thereafter. Group 2 refers to those that have used an EDP, followed by one or more psychological treatment or dietetic health services and subsequently did not use an additional EDP. Group 3 refers to those that have used an EDP, followed by one or more psychological treatment or dietetic health services, followed by a second EDP, followed by one or more psychological treatment or dietetic health services and subsequently did not use a further EDP. Group 4 refers to those that have used an EDP, followed by one or more psychological treatment or dietetic health services, followed by a second EDP, followed by one or more psychological treatment or dietetic health services, followed by a third EDP, and followed by one or more psychological treatment or dietetic health services.

Among the treatment scenarios, Group 2 has the highest number of patients across all age groups, sex, and locations (Table 2.15). In other words, over a 33-month period (1 November 2019 and 31 July 2023), most Eating Disorders MBS users have utilised only one EDP and received at least one psychological treatment or dietetic health service. The second most common treatment scenario is represented by Group 1 – Eating Disorders MBS users that have utilised only one EDP but did not receive any type of psychological treatment or dietetic health services. Similar to the demographic patterns observed for the overall population (i.e., Figure 2.1), individuals aged 19 – 39 years, females and those living in major cities formed the largest proportion of Eating Disorders MBS users in all patient groups of interest (i.e., Groups 1 to 4). The distribution of types of sessions following an EDP did not differ between the treatment scenarios (Table 2.16); the highest number of persons and services was associated with psychological treatment by allied health professionals, followed by dietetic health services, review of an EDP (any provider) and psychological treatment by GPs/other medical practitioners.

Table 2.15. Number of patients that had an EDP (any provider) by typical treatment groups and sociodemographic characteristics

	Group 1 <i>n</i> (%)	Group 2 <i>n</i> (%)	Group 3 <i>n</i> (%)	Group 4 <i>n</i> (%)
Age group				
0 – 18	5,285 (26)	12,184 (61)	1,966 (10)	680 (3)
19 – 39	6,840 (27)	14,458 (57)	2,526 (10)	1,633 (6)
40+	2,568 (35)	3,870 (53)	488 (7)	378 (5)
Sex				
Female	12,680 (27)	27,786 (58)	4,740 (10)	2,618 (5)
Male	2,013 (40)	2,726 (54)	240 (5)	73 (1)
Geographical area				
Major cities	10,683 (26)	23,382 (58)	4,110 (10)	2,321 (6)
Inner regional	2,822 (32)	5,082 (57)	667 (7)	317 (4)
Outer regional	1,002 (35)	1,677 (58)	163 (6)	46 (2)
Remote	75 (33)	143 (63)	9 (4)	* (< 1)
Very remote	7 (30)	16 (70)	* (< 1)	- (0)

Note. ‘*’ denotes data were suppressed because the raw value is less than 6; ‘-’ denotes no data. Data include all claims for services received from 1 November 2019 to 31 July 2023.

Table 2.16. Types of sessions following an EDP by typical treatment groups

		Group 1	Group 2	Group 3	Group 4
Preparation of an EDP – any provider	Persons	14,693	30,512	4,980	2,691
	Services	15,104	30,512	10,090	8,885
Review of an EDP – any provider	Persons	-	5,347	3,107	2,267
	Services	-	7,412	6,448	9,313
Psychological treatment by GP/OMP	Persons	-	120	28	*
	Services	-	686	261	*
Psychological treatment by allied health professionals	Persons	-	15,228	4,597	2,613
	Services	-	132,672	108,695	142,728
Dietetic health service by dietitians	Persons	-	12,590	3,700	2,157
	Services	-	71,484	46,528	50,459

Note. OMP = other medical professionals. Allied health professionals include clinical psychologists, psychologists, social workers, and occupational therapists. Data include all claims for services received from 1 November 2019 to 31 July 2023.

Relationship between use of Eating Disorders MBS items services and other health initiatives

We explored patterns of use of non-Eating Disorders MBS Items services, such as Better Access and Chronic Disease Management items among the four patient groups of the Eating Disorders MBS Items initiative for the period between 1 November 2019 and 31 July 2023.

Better Access MBS items

Table 2.17 presents information around the use of both an EDP and Better Access MBS items for the four patient groups by sociodemographic characteristics. In all treatment scenarios, the largest group (in terms of number of patients) for age, sex and geographical area was people aged 19 – 39 years, females, and people living in major cities, respectively. Most Eating Disorders MBS Items users also used at least one Better Access MBS item; 75% or more across all sociodemographic groups (Table 2.17). In addition, the proportion of patients that used both Eating Disorders MBS and Better Access MBS items was generally higher for patient groups that had accessed more EDPs.

Table 2.17. Number of patients that used both an EDP (any provider) and any Better Access MBS items by typical treatment groups and sociodemographic characteristics

	Group 1		Group 2		Group 3		Group 4	
	<i>n</i>	% of ED-MBS	<i>n</i>	% of ED-MBS	<i>n</i>	% of ED-MBS	<i>n</i>	% of ED-MBS
Age group								
0 – 18	4,708	89	11,430	94	1,902	97	669	98
19 – 39	6,158	90	13,777	95	2,461	97	1,621	99
40+	2,063	80	3,608	93	464	95	372	98
Sex								
Female	11,300	89	26,252	94	4,597	97	2,589	99
Male	1,629	81	2,563	94	239	96	73	100
Geographical area								
Major cities	9,447	88	22,053	94	3,980	97	2,293	99
Inner regional	2,483	88	4,827	95	651	98	316	100
Outer regional	853	85	1,580	94	156	96	46	100
Remote	57	76	133	93	9	100	*	-
Very remote	6	86	16	100	*	-	-	-

Note. % of ED-MBS denotes the proportion of Eating Disorders MBS Items users that used any Better Access MBS items (i.e., denominators are from Table 2.15). Data include all claims for services received from 1 November 2019 to 31 July 2023. ‘*’ reflects data were suppressed because the raw value is less than 6; ‘-’ reflects no data.

Chronic Disease Management MBS Item

Table 2.18 presents information around the use of both an EDP and Chronic Disease Management dietetic treatment services for the four patient groups by sociodemographic characteristics. Similar to Better Access, the largest group (in terms of number of patients) for age, sex and geographical area was people aged 19 – 39 years, females, and people living in major cities, respectively, in all treatment scenarios. Less than half of Eating Disorders MBS Items users also used at least one Chronic Disease Management dietetics treatment service. In addition, the proportion of patients that used both Eating Disorders MBS and Chronic Disease Management dietetics treatment services was generally higher for patient groups that had accessed more EDPs.

Table 2.18. Number of patients that used both an EDP (any provider) and any Chronic Disease Management dietetics treatment services by typical treatment groups and sociodemographic characteristics

	Group 1		Group 2		Group 3		Group 4	
	<i>n</i>	% of ED-MBS	<i>n</i>	% of ED-MBS	<i>n</i>	% of ED-MBS	<i>n</i>	% of ED-MBS
Age group								
0 – 18	648	12	2,383	20	581	30	222	33
19 – 39	1,010	15	3,291	23	836	33	694	42
40+	439	17	1,056	27	199	41	176	47
Sex								
Females	1,881	15	6,196	22	1,540	32	1,071	41
Male	216	11	534	20	76	32	21	29
Geographical area								
Major cities	1,612	15	5,197	22	1,331	32	981	42
Inner regional	390	14	1,184	23	250	37	104	33
Outer regional	95	9	326	19	35	21	7	15
Remote	*	-	8	6	*	-	*	-
Very remote	*	-	*	-	-	-	-	-


Note. EDP = eating disorder treatment and management plan. % of Eating Disorders MBS denotes the proportion of Eating Disorders MBS Items users that used any Better Access MBS items (i.e., denominators are from Table 2.15). Data include all claims for services received from 1 November 2019 to 31 July 2023. ‘*’ reflects data were suppressed because the raw value is less than 6; ‘-’ reflects no data.

Discussion

Summary and interpretation of findings

This study showed that the Eating Disorders MBS Items initiative has continued to grow since its introduction in November 2019. In 2022, one in every 1,300 Australians received at least one Eating Disorders MBS service, one in 2,273 received at least one session of psychological treatment and one in 2,941 received at least one dietetic health service session through the Eating Disorders MBS Items. In recent years, the number of people treated has increased more than the treatment services delivered. For every person who received treatment through Eating Disorders MBS in 2022, 10.12 sessions were used (down from 10.80 in 2020).

In 2022, psychological treatment services made up the majority of total Eating Disorders MBS services (59%), followed by dietetic health services (29%). However, over the period from 2020 to 2022, the rate of growth in dietetic health services (32%) was higher than the rate of growth of psychological treatment services (13%). Among health providers, GPs had the highest rate of delivering Eating Disorders MBS services related to preparation and review of an EDP while psychologists (both clinical and non-clinical) had the highest rate of delivering psychological



treatment services. This finding is consistent with Study 1, which reported that most eating disorder treatment plans were prepared by GPs and psychological treatment was predominantly conducted by clinical psychologists and psychologists.


In 2022, uptake and utilisation tended to be higher among females (compared to males), people aged 19 – 39 years (compared to those aged 0 – 18 or 40 and over), and people living in major cities and inner regional areas (compared to people in outer regional and remote areas). For many of these same groups (females, people aged 19 – 39 years, people in major cities), increases in utilisation were particularly apparent between 2020 and 2022. On the other hand, people aged 40 and over, males, and people living in regional and remote areas experienced relatively lower uptake and utilisation. However, positive rates of growth (i.e., average annual change) in uptake and utilisation were also observed in these groups (people aged 40 and over, males and people living in regional and remote areas), which were sometimes higher than their comparison group(s).

Consumers also faced increasing costs to access the Eating Disorders MBS Items. Co-payment rates increased across all types of Eating Disorders MBS services with the largest increase recorded in 2021. In 2021, 77% of all Eating Disorders MBS services involved a co-payment by the consumer (up by 8% per year from 69% in 2020) and 87% of Eating Disorders MBS psychological treatment services involved a co-payment (up by 9% per year from 78% in 2020). For services where the consumer paid a co-payment, the median out-of-pocket cost for any Eating Disorders MBS service was \$42 in 2022 (up from \$38 in 2020) and increased considerably to \$80 in the first seven months of 2023. It was \$51 for any Eating Disorders MBS psychological treatment service (up from \$39 in 2020) and increased to \$88 in the first seven months of 2023. A similar pattern was observed for dietetic health services. Increases in co-payment rates and median out-of-pocket costs were greatest for allied health professionals, a finding that reflects the increase in utilisation of psychological treatment and dietetic health services over the same period. The increasing trend in co-payment rates and relatively high treatment costs are concerning, given that it may lead to consumers delaying or not using a service at all.

When compared against the Better Access program for mental health, the co-payment rates were higher for the Eating Disorders MBS Items. For example, in 2021, less than half (46.6%) of all Better Access services involved a co-payment while 77% of all Eating Disorders MBS services involved a co-payment. The same pattern is observed for treatment-related services between the two initiatives. However, in the same year, the median out-of-pocket cost for all services was higher in Better Access (\$74) when compared to Eating Disorders MBS Items (\$38). The median out-of-pocket cost for treatment-related services was also higher in Better Access (\$74) relative to Eating Disorders MBS items (\$44).

The introduction of new telehealth and phone items as a response to COVID-19 appears to have influenced the ways people receive psychological treatment and dietetic health services through the Eating Disorders MBS Items initiative. While the dominant delivery mode remains face-to-face service provision, the uptake and utilisation of these new telehealth and phone treatment services increased over recent years. This suggests a net gain in treatment-related service use across all delivery modes and a wider reach to underserved populations.

Over the period from 1 November 2019 to 31 July 2023, the typical patient treatment scenario involved the use of one EDP and followed by one or more psychological treatment or dietetic health



service. Less common treatment scenarios were patients with multiple EDPs or patients that had an EDP but did not receive any treatment-related service. Given that data on patients' start date of EDP and number of treatment services received were not available, it is difficult to make any inference on potential treatment outcomes.

Strengths and limitations

This study utilised complete MBS data for Eating Disorders MBS Items initiative covering a 3.75-year period, from 1 November 2019 up to 31 July 2023. The start date for the supplied data was set at 1 November 2019, which allowed us to examine any significant changes made to the initiative since its inception and how they may have impacted on patterns of Eating Disorders MBS Items care.

One limitation of this study is that we were unable to assess the levels of consumer needs using Eating Disorders MBS Items and to investigate any potential association between need and types of care received under Eating Disorders MBS Items. This was due to the lack of clinical characteristics of consumers such as diagnosis, levels of psychological distress, or other measures of severity and psychosocial function in routinely collected MBS data by Medicare. However, other studies in the current evaluation were able to consider some of these issues.

Another limitation of this study is that we were unable to provide information about the outcomes of care for people who receive Eating Disorders MBS services, as such information are not routinely collected by Medicare. However, this information can be found in other parts of this evaluation. For example, Study 4 examined patient outcomes and satisfaction using an online survey with a population-representative sample.

Conclusion

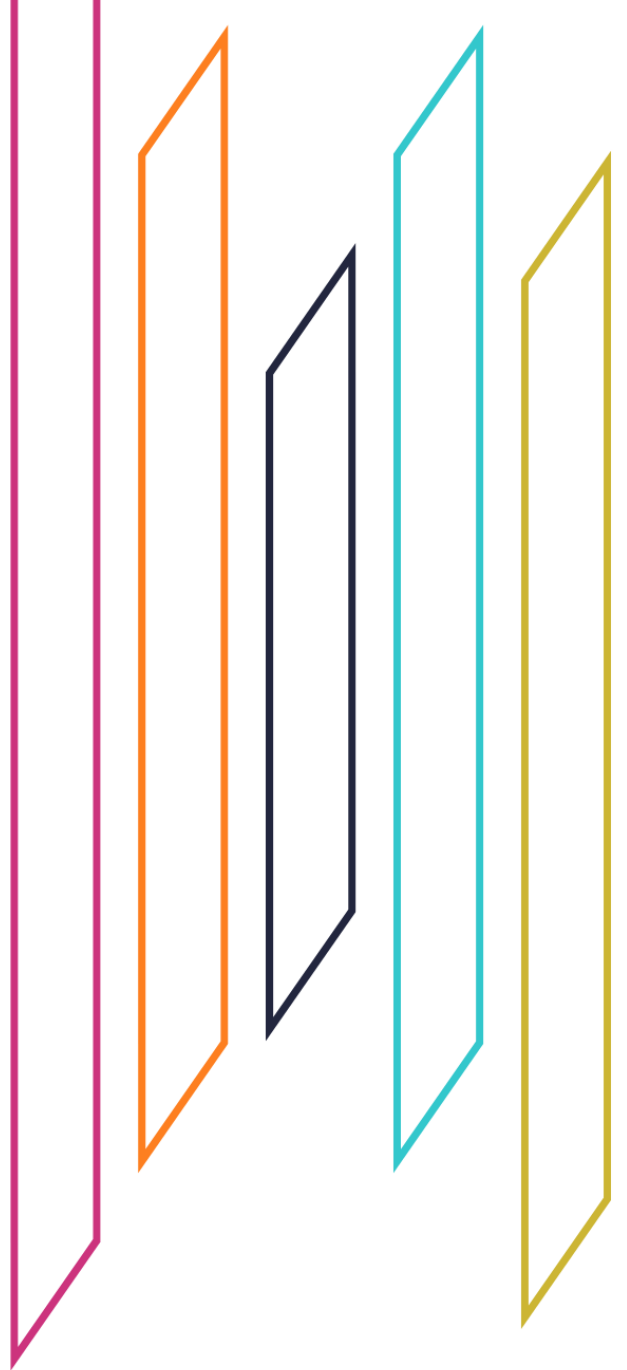
The analysis of MBS data in this study provided insights into the uptake and utilisation of Eating Disorders MBS Items services nationwide. It revealed a growth in service provision, attributed partly to recent initiative enhancements such as the introduction of new telehealth and phone treatment items (as a response to COVID-19). In recent years, the number of people treated has increased more than the number of services delivered. Notably, the estimated average number of treatment sessions per patient declined from 10.80 in 2020 to 10.12 in 2022. Concurrently, consumers experienced rising treatment costs, as evidenced by declining bulk-billing rates, and increasing out-of-pocket costs from 2020 to 2022. In addition to these changes in the costs and uptake of Eating Disorders MBS Items, our analysis suggested that the initiative appears to be utilised by some groups more than others (such as young adults, females and people living in major cities).



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Chapter 3. Evaluation of pre-existing datasets (Study 3)





Chapter 3. Evaluation of pre-existing datasets (Study 3)

Eating disorders prevalence and symptom severity and association with help-seeking

Introduction

In November 2019, the Australian Government introduced new eating disorder treatment items to the Medicare Benefits Schedule (MBS) with the vision of enhancing treatment outcomes for individuals with eating disorders through expanded treatment offerings, more pathways for care, and extended number of sessions available per year. To date, the efficacy of this approach remains unclear and needs empirical evaluation.

This study is part of a broader body of research commissioned by the Department of Health and Aged Care to evaluate the impact of introduction of these new Eating Disorders MBS items. Other studies in the overall project explore healthcare use based on Services Australia data (Studies 1, 2, and 4) or obtain survey and interview data directly from individuals with lived experience of an eating disorder, carers, and healthcare providers (Studies 4, 6, and 7).

These other studies provide vital information about individuals who have utilised these Eating Disorders MBS items. Yet, the focus on those who have utilised these services may miss individuals who are eligible but choose not to access these services. And, while MBS and Pharmaceutical Benefit Scheme (PBS) data (Studies 1, 2, and 4) allow researchers to characterise the breadth of healthcare services an individual utilises, these data sources do not directly link to individual-level difference factors that may contextualise usage patterns, such as eating disorder and broader mental health symptom severity, personality factors, and perceived level of support from family, friends, and others.

The present chapter attempts to address several of these gaps in other studies in this broader project, by drawing upon pre-existing longitudinal datasets (the Longitudinal Study of Australian Children 1 and the EveryBODY project 2,3) that include detailed psychological variables as well as demographic and health service utilisation information. These samples are broad cross-sections of the Australian population and include individuals who seek treatment as well as those who may be eligible yet for various reasons do not.

The Longitudinal Study of Australian Children (LSAC) provides a nationally representative sample that follows children (two cohorts: one commencing at age 0 – 1 and the other commencing at ages 4 – 5) over nine waves of data since 2004. LSAC includes MBS data linkage, as well as survey-based data on demographics, help seeking, psychological health, disordered eating symptoms, and other potentially relevant constructs such as personality factors and perceived social support. The EveryBODY study is an adolescent secondary school cohort of 12 – 19 year olds followed over three waves, and includes a breadth of eating disorder items not covered in LSAC.



In the present chapter, these pre-existing data sources are interrogated to evaluate:

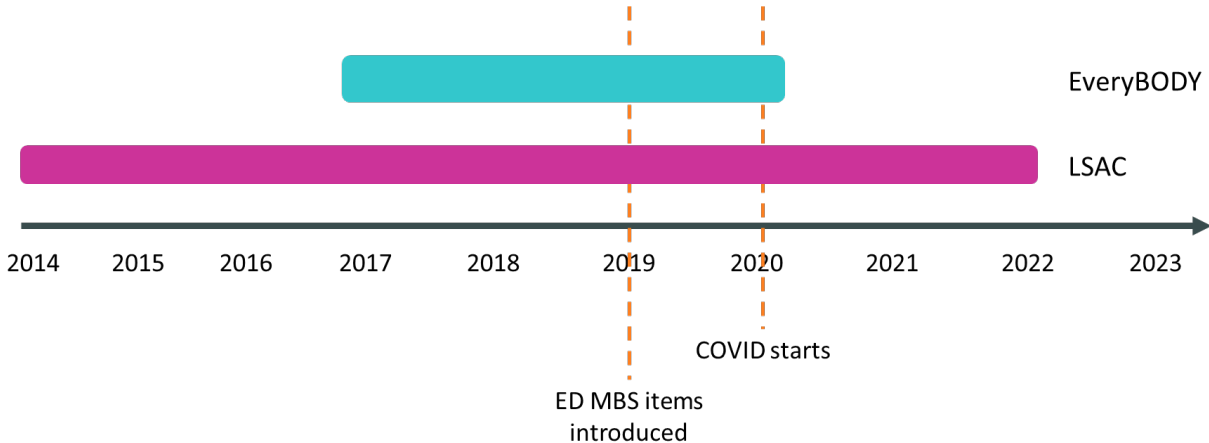
- 1. Prevalence of help seeking behaviour, both via MBS and other forms;
- 2. Cross-sectional associations between help seeking behaviour and eating disorder/mental health symptom severity;
- 3. Extent to which symptom severity predicts engagement in help seeking behaviours (MBS and other); and
- 4. Extent to which use of help seeking reduces symptoms over time.

Methods

Datasets

The LSAC dataset is available as non-identifiable, downloadable data from the Australian Government Department of Social Services, Australian Data Archive (ADA). Access to this dataset required approval from the ADA based on the proposed use of the data and researchers involved. The EveryBODY project data set is not publicly available; access to these data were made available by the lead author (Dr Deborah Mitchison) who is also a contributor to the Eating Disorders MBS evaluation project. Ethics approval was granted for the purpose of this study (DUHREC ID: 2023-383).

As shown in Figure 3.1, there is some overlap in time periods for the two datasets, though LSAC extends further back in time. For the purposes of this study, we rely on later waves of LSAC (Waves 6 – 9; starting 2014) and do not access the full range of data from this dataset (to 2004) as eating disorder symptoms are not measured until Wave six. Figure 3.1 also shows that both LSAC and EveryBODY include data prior to and subsequent to introduction of the Eating Disorders MBS items, and pre-, during, and post-COVID commencement. The remainder of this Methods section provides more extensive detailing of the two datasets.



Note. ED = eating disorders.

Figure 3.1. Time periods for data collection across data sets

LSAC dataset

Development for the LSAC commenced in March 2002 with a testing phase involving over 500 families that continued through 2003. Recruitment for the main study took place between March and November 2004, which involved a sample of 10,000 children selected from the Medicare enrolment database held by the Health Insurance Commission. Two cohorts were selected from children born within two 12-month periods:

- B cohort (infant cohort) were children born between March 2003 – February 2004; and
- K cohort (child cohort) were children born between March 1999 – February 2000.

The Health Insurance Commission selected children of the appropriate ages and sent a study invitation letter to the Medicare cardholder, along with a brochure on ‘Growing Up in Australia: The Longitudinal Study of Australian Children’ that identified the research-related purposes of this data collection. Families had four weeks to register their withdrawal from the study. Interviewers subsequently contacted families who had not withdrawn to arrange an appointment for their first interview.

From 2004, participating families have been interviewed every two years, for a total of nine waves of data collection to date. The present chapter focuses on Waves 6 – 9. Waves 6 – 8 included items measuring eating disorder symptoms and diagnosis types as well as other items of interest for this chapter, such as help seeking, mental health, anxiety, depression, self-harm, quality of life, self-efficacy, resilience, temperament, future outlook, optimism, strengths and difficulties, personality, risk-taking, social support bullying, stressful life events, and general development.

Wave 9 had two online surveys: 9C1 and 9C2. Data for 9C1 were collected from October to December 2020. Data for 9C2 were collected from June to September 2021. Wave 9C2 was designed to be a follow-up to 9C1, which would capture shorter-term impacts of the coronavirus pandemic on young people and recent natural disasters and extreme weather events, such as the 2019/20 bushfires, on key indicators. Following a low response rate in 9C1, a Computer Assisted Telephone Interview (CATI) mop-up interview was also introduced in 9C2. Both 9C1 and 9C2 surveys were significantly shortened compared with previous waves and focused on key measures and following the impacts of COVID-19. The key measures in Wave 9 relevant to this chapter included help seeking, accessing medical services and stresses and difficulties. For further details of the full set of waves and measures, refer to Mohal et al. ¹.


The sample at Wave 1 for K cohort was 4,983 and for B cohort was 5,107. After accounting for drop-out, the response rates relative to Wave 1 are presented by cohort and wave in Table 1. Wave 9 had substantially lower response rates than earlier waves, though there is clear drop-off over time.

Table 1. Sample sizes for waves used in this study relative to samples as Wave 1

Cohort	Wave 6	Wave 7	Wave 8	Wave 9C1	Wave 9C2
B	3,764 (73.7)	3,381 (66.2)	3,127 (61.2)	2,017 (40.4)	2,688 (52.6)
K	3,537 (71.0)	3,089 (62.0)	3,037 (60.9)	1,789 (35.9)	2,463 (49.4)

Note. n (%).

LSAC measures



Eating disorder-related measures

Questions aimed at assessing eating disorder symptoms and diagnosis type were included in LSAC in Wave 6 (2014) and Wave 7 (2016) for cohort K, and in Wave 8 (2018) for both cohorts K and B. Eating disorder measures were not included in Waves 9C1 and 9C2.

In Wave 6 of LSAC, K cohort children completed a screening tool for eating disorders adapted from the Diagnostic and Statistical Manual v3-R. The Branched Eating Disorders Test (BEDT)⁴ allows partial syndromal eating disorders to be identified. Partial syndromal eating disorders are identified where the young person has at least two of the three diagnostic criteria for anorexia nervosa or bulimia nervosa included in the Diagnostic and Statistical Manual v3-R.

Respondents meeting two of the following three diagnostic criteria were classified as having partial syndromal bulimia nervosa:

1. Reporting their weight as being 'very important' to how they feel about themselves as a person.
2. Reporting they have lost control of their eating or have eaten much too much at least weekly for at least three months.
3. Reporting one of the following behaviours, lasting at least three months:
 - a. making themselves vomit as a means to control weight at least once per week;
 - b. taking tablets, medicines or drugs to control their weight at least once per week;
 - c. going all day without eating to control weight on four or more days per week;
 - d. exercising in order to control weight six or seven days a week for two or more hours.

Respondents meeting two of the following diagnostic criteria were classified as having partial syndromal anorexia nervosa:

1. Being assessed as having a very low body weight, sourced from their Body Mass Index (BMI)
2. Reporting feeling afraid that they will gain weight on two to three days a week or more;
3. Reporting being 'very' or 'extremely' concerned about gaining weight and being assessed as having a lower BMI than normal.
4. Reporting their weight as being 'very important' to how they feel about themselves as a person;
5. Reporting themselves as being 'somewhat overweight' or 'very overweight' and being assessed as having a lower BMI than normal.
6. Reporting not having had their period in the last three months and not being pregnant at the time of interview (female respondents who have started menstruating only).

In Wave 6 of LSAC, an adapted form of the Adolescent Dieting Scale4 (ADS)⁵ was used for K cohort children (aged 14 – 15). Individual eating disorder items and diagnosis type included in each wave by cohort is shown in Table 2.

Table 2. LSAC eating disorder items and diagnosis type

LSAC eating disorder items	Cohort K			Cohort B
	Wave 6 2014 14 – 15 years	Wave 7 2016 16 – 17 years	Wave 8/2018 18 – 19 years	Wave 8/2018 14 – 15 years
Leave food at meal times – to avoid putting on weight	✓	✓	x	x
Have eaten too much – eat less than usual on the next day	✓	x	x	x
Take small helpings – to keep weight under control	✓	✓	x	x
Skip meals other than breakfast	✓	✓	x	x
How would you feel if you gained one to two kilograms	✓	✓	x	x
Last 4 weeks – Have you been afraid you might gain weight	✓	x	x	x
Last 4 week – Frequency you feel afraid you might gain weight	✓	x	x	✓
How concerned were you that you might gain weight	✓	✓	✓	✓
How important is weight in how you feel about yourself	✓	x	x	✓
How do you feel about your weight at the moment	✓	✓	✓	✓
Last 4 weeks – Gone all day without eating to control weight	✓	x	x	✓
Last 4 weeks – Frequency you have gone all day without eating	✓	✓	x	✓
How long have you been having days without eating	✓	✓	x	✓
Last 4 weeks – Felt that you lost control of your eating	✓	x	x	✓
How often during the last 4 weeks have you felt like this	✓	x	x	✓
Duration of feelings – You have lost control of your eating	✓	x	x	✓
When you lose control of eating, how hard is it to stop	✓	x	x	✓
Amount of food you would eat in less than 2 hours	✓	✓	✓	✓
Last 4 week – tablet/medicine/drug to weight control	✓	✓	✓	✓
Laxatives	✓	✓	✓	✓



	Cohort K			Cohort B
	Wave 6 2014 14 – 15 years	Wave 7 2016 16 – 17 years	Wave 8/2018 18 – 19 years	Wave 8/2018 14 – 15 years
LSAC eating disorder items				
Diuretics	✓	✓	✓	✓
Appetite suppressants	✓	✓	✓	✓
Other drugs	✓	✓	✓	✓
How often have you taken laxatives	✓	✓	✓	✓
How often have you taken diuretics	✓	✓	✓	✓
How often have you taken appetite suppressants	✓	✓	✓	✓
How often have you taken other drugs	✓	✓	✓	✓
How long have you been taking laxatives	✓	✓	✓	✓
How long have you been taking diuretics	✓	✓	✓	✓
How long have you been taking appetite suppressants	✓	✓	✓	✓
How long have you been taking other drugs	✓	✓	✓	✓
How many laxatives would you take in a day	✓	✓	✓	✓
How many diuretics would you take in a day	✓	✓	✓	✓
How many appetite suppressants you take in a day	✓	✓	✓	✓
How many other drugs would you take in a day	✓	✓	✓	✓
Vomit as a means of controlling your shape or weight	✓	✓	✓	✓
How often have you made yourself vomit	✓	✓	✓	✓
How long have you been making yourself vomit	✓	✓	✓	✓
Last 4 week – Exercise in order to control weight	✓	✓	✓	✓
Frequency exercised in order to control your weight	✓	✓	✓	✓
Time spent exercising per day	✓	✓	✓	✓
How long have you been exercising	✓	✓	✓	✓
ED diagnosis– partial syndromal bulimia nervosa	✓	✓	✓	✓

	Cohort K		Cohort B	
	Wave 6 2014 14 – 15 years	Wave 7 2016 16 – 17 years	Wave 8/2018 18 – 19 years	Wave 8/2018 14 – 15 years
LSAC eating disorder items				
ED diagnosis– partial syndromal anorexia nervosa	✓	✓	✓	✓
ED diagnosis – partial syndromal anorexia nervosa and/or bulimia nervosa	✓	✓	✓	✓

Note. LSAC = Longitudinal Study of Australian Children, ED = eating disorder.

Additional survey-based measures

In addition to eating disorder measures, Waves 6 – 9 of LSAC also included measures of broader mental health symptoms such as anxiety, depression, quality of life, mental health, and personality measures that may also relate to eating disorder symptoms and help seeking behaviours. Many of these constructs were measured using validated scales including the Kessler Psychological Distress Scale (K-10) ⁶, the Short Mood & Feelings Questionnaire (SMF) ⁷, the Big Five Personality Inventory ⁸, the Strength and Difficulties Questionnaire (SDQ) ⁹, the Spence Anxiety Scale ¹⁰, the Child Health Utility 9D ¹¹, the MOS Social Support Survey ¹², the Stressful Life Events Scale ¹³, and the Pediatric Quality of Life Inventory ¹⁴.


Other instruments were developed specifically for LSAC including the School-Age Temperament Inventory ¹⁵, and others were adapted for LSAC including the bullying measures ¹⁶, the Parent Relationship – Trust & Communication Scale adapted from the People in My Life measure ¹⁷, and the Self-Harm Ideation measures ^{18,19}. Physical measurements were taken using standardised scales across the cohorts such as the Tanita Body Fat Scale for measuring weight and body fat, and a laser stadiometer for measuring height.

LSAC-linked Medicare dataset

Informed consent was sought for data linkage with Medicare administrative data, initially from parents and later from the study children. In Wave 1, 97% of parents of study children gave consent for their children’s data to be linked with Medicare Australia data on an ongoing basis. Study children (14 – 15 years) of K cohort in Wave 6 and B cohort in Wave 8 were asked to consent for the first time to link their information to MBS and other administrative datasets.

Linkage was successful for 93% of children (incomplete consent forms resulted in data not being released for about 400 children). Only linked MBS data was available for analysis. MBS data for individuals unable to be linked were recoded as missing. Participating families and individuals are free to withdraw their consent at any stage from continued data linkage or study participation overall.

Since the LSAC study child’s use of medical services is ongoing, the Medicare Australia data are not broken into waves but are provided as a separate file with each record on the MBS file representing a benefit claim with multiple records/claims for each LSAC individual for services between January



2002 (or birth for the B cohort) and early 2022 for study children. To facilitate modelling of concurrent and longitudinal associations between MBS item use and mental health/eating disorder symptoms, date of service for MBS item use was recoded into 'year of service' to align with the LSAC year of survey.

We retained MBS items for mental health service use as well as for Eating Disorders MBS service use items (refer to Final Report Appendix 1). MBS item use typically included the following information: date of use, service type (plans, reviews or treatment sessions), associated charges (provider charge, scheduled fee and out of pocket expenses), who delivered the service (general practitioners with and without mental health skills training, other medical providers with and without mental health skills training, psychiatrists or paediatricians, allied health professionals including clinical psychologists, psychologists, social workers, occupational therapists, dietitians, mental health workers or aboriginal health workers), in what modality (in-person, telehealth, phone or case conference), the service format (individual, group or case conference) and service type by provider.

For the purposes of analysis, MBS item utilisation per person per year was analysed for the following three (3) MBS item categories: (1) eating disorder items only, (2) mental health items only, and (3) eating disorder and mental health items combined to get an overall estimate of MBS use for mental health.


EveryBODY study dataset

The EveryBODY study² is a longitudinal investigation of Australian adolescents' body image concerns and disordered eating behaviours in which study participants completed a self-report questionnaire about eating disorder symptoms, body image, and various correlates including for example fear of negative evaluation, bullying, selfie-related social media behaviours, gender contentedness and typicality, paediatric quality of life, and psychological distress.

Principals and welfare staff across 50 high schools in the Newcastle and Hunter region of New South Wales, Australia were contacted and invited to participate in the study. Eighteen schools (36% of approached schools) agreed to participate. However, six schools withdrew their participation prior to testing, five due to conflicting time commitments, and one due to concerns regarding some topics such as gender identity and dating. Reasons given by other schools for not participating included conflicting commitments, participation in other research projects, lack of time, and lack of a staff member to coordinate the project.

An additional seven schools in the Sydney area were also invited to participate to increase the ethnic diversity of the sample. Two of these schools agreed to participate in the study, however one withdrew prior to testing due to conflicting commitments. This left a total of 13 schools that participated in the study: four government schools and nine independent schools. No Catholic schools chose to participate in the study, while independent schools were slightly over-represented compared to the Australian population.

The EveryBODY study was conducted using online surveys with high school students from the 13 participating schools in 2017. Eight of the 13 schools (4 government, 4 independent) agreed to continue to be surveyed in 2018 and 2019. Schools were allocated to three different groups based on size, ethnic diversity, ICSEA scores and age range to ensure equivalence with each group receiving the



same survey, except for one measure which differed for each group. This allowed for the addition of extra measures without extending the time required to complete the study.

Total enrolments across participating schools ranged from 514 to 1,305, with 70% of students participating in the study. All students were invited to take part in the study, unless schools had previously restricted participation to selected year groups. Prior to the survey date, schools distributed information letters to parents and students, as well as newsletter inserts informing parents and students about the study. A passive parental consent procedure was used, whereby consent was assumed unless parents actively opted their child out of the study. Pilot testing was conducted prior to the study to ensure questions were understandable and that the survey could be completed within a typical 50-minute class, while minimizing fatigue. On the day of testing, students who agreed to participate were invited to complete an online questionnaire under the supervision of their teachers.


Of the 5,191 students who participated in the first wave of the EveryBODY study, 119 were excluded due to unacceptable rates of missing data ($n = 39$), non-serious responses as indicated by inappropriate responses to open-ended questions ($n = 79$), and withdrawn consent ($n = 1$). The final sample was 5,072 students aged between 11 – 19 years with a mean age of 14 year and 11 months at baseline.

Demographically the sample was similar to adolescents across Australia based on Census data, and the ICSEA data which indicated that the average socioeconomic advantage score for survey respondents was similar to the population average, although the standard deviation was smaller, indicating the sample was less representative of those with particularly low or high socioeconomic advantage. For more information on the study, see Fatt et al. ²⁰, Mitchison et al. ², and Trompeter et al. ³.

EveryBODY study measures

The EveryBODY survey consisted of questions regarding demographics, eating behaviours, weight/shape concerns, general mental health (e.g., psychological distress, quality of life), help seeking, social media use, bullying, gender typicality, and relationships. Each of the measures is summarised below and further information on each is available in Fatt et al. ²⁰ and Trompeter et al. ³.

- *Eating disorder diagnosis.* The procedure used to determine probable eating disorder diagnosis was based on the Diagnostic and Statistical Manual of Mental Disorders, 5th Edition (DSM-5) criteria and relied upon responses to a range of self-report questionnaires and items that tapped into specific symptoms. For full information see Supplementary Table 1 in Mitchison et al. ²
- *Fear of negative evaluation (BFNE).* EveryBODY participants' fear of negative evaluation was measured using the positively-worded items from the Brief Fear of Negative Evaluation (BFNE) ²¹ scale.
- *Weight/shape concerns.* EveryBODY participants' weight/shape concerns were assessed using the combined weight and shape concerns subscale of the EDE-Q ²², which assesses eating disorder pathology over the past month and asks participants to rate the frequency/severity of their weight and shape concerns in the past 28 days.

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- *Body mass index (BMI) percentile.* EveryBODY participants were asked to provide their height and weight measurements, which were used to determine BMI (weight (kg)/height (m)²) percentiles, adjusted for age and sex.
 - *Help seeking.* Participants responded to a dichotomous yes/no question, “Have you ever seen a health professional about a body image problem?”, with those answering “yes” categorised as help seekers, and those answering “no” as non-help seekers. This wording was designed to be sensitive to eating disorder-related help seeking while also being appropriate for an adolescent sample, many of whom fail to recognize their experience as an eating disorder.
 - *Psychological distress (K-10).* The Kessler Psychological Distress Scale measured psychological distress in the past four weeks. Participants responded to 10 items describing how often they felt a certain way (e.g., tired out for no good reason) on a 5-point response scale (1 = none of the time to 5 = all of the time). Scores were summed, with higher total scores indicating higher distress.
 - *Quality of life (PedsQL).* The physical functioning (five items), psychological functioning (four items), and social functioning (three items) subscales of the Pediatric Quality of Life Scale SF15 were used to assess quality of life.
 - *Control variables.* The EveryBODY study controlled for basic demographics that could influence results including age, socio-economic status as measured by postal area index (POA), an index of relative socio-economic advantage and disadvantage²³, and migrant status as measured by ‘ ‘born in Australia’ ’ compared to ‘ ‘born overseas’ ’ .

A summary of the conceptual overlap of constructs measured across the two studies is shown in Table 3. In some instances, the same measure was used across the two studies (e.g., Kessler 10+ Depression Scale), while in others an alternative measure was used (e.g., for eating disorder symptoms).



Table 3. Constructs measured across LSAC and EveryBODY studies

Constructs (measures)	LSAC Cohort K					LSAC Cohort B			EveryBODY
	Wave 6	Wave 7	Wave 8	Wave 9C1	Wave 9C2	Wave 8	Wave 9C1	Wave 9C2	
	2014 14 – 15 years	2016 16 – 17 years	2018 18 – 19 years	2020 20 – 21 years	2020 21 – 22 years	2018 14 – 15 years	2020 16 – 17 years	2020 17 – 18 years	
Key measures (sociodemographic questions)	✓	✓	✓	✓	✓	✓	✓	✓	✓
Eating disorder (Branched Eating Disorder Test)	✓	✓	✓	×	×	✓	×	×	✓ (weight/shape concerns – EDE-Q; plus other measures assessing diagnostic criteria for EDs)
Mental health (Kessler 10+ Depression Scale)	✓	✓	✓	✓	✓	✓	✓	✓	✓
Mental health (Stressful Life Events Scale)	×	×	✓	✓	✓	×	✓	✓	×
Mental health (Feeling Rushed & Difficulty of Life)	✓	✓	✓	✓	✓	✓	✓	✓	×
Worries (child worries and concerns, Spence Anxiety Scale)	✓	✓	×	×	×	✓	×	×	×
Internalising behaviours (depressed feelings, Short Mood & Feelings Questionnaire)	✓	✓	×	×	×	✓	×	×	×



Constructs (measures)	LSAC Cohort K					LSAC Cohort B			EveryBODY
	Wave 6	Wave 7	Wave 8	Wave 9C1	Wave 9C2	Wave 8	Wave 9C1	Wave 9C2	
	2014	2016	2018	2020	2020	2018	2020	2020	
	14 – 15 years	16 – 17 years	18 – 19 years	20 – 21 years	21 – 22 years	14 – 15 years	16 – 17 years	17 – 18 years	
Quality of life (Child Health Utility 9D)	✓	✓	✓	×	×	✓	×	×	✓ (PedsQL SF15)
Medical conditions (study child's ongoing problems – self-report mental illness)	✓	✓	✓	×	×	✓	×	×	×
Global health – Global Health Measure	×	×	×	✓	✓	×	✓	✓	×
Self-harm ideation (self-harm ideation and attempts)	✓	✓	✓	×	×	✓	×	×	×
Bullying (bullying victimisation, propensity and frequency)	✓	✓	×	×	×	✓	×	×	×
Child social and emotional development (Temperament, School Aged Temperament Inventory)	✓	×	×	×	×	✓	×	×	×
Psychosocial, emotional, social and school development (Pediatric Quality of Life Inventory)	✓	✓	×	×	×	✓	×	×	✓
Social and emotional development and behaviour (Strength and Difficulties Questionnaire)	✓	✓	×	×	×	✓	×	×	×
Attitudes to risk (risk-taking)	×	×	✓	×	×	×	×	×	×
Help seeking (help seeking behaviour)	✓	✓	✓	×	×	✓	×	×	✓
Child self-perceptions (self-efficacy/overall happiness)	✓	×	×	✓	✓	✓	✓	✓	×



Constructs (measures)	LSAC Cohort K					LSAC Cohort B			EveryBODY
	Wave 6	Wave 7	Wave 8	Wave 9C1	Wave 9C2	Wave 8	Wave 9C1	Wave 9C2	
	2014	2016	2018	2020	2020	2018	2020	2020	
	14 – 15 years	16 – 17 years	18 – 19 years	20 – 21 years	21 – 22 years	14 – 15 years	16 – 17 years	17 – 18 years	
Child self-perceptions (resilience and adaptability, Connor-Davidson Resilience Scale)	x	✓	x	x	✓	x	x	✓	x
Child self-perceptions (future outlook – “future outlook”)	x	✓	x	x	x	x	x	x	x
Optimism – own/generations future)	x	x	x	✓	✓	x	✓	✓	x
Personality (Big 5 Personality Inventory)	x	✓	✓	x	x	x	x	x	x
Social support (MOS Social Support Survey)	✓	✓	✓	✓	✓	✓	✓	✓	x
Empathy (Social Skills Improvement System)	✓	x	✓	x	x	x	x	x	x
Parent relationship (Trust & Communication Scale)	✓	✓	✓	x	x	✓	x	x	x
Physical measurements (weight, BMI, height, body fat)	✓	✓	✓	x	x	✓	x	x	✓



Data analytic strategy


Data preparation, descriptive analyses, and single-level regressions were conducted using SPSS Version 29, while multilevel modelling was conducted using MPlus Version 8.10.

Research Question 1. Prevalence of help seeking behaviour (both via MBS data and self-report) were evaluated using descriptive statistics. For the LSAC dataset, we report on the number of individuals who reported use of MBS items (Eating Disorders MBS items and mental health-related MBS items are reported separately), and the number of services these participants used. We also report on the proportion of individuals who used Eating Disorders MBS services who also used mental health-related MBS services and describe the proportion of these individuals for whom Eating Disorders MBS items were used first, subsequent, or concurrently with mental health MBS items. For LSAC participants, we also report on self-reported help seeking; this is reported by wave and by source of help seeking to evaluate in finer detail professional and non-professional avenues for help seeking.

The EveryBODY dataset had a narrower measure of help seeking, simply asking participants if they had sought help for a body image concern. As detailed above in the EveryBODY study measures section, this was designed to be sensitive to help seeking, whilst also appropriately worded given the age of the target population. We describe the proportion of individuals in the sample who have a probable eating disorder who also reported help seeking. Unlike LSAC, which is limited to anorexia nervosa and bulimia nervosa, we were also able to evaluate differences in help seeking for this item based on eating disorder subtype (anorexia nervosa, bulimia nervosa, binge eating disorder, atypical anorexia nervosa, subthreshold bulimia nervosa, subthreshold binge eating disorder, purging disorder, night eating syndrome, and unspecified feeding disorder).

Research Question 2. Cross-sectional associations between help seeking and eating disorder/mental health status were evaluated in several ways, dependent on the data available across LSAC and EveryBODY datasets. For LSAC, eating disorder status was evaluated in Waves 6 – 8 (2014 – 2018), which precede the introduction of Eating Disorders MBS items in 2019. This prevented a straightforward evaluation of cross-sectional associations. We thus derived a measure reflecting whether an individual reported a partial syndrome eating disorder for any of the waves with available data (6 to 8) and an aggregate of Eating Disorders MBS item use across years 2019 – 2022 for which we had MBS data linkage. We obtained an aggregate of mental health-related MBS item use across available years (2012 – 2022) to see if this also correlated with eating disorder diagnostic status. Single-level logistic regressions were conducted to test these associations between: (1) eating disorder diagnostic status (yes versus no) and Eating Disorders MBS item use (yes versus no), and (2) eating disorder diagnostic status (yes versus no) and mental health item use (yes versus no). These models were run unadjusted and adjusted for mental health status (whether an individual had scored in the range for likely to very likely to have a mental illness, according to K-10 scores), and reported as odds ratios.

For the EveryBODY dataset, a series of binary logistic regressions were run. The first set examined the association between eating disorder diagnostic status at Wave 1 and seeking help for a body image problem concurrently, adjusted and unadjusted for psychological distress (K-10 score at Wave 1). The second set of regressions only used data from participants who were identified with a probable eating disorder (threshold and subthreshold variants of anorexia nervosa, bulimia nervosa, and binge eating disorder) at time 1, and examined whether indicators of eating disorder severity (weight and



shape concerns, binge eating, fasting and purging) were associated with help seeking concurrently. Results are reported as odds ratios.

Research Question 3. Given potential ambiguity in cross-sectional findings, we explored the extent to which eating disorder diagnosis (or symptom severity) at one time point predicted help seeking at the next time point. As the EveryBODY project had a time interval of 1 year between assessments, for comparability we applied a lag of 1 year to also explore longitudinal relationships between eating disorder and subsequent help seeking in the LSAC dataset for mental health-related MBS item use. It was not possible to apply the same approach for Eating Disorders MBS items since eating disorder status was evaluated in Waves 6 – 8 (2014 – 2018) and Eating Disorders MBS items were introduced at the end of 2019 (producing a truncated estimate for 2019). We thus created a single estimate of eating disorder status across Waves 6 – 8 (whether an individual had a partial syndromal eating disorder for any of Waves 6 – 8; yes versus no) and used that as a predictor of Eating Disorders MBS item use for years 2019 – 2022.

For the EveryBODY dataset, we only had two timepoints, and thus used a single-level multivariable binary logistic regression to evaluate whether indicators of severity (weight and shape concerns, binge eating, fasting and purging, psychological distress, and health-related quality of life impairment) at baseline predicted help seeking for a body image problem one year later.

For the LSAC dataset, we used multilevel logistic regression models, with eating disorder status predicting MBS item use (yes v no) across available years of MBS data. In the case of eating disorder status predicting Eating Disorders MBS item use, eating disorder status was a Level 2 predictor of Eating Disorders MBS item use for years 2019 – 2022. In the case of eating disorders status predicting mental health MBS item use (for which we had data from 2014 – 2022), eating disorder status for available years (2014, 2016, 2018) was used to predict mental health-related MBS item use at the subsequent year, controlling for mental health MBS item use at years 2014, 2016, 2018. Eating disorder status was group-mean centred to isolate within-person effects. In adjusted models, mental diagnosis status (based on scores on the K-10) were included as time-varying covariates that were also group-mean centred. Effects were reported in terms of odds ratios for Research Question 3.

Research Question 4. As LSAC did not collect eating disorder status data for Wave 9, we were unable to explore the prospective relationship between help seeking and subsequent eating disorder status in this sample. However, this was able to be explored in the EveryBODY dataset using logistic and linear regressions. Eating disorder status and severity at the one-year follow-up timepoint were regressed onto help seeking (yes versus no) at baseline among participants with an eating disorder at baseline. Effects are reported as odds ratios (for the eating disorder status outcome) and standardised betas (for the eating disorder severity outcome). Models were adjusted for baseline eating disorder severity.

Results

Characterising eating disorder and mental health symptom severity

LSAC

The incidence of each diagnosis type in the LSAC sample for each cohort by wave is presented in Table 4. Incidence rates were comparable across cohorts B and K, as well as across waves for cohort K. Consistent with population figures (e.g., Santomauro et al. ²⁴), the incidence rate was higher for bulimia nervosa than for anorexia nervosa.

Table 4. Incidence of partial syndromal bulimia nervosa, partial syndromal anorexia nervosa and partial syndromal anorexia nervosa

Eating disorder diagnosis type	Cohort K			Cohort B
	Wave 6	Wave 7	Wave 8	Wave 8
Partial syndromal bulimia nervosa	73 (2.1)	63 (2.0)	70 (2.3)	86 (2.8)
Partial syndromal anorexia nervosa	9 (0.3)	7 (0.2)	9 (0.4)	7 (0.2)
Partial syndromal anorexia nervosa and/or bulimia nervosa	82 (2.3)	70 (2.3)	78 (2.6)	91 (2.9)

Note. n (%).

Despite low rates of eating disorder diagnosis in the LSAC sample, at a symptom level, eating disorder attitudes and behaviours were more common. As shown in Table 5, concerns about gaining weight, experiences of loss of control while eating, and engaging in exercise and other means to control weight were common.

Table 5. Eating disorder symptoms by wave and cohort

Eating disorder symptoms	Cohort K			Cohort B
	Wave 6	Wave 7	Wave 8	Wave 8
Leave food at meal times – to avoid putting on weight (often/almost always)	202 (6)	169 (5.8)	N/A	N/A
Have eaten too much – eat less than usual on the next day (often/almost always)	335 (10)	299 (10.2)	N/A	N/A
Take small helpings – to keep weight under control (often/almost always)	249 (7.4)	251 (8.6)	N/A	N/A
Skip meals other than breakfast (often/almost always)	180 (5.4)	160 (5.5)	N/A	N/A
How would you feel if you gained one to two kilograms (it would worry me/it would really upset me)	690 (28.4)	729 (33.6)	711 (38.9)	746 (33.5)
Last 4 weeks – have you been afraid you might gain weight (yes)	1,176 (35.2)	1,170 (39.9)	1,102 (44.1)	1,147 (38.3)

Eating disorder symptoms	Cohort K			Cohort B
	Wave 6	Wave 7	Wave 8	Wave 8
[Of those afraid of gaining weight] Last 4 week – frequency you feel afraid you might gain weight (2+ days/week)	591 (50.3)	593 (51.7)	666 (60.4)	600 (52.4)
[Of those afraid of gaining weight] How concerned were you that you might gain weight (very/extremely concerned)	404 (34.4)	422 (36.1)	409 (37.3)	411 (35.9)
How important is weight in how you feel about yourself (moderately or very important)	1,635 (48.9)	1,431 (48.8)	1,363 (54.7)	1,447 (48.4)
How do you feel about your weight at the moment (somewhat or very overweight)	917 (48.9)	874 (66.4)	907 (71.9)	420 (33.8)
Last 4 weeks - gone all day no eating to control weight (yes)	251 (7.5)	247 (8.4)	224 (9.0)	303 (10.1)
[Of those who have gone all day without eating] Last 4 weeks – frequency you have gone all day without eating (2+ days/week)	64 (25.5)	67 (27.1)	55 (24.6)	70 (23.3)
[Of those who have gone all day without eating] How long have you been having days without eating (3+ months)	100 (39.8)	109 (44.1)	108 (48.6)	107 (35.7)
Last 4 weeks – felt that you lost control of your eating (yes)	1,049 (31.4)	1,020 (34.8)	893 (35.8)	961 (32.1)
[Of those who felt they'd lost control of their eating] How often during the last 4 weeks have you felt like this (2+ days/week)	365 (34.8)	369 (36.2)	405 (45.6)	362 (37.7)
[Of those who felt they'd lost control of their eating] Duration of feelings – you have lost control of your eating (3+ months)	408 (38.9)	488 (47.8)	523 (58.8)	381 (39.8)
[Of those who felt they'd lost control of their eating] When you lose control of eating, how hard is it to stop (very difficult/impossible)	147 (14.0)	144 (14.1)	132 (14.8)	127 (13.3)
Amount of food you would eat in less than 2 hours (more than 8 pieces of bread, half a litre of ice-cream and 5 biscuits)	464 (44.2)	411 (40.3)	299 (33.7)	445 (46.5)
Last 4 week – tablet/medicine/drug to weight control (yes)	59 (1.8)	57 (1.9)	33 (1.3)	65 (2.2)
[Of those who had taken tablets/medicine/drugs to control weight in last 4 weeks] Laxatives (yes)	11 (18.6)	8 (14.0)	10 (33.3)	11 (18.6)
[Of those who had taken tablets/medicine/drugs to control weight in last 4 weeks] Diuretics (yes)	3 (5.1)	3 (5.3)	2 (6.7)	0 (0.0)
[Of those who had taken tablets/medicine/drugs to control weight in last 4 weeks] Appetite suppressants (yes)	12 (20.3)	14 (24.6)	11 (36.7)	7 (11.9)
[Of those who had taken tablets/medicine/drugs to control weight in last 4 weeks] Other drugs (yes)	37 (62.7)	35 (61.4)	17 (56.7)	43 (72.9)

Eating disorder symptoms	Cohort K			Cohort B
	Wave 6	Wave 7	Wave 8	Wave 8
Vomit as a means of controlling your shape or weight (yes)	54 (1.6)	72 (2.5)	52 (2.1)	66 (2.2)
[Of those who had vomited to control weight] How often have you made yourself vomit (2+ days/week)	18 (33.3)	22 (30.6)	13 (25.0)	20 (30.3)
[Of those who had vomited to control weight] How long have you been making yourself vomit (3+ months)	20 (37.0)	35 (48.6)	34 (65.4)	21 (32.3)
Last 4 week – exercise in order to control weight (yes)	1,620 (34.0)	1,423 (48.6)	1,172 (47.0)	1,451 (48.5)
[Of those who had exercised to control weight] Frequency exercised in order to control your weight (2+ days/week)	1,202 (74.2)	1,033 (72.6)	883 (75.3)	1,079 (74.5)
[Of those who had exercised to control weight] Time spent exercising per day (3+ hours/day)	174 (13.8)	128 (12.1)	45 (5.6)	167 (14.6)
[Of those who had exercised to control weight] How long have you been exercising (3+ months)	860 (53.1)	859 (60.4)	710 (60.8)	740 (51.1)

Note. N/A = not asked. *n* (%).

Other mental health concerns were also common in the LSAC sample. According to K-10 depression scale scores (administered in Wave 8 for Cohort K), 33% scored within the range for high to very high probability of serious mental illness. Similarly, 26 – 40% of Cohort K participants and 30% of Cohort B participants scored higher than the cut-off on the Short Mood and Feelings Questionnaire, indicative of possible presence of depression.

Individuals with a partial syndromal eating disorder (anorexia nervosa or bulimia nervosa) were 4.47 times (95% CI: 2.76, 7.24) more likely to score with the range of high to very high probability for a serious mental illness, and 3.77 times (95% CI: 2.90, 4.91) more likely to meet threshold for depression.

EveryBODY study

Of the 5,072 adolescents who responded to the survey in 2017, 1,002 (19.8%) met DSM-5 criteria for a probable eating disorder, including a major eating disorder, other specified feeding and eating disorder (OSFED), or unspecified feeding and eating disorder (UFED). A more detailed breakdown of eating disorder frequency is provided in Table 6, below. For the purposes of the analyses and to increase confidence that we were capturing those with probable eating disorders, in this report we focused on the better-known eating disorders and their subthreshold variants. Thus “any eating disorder” in the analyses below is inclusive of anorexia nervosa, bulimia nervosa, binge eating disorder, atypical anorexia nervosa, subthreshold bulimia nervosa, subthreshold binge eating disorder, and purging disorder.


Table 6. Eating disorders (DSM-5 criteria) by gender and for sample overall

	Boys (<i>n</i> = 2,399)	Girls (<i>n</i> = 2,673)	Total (<i>n</i> = 5,072)
Anorexia nervosa	1 (0.04)	31 (1.16)	32 (0.63)
Bulimia nervosa	40 (1.67)	175 (6.55)	215 (4.24)
Binge eating disorder	4 (0.17)	43 (1.61)	47 (0.93)
Atypical anorexia nervosa	26 (1.08)	111 (4.15)	137 (2.70)
Subthreshold bulimia nervosa	36 (1.50)	113 (4.23)	149 (2.94)
Subthreshold binge eating disorder	3 (0.13)	12 (0.45)	15 (0.30)
Purging disorder	31 (1.29)	92 (3.44)	123 (2.43)
Night eating syndrome	82 (3.42)	48 (1.80)	130 (2.56)
Unspecified feeding disorder	22 (0.92)	132 (4.94)	154 (3.04)

Note. *n* (%).

At baseline (2017), 2,147 (42.4%) of participants reported ‘yes’ to the question of whether they thought they had ever had a body image problem. Because eight of the 13 schools in the EveryBODY Study were surveyed again in two annual follow-ups, it was possible to examine changes in endorsement of current body image problems. Of note this included only participants who completed multiple surveys and were not in year 12 at an earlier survey wave. In 2017, 27.1% of the cohort reported a current body image problem. In 2018 and 2019 this figure was similar, with 28.7% and 26.8% endorsing a current body image problem respectively. For those who endorsed a current body image problem in 2017, 73.6% continued to report a body image problem after one year, and 57.4% after two years. Of those who reported no history of body image problems in 2017, 14.9% reported a current problem one year later, and 18.6% two years later. Thus, there appears to be a steady large proportion of adolescents who report current body image problems (around 27% – 29%) and any remission of such problems over a 1 – 2 year period seems offset by new problems experienced by adolescents who previously had not reported any.

Of the overall sample, 19.5% scored at or above the K-10 cut-off of 30, indicative of a high to very high probability of a serious mental illness. Psychological distress using the K10 total score was significantly higher among adolescents identified with a probable ED at baseline ($M = 30.40$, $SD = 10.68$) compared to those without an ED ($M = 19.12$, $SD = 18.89$), $F(1, 4610) = 856.14$, $p < .001$, partial $\eta^2 = .16$ (large effect size), and adolescents with a probable ED at baseline were 6.57-times



(95% CI: 5.50-7.84) more likely to score in the range indicating a high to very high probability of a serious mental illness (51.8% vs 14.1% of adolescents with vs without an ED, respectively).

Characterising Eating Disorders MBS use and other help seeking behaviours

LSAC

Use of MBS items for eating disorders were low for the sample overall, though not unexpected given the low incidence of individuals with a probable eating disorder. Only 41 LSAC individuals had used any Eating Disorders MBS items (0.67% of the Wave 8 responding sample across both cohort K and B). Among individuals who did access Eating Disorders MBS items, the average number of items accessed was 8.9 ($SD = 11.2$, range = 1 – 64). The bulk of these services were for treatment sessions ($M = 7.9$, $SD = 10.6$, range = 0 – 60). Given the low number of treatment sessions utilised on average, it is unsurprising that less than 30% of respondents accessing Eating Disorders MBS items had received a review of progress via the Eating Disorders MBS initiative.

In contrast, 3,864 LSAC individuals had used mental health MBS items (62.9% of the Wave 8 responding sample across both cohort K and B). Among LSAC individuals who had accessed mental health MBS items, the average number of mental health MBS items used was 4.5 ($SD = 4.7$, range = 1 – 57), with the bulk for treatment sessions ($M = 3.4$, $SD = 4.4$, range = 0 – 49). Less than 30% of respondents had received a review of progress.

Among LSAC individuals who had accessed both mental health and Eating Disorders MBS items ($n = 39$), the average number of eating disorder items used was higher than for eating disorder item use overall ($M = 9.5$ versus $M = 7.9$). Their average use of mental health MBS items was also higher ($M = 8.9$) than for those who only used mental health items ($M = 4.5$). For 34 (87%) of these 39 individuals, use of mental health MBS items commenced at least one year prior to first use of Eating Disorders MBS items, while for one individual (3%), Eating Disorders MBS item use commenced at least one year prior to mental health MBS item use. For the remaining four individuals (10%), mental health and Eating Disorders MBS item use commenced within the same calendar year.

While MBS items capture engagement with health services, LSAC also includes self-report items about help seeking (occurrence and source) that provide another perspective on help seeking propensity of this sample. Table 7 shows the number and proportion of LSAC individuals who had ever sought help from various sources. The most common source of help seeking was from a friend; 68.6% of the overall sample across all waves and higher for cohort K in Wave 8 (aged 18 – 19 years) at 79.7%. The second most common source of help seeking was from a parent; 63.7% of the overall sample across all waves. Encouragingly, the proportion who had not sought support of any kind was low.

Table 7. Help seeking by wave and cohort


Help seeking	Cohort K			Cohort B
	Wave 6	Wave 7	Wave 8	Wave 8
Sought help from boyfriend or girlfriend	570 (17.1)	N/A	N/A	551 (18.5)
Sought help from boyfriend, girlfriend, or partner	N/A	895 (30.9)	1,110 (44.7)	N/A
Sought help from friend	2,101 (63.2)	1,951 (67.3)	1,982 (79.7)	1,982 (66.7)
Sought help from parent	1,970 (59.3)	1,775 (61.2)	1,742 (70.1)	1,957 (65.8)
Sought help from brother or sister	959 (28.9)	994 (34.3)	1,146 (46.1)	942 (31.7)
Sought help from other relative/family member	642 (19.3)	522 (18.0)	645 (25.9)	695 (23.4)
Sought help from teacher	673 (20.2)	641 (22.1)	371 (14.9)	641 (21.6)
Sought help from other school staff	408 (12.3)	347 (12.0)	128 (5.1)	347 (11.7)
Sought help from family doctor/GP	173 (5.2)	177 (6.1)	317 (12.8)	146 (4.9)
Sought help from mental health professional	237 (7.1)	287 (9.9)	317 (12.8)	249 (8.4)
Sought help from other adult	314 (9.4)	185 (6.4)	305 (12.3)	290 (9.8)
Sought help from phone help line	64 (1.9)	77 (2.7)	60 (2.4)	78 (2.6)
Sought help from internet	548 (16.5)	395 (13.6)	511 (20.6)	376 (12.7)
Sought help from someone else not listed above	20 (0.6)	39 (1.3)	40 (1.6)	62 (2.1)
I have not sought help from anyone	104 (3.1)	97 (3.3)	78 (3.1)	112 (3.8)

Note. *n* (%). N/A = not asked, GP = general practitioner.

EveryBODY study

Of the entire baseline sample in 2017, 273 (5.4%) adolescents reported having seen a health professional for a body image-related problem. When these participants were asked how many sessions they estimated they had had with a psychologist, 100 (36.6% of those who had seen a health professional) reported not having seen a psychologist at all, whereas 173 (63.4%) reported one or more sessions with a psychologist. It was noted that 54% of adolescents who had accessed a psychologist via MBS for a body image problem reported having attended 1 – 6 sessions, 19% 7 – 10 sessions, 10% 11 – 20 sessions, and 16% more than 20 sessions.

When provided a list of other health professionals they may have seen about their body image problem, 186 (68.1%) of the 273 adolescents who saw a health professional said they had seen their general practitioner, 74 (27.1%) said they had seen a dietitian or nutritionist, 78 (28.6%) said they had seen a “therapist”, 74 (27.1%) said they had seen a psychiatrist, and 40 (14.7%) said they had seen a paediatrician. These figures were similar in 2018 and 2019 where 5.2% and 6.4% of the overall sample of adolescents reported that they had seen a health professional for a body image problem. Thus, there appears to be a stable pattern of access to formal treatment for body image problems over the years 2017 to 2019 at around 5% – 6%, though this number is far exceeded by the number of adolescents who report having problems with body image that are associated with disordered eating (around 29%).



One school in the original EveryBODY study participated in a survey that was conducted in November 2020 to examine the impact of the COVID-19 pandemic. Although this school, which was an independent Christian school, is not representative of the larger EveryBODY cohort or adolescents more generally, the pattern of changes across time (as opposed to exact percentages) are potentially illustrative of broader population-level trends occurring at the time. At the 2017 survey, 445 adolescents responded from this school, of whom 31.5% reported a history of body image problems, and 16.6% reported that this was a current problem for them. Of these, 35 identified this body image problem as an eating disorder; eight described this problem as anorexia nervosa, eight as bulimia nervosa, 18 as binge eating disorder, and one as “another” eating disorder. In terms of healthcare access however only six said they had received a formal eating disorder diagnosis, whereas 19 reported having seen a health professional for a body image problem (15 saw a general practitioner, four a dietitian, eight a therapist, four a psychiatrist, and one a paediatrician). In the survey conducted in November 2020, one year following on from the launch of the Eating Disorder Plan, of the 445 respondents from this school, seven reported a current eating disorder and six of these students reported having received a formal eating disorder diagnosis from a health professional.

Four thousand, eight hundred and twenty-nine adolescent participants at baseline responded to the questions used to identify a probable eating disorder diagnosis and on help seeking for a body image problem. Of those who were identified with a probable eating disorder, 90 (13.2%) reported having seen a health professional for a problem with body image.

Relationships between eating disorder symptoms and help seeking

LSAC

Cross-sectional relationships. Cross-sectionally, individuals with a partial syndromal eating disorder (anorexia nervosa or bulimia nervosa) were almost four times more likely to have accessed Eating Disorders MBS items (OR = 3.63, 95% CI: 1.40, 9.40), though access to Eating Disorders MBS items was low for the sample overall (as noted in the subsection above). This effect remained significant after adjusting for presence of potential mental illness (AOR = 3.27, 95% CI: 1.22, 8.73).

Individuals with a partial syndromal eating disorder were also more likely to have accessed mental health-related MBS items, though this effect was weaker than for Eating Disorders MBS items (OR = 1.45, 95% CI: 1.14, 1.85) and became non-significant after controlling for presence of potential mental illness (AOR = 1.22, 95% CI: 0.92, 1.61). Use of mental health MBS items may be driven by: (1) comorbid mental health concerns, rather than eating disorder status, or (2) severity of illness as evidenced by these comorbid symptoms.

Individuals with a partial syndromal eating disorder were twice as likely to seek help, whether through health professionals, teachers, family, or peers (OR = 2.00, 95% CI: 1.16, 3.45), and they were more likely to access a broader range of supports ($b = 0.30$, 95% CI: 0.25, 0.35). In adjusted models, seeking help (yes versus no) became non-significant (AOR = 1.59, 95% CI: 0.88, 2.87), but number of sources of help sought remained significant ($b = 0.30$, 95% CI: 0.25, 0.35).

Table 8 provides further detail of differences in source of help seeking between individuals with a partial syndromal eating disorder and those without. For both groups, it was more common to seek help via friends, partners, and family, than via health professionals or help lines.

Table 8. Partial syndromal bulimia nervosa and/or anorexia nervosa and LSAC help seeking behaviour

Source of help seeking	None	Partial syndromal bulimia and/or anorexia	Odds ratio [95% CI]
Sought help from boyfriend or girlfriend	1,077 (17.6)	44 (25.7)	1.6 [1.1, 2.3]
Sought help from friend	7,773 (68.4)	243 (76.2)	1.5 [1.1, 1.9]
Sought help from parent	7,256 (63.9)	188 (58.9)	0.8 [0.6, 1.0]
Sought help from brother or sister	3,929 (34.6)	112 (35.1)	1.0 [0.8, 1.3]
Sought help from other relative/family member	2,439 (21.5)	65 (20.4)	0.9 [0.7, 1.2]
Sought help from teacher	2,264 (19.9)	62 (19.4)	1.0 [0.7, 1.3]
Sought help from other school staff	1,182 (10.4)	48 (15.0)	1.5 [1.1, 2.1]
Sought help from family doctor/GP	778 (6.8)	35 (11.0)	1.7 [1.2, 2.4]
Sought help from mental health professional	1,023 (9.0)	67 (21.0)	2.7 [2.0, 3.5]
Sought help from other adult	1,056 (9.3)	38 (11.9)	1.3 [0.9, 1.9]
Sought help from phone help line	254 (2.2)	25 (7.8)	3.7 [2.4, 5.7]
Sought help from internet	1,743 (15.3)	87 (27.3)	2.1 [1.6, 2.7]
Sought help from someone else not listed above	152 (1.3)	9 (2.8)	2.1 [1.1, 4.2]


Note. n (%). GP = general practitioner.

Longitudinal relationships. Prospectively, presence of a partial eating disorder at earlier waves was associated with subsequent use of Eating Disorders MBS items (OR = 7.52, 95% CI: 1.26, 44.82), which remained significant after controlling for co-morbid mental illness (AOR = 5.16, 95% CI: 1.29, 20.65). Use of Eating Disorders MBS items reported in the previous year was positively associated with use in the current year (OR = 6.35, 95% CI: 2.09, 19.29), suggesting it was common for Eating Disorders MBS users in the sample to access these services across multiple years. This effect remained after controlling for comorbid mental health diagnoses (AOR = 5.16, 95% CI: 1.29, 20.65). Partial syndromal eating disorder status at one timepoint was not predictive of use of mental health-related MBS items, either in unadjusted (OR = 0.90) or adjusted models (AOR = 1.18).

EveryBODY

Cross-sectional relationships. Overall, approximately 10% of respondents with a probable eating disorder (from self-report survey) had sought help for a body image problem. The percentage varied by eating disorder subtype within a range of 0% (subthreshold binge eating disorder) to 18.2% (atypical anorexia nervosa). Treatment seeking rates were 15.6% for anorexia nervosa, 14% for bulimia nervosa, and 8.5% for binge eating disorder. Treatment seeking was more common for individuals with higher psychological distress (Cohen's $d = 0.43$), lower psychological functioning ($d = 0.22$), and greater weight and shape concerns ($d = 0.18$). Treatment seeking was unrelated to binge eating ($d = -0.08$) or purging behaviour ($d = 0.08$).

Compared to the 13.2% of adolescents formally diagnosed with an eating disorder who had also seen a health professional for a problem with body image, only 3.9% of adolescents without an eating disorder had seen a health professional for a problem with body image. When examined statistically,




eating disorder status was associated with greater likelihood of body image-related help seeking (OR = 3.78, 95% CI: 2.88 – 4.96). The effect of eating disorder status on help seeking was attenuated but remained significant even after adjusting for the influence of psychological distress (K-10 total score; AOR = 2.52, 95% CI: 1.85 – 3.45).

Longitudinal relationships. Extending this, for the purposes of this report we ran additional analyses to examine the clinical predictors of reporting having accessed help from a health professional for a body image problem after one year. Using generalised linear models, a multivariable logistic regression was employed with 446 adolescents who had reported a current body image problem at baseline and participated in the one-year follow-up survey and answered the relevant questions. The only factor that was found to be associated with help seeking after one year was baseline score on the K-10. Specifically, higher levels of distress were associated with a greater likelihood of having seen a health professional for their body image problem after one year (AOR = 1.07, 95% CI = 1.02 – 1.12). This effect remained even after accounting for baseline levels of help seeking, which were also highly associated as expected with help seeking after one year (AOR = 13.7, 95% CI = 6.7 – 28.2). Other factors such as eating disorder psychopathology, binge eating and fasting frequency and functional impairment were not associated with help seeking after one year.

Next, we examined whether help seeking for those adolescents who reported a current body image problem was associated with later changes in symptom severity. Repeated measures analyses of variance were employed with 458 adolescents who had reported a current body image problem at baseline and participated in the one-year follow-up survey and answered the relevant questions. The results showed no significant main effects of time (ps .105 to .552), indicating no meaningful change in eating disorder psychopathology, psychological distress, or psychosocial functioning from baseline to one year later. Furthermore, there were no significant interaction effects (ps .282 to .878), indicating that the lack of change in these clinical indicators over time was evident for all adolescents, regardless of whether they had seen a health professional for their body image problem at baseline or not.

Within the EveryBODY cohort, there were data for $n = 1,747$ participants who responded to the survey at baseline and 12 months later, and had provided information on help seeking, eating disorder symptoms, health-related quality of life, and psychological distress. The univariate logistic regression examining the relationship between baseline eating disorder status and help seeking as measured 12 months later found that being identified with an eating disorder at baseline was associated with a significantly greater likelihood of reporting help seeking for a body image problem 12 months later (OR = 2.50, 95% CI: 1.55 – 4.03). However, when other baseline factors were accounted for in a multivariable regression, eating disorder status did not remain uniquely associated with later help seeking. Rather, help seeking as measured at Wave 2 was best accounted for by higher severity of weight and shape concerns (AOR = 1.23, 95% CI: 1.05 – 1.44), higher frequency of laxative use for weight loss (AOR = 1.11, 95% CI: 1.04 – 1.19), and higher levels of psychological distress (AOR = 1.07, 95% CI: 1.03 – 1.10). The association with other baseline factors including health-related quality of life and other eating disorder behavioural symptoms (fasting, self-induced vomiting, and binge eating) did not reach significance (all $p > .05$).

It was possible to also examine the inverse relationship – that is, among those with an eating disorder at baseline, whether help seeking at baseline is associated with eating disorder status after 12 months. The univariate logistic regression examining this relationship among adolescents



identified with an eating disorder at baseline revealed that help seeking at baseline was not associated with eating disorder status 12 months later ($p = .096$). Nor was baseline help seeking associated with weight and shape concerns ($p = .085$) or psychological distress ($p = .120$) 12 months later.


Discussion

Across the pre-existing data samples used in this chapter, prevalence rates for anorexia nervosa and bulimia nervosa were low, and in line with expectations for representative samples (e.g., Santomauro et al. ²⁴). The inclusion of individuals with no or limited symptoms of mental illness, along with individuals with or at elevated risk for an eating disorder or other mental health condition, allowed for comparison of help seeking patterns in a representative sample in the LSAC and EveryBODY studies. The additional focus on eating disorder symptom severity in the EveryBODY project allowed for examination of whether more severe symptom levels among individuals with a probable eating disorder increased likelihood of seeking help. Together, these datasets allowed us to characterise help seeking behaviours related to eating disorders, to explore cross-sectionally whether eating disorder status and help seeking were related, and then to explore longitudinally whether eating disorder diagnosis (or symptom severity) predicted subsequent help seeking or whether help seeking predicted improvement in eating disorder symptoms.

Broadly, several important themes emerge from present findings with respect to help seeking. First, help seeking via a health professional was low for both LSAC and EveryBODY datasets. Though individuals with a probable or partial syndromal eating disorder or body image concerns were more likely to seek help, rates still remained low, consistent with earlier reports in the literature (e.g., Hart et al. ²⁵). Instead, it was clear that help seeking was more commonly sought via family, friends, and partner, and this was the case for both individuals with and without a partial syndromal eating disorder. Individuals with a partial syndromal eating disorder tended to seek help from a wider range of sources.

Together, this pattern of findings suggests that awareness of a problem may not be the key barrier to accessing professional care, and that other factors may be at play. It is possible that these adolescents find the non-professional sources of support sufficient for their needs. Alternatively, it may be that they are unclear when to turn to professional support, or have some reluctance to do so.

A second key finding was that while both studies found cross-sectional and longitudinal support for an association between eating disorder status and help seeking (an effect robust to control of potential confounds), the predictive effect of eating disorder status on subsequent help seeking reduced to non-significance after controlling for eating disorder symptoms (EveryBODY study) and mental illness (both studies). On the one hand, this null finding for eating disorder status within adjusted models may suggest help seeking is driven by broader mental illness symptoms, and thus that symptoms of conditions such as depression may be a key entry point into treatment whereby eating disorder symptoms are coincidentally identified. On the other hand, it is possible that these null findings in the adjusted model instead reflect greater severity of illness; that is, it is when individuals have comorbidity that they are more likely to seek help. A symptom severity perspective is consistent with the focus of the Eating Disorders MBS initiative on individuals at the most severe end of the eating disorder spectrum, with later hopes to offer a more inclusive, stepped-care



approach for individuals who do not presently meet eligibility for eating disorder treatment via this specific MBS initiative.


Third, the EveryBODY study found that help seeking was unrelated to subsequent change in eating disorder symptom severity. On closer inspection it was clear that those who had reported having seen a health professional tended to have scores that indicated greater levels of severity and poorer functioning relative to those who had not seen a health professional. What is unknown is whether these adolescents were on a trajectory of worsening health, and whether as such it is possible that the intervention in some way had at least halted this progression.

Present findings should be placed within the context of study limitations. Particularly for LSAC, there was a low number of individuals with a probable eating disorder diagnosis. This reduced power to test for proposed effects, and also limited capacity to build more complex models with more extensive coverage of potential confounds beyond mental health status. For both datasets, time intervals were pre-determined, and may not match the true intervals for change to occur. Setting these time intervals too closely together or too far apart could both lead to inaccurate (and likely under-) estimates of the true effect of help seeking on eating disorder symptoms and eating disorder symptoms on help seeking. It is noteworthy that both studies found a correlation between help seeking across timepoints, suggesting that it is common for treatment to extend beyond a single year. As such, this may indicate that the full extent of benefit may also emerge well after the single year follow-up applied in the present study.

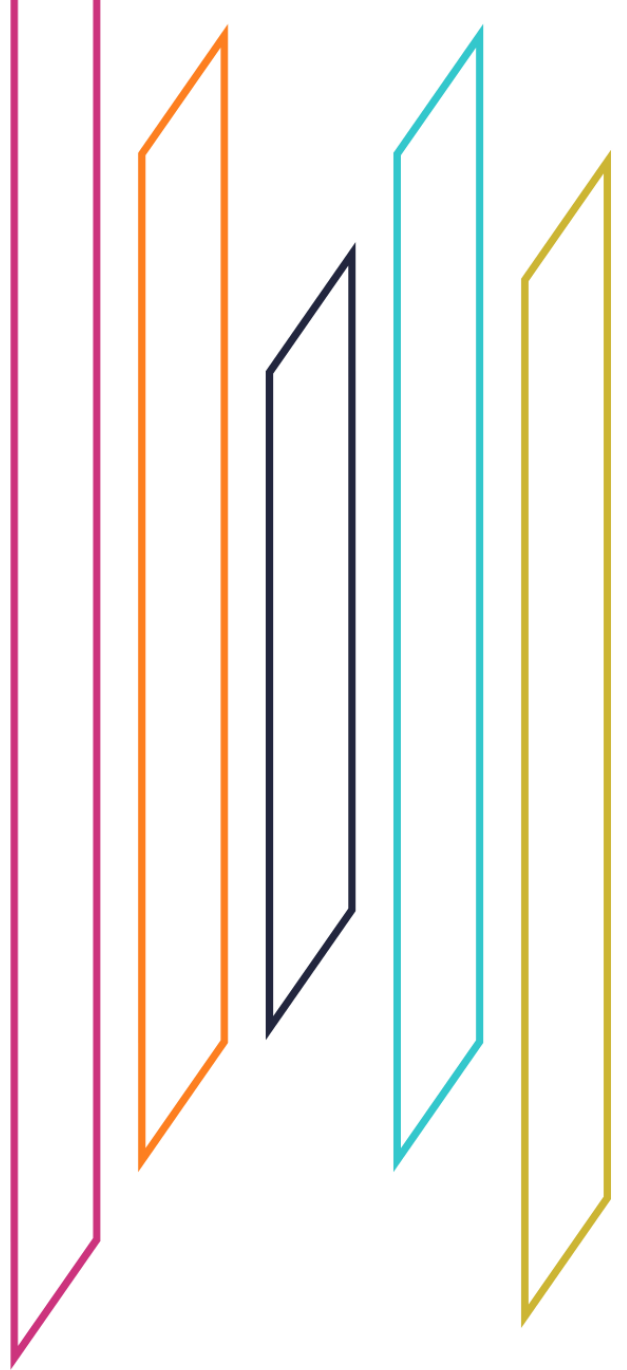
Despite these limitations, several findings cohere with the broader literature in finding low help seeking via professional sources, and both cross-sectional and longitudinal evidence of association between eating disorder diagnosis/severity and help seeking. Engagement with available, evidence-based treatment options remains a priority if we are to reduce the prevalence of eating disorders among children, adolescents, and adults in Australia.

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Chapter 4. Medicare Survey Study (Study 4)



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An exploration of the experiences and outcomes of people who received eating disorder care via the Eating Disorders MBS items

Introduction


In November 2019, the Australian Government introduced 64 Medicare items aimed at providing community treatment for individuals with eating disorders. As part of this initiative, the Australian government launched Eating Disorder Treatment and Management Plans (EDP), which offer government-subsidised services via the Medicare system. This includes up to 60 sessions (maximum of 40 psychological treatment and 20 dietetic health services) over a 12-month period, with the aim of providing evidence-based therapeutic protocols for individuals with eating disorders. This initiative is available to individuals with anorexia nervosa, bulimia nervosa, binge eating disorder, and other specified feeding and eating disorders (OSFED), who meet eligibility criteria as determined by their doctor; a general practitioner (GP) or other medical practitioner, a psychiatrist, or a paediatrician.

The Eating Disorders Medicare Benefits Schedule (MBS) items initiative incorporates regular review sessions with a GP every 10 psychological sessions. At the midpoint of care (20 psychological sessions), consultation with a psychiatrist or paediatrician is required to review progress and provide recommendations for ongoing treatment¹. This new initiative has been designed to support a model of evidence-based care for those eligible for this initiative, in turn improving outcomes for individuals with eating disorders.

Study 4 was a survey of consumers who are aged 15 years and older, who had received psychological treatment from specialist doctors, GPs, psychologists, social workers, or occupational therapists and/or dietetic health services from a dietitian as part of an EDP. This survey focussed on consumer experiences of attending sessions with these healthcare providers, and their perceptions of the outcomes of this treatment. Survey data were also linked to MBS and Pharmaceutical Benefits Schedule (PBS) claims data for consenting participants.

Specifically, this study addresses four key research objectives:

1. **Characterising Eating Disorders MBS health service use:** To obtain a better understanding of Eating Disorders MBS service use in terms of number of sessions, format of sessions, payment of sessions and the need for broader health service use;
2. **Perceptions of people with lived experience of an eating disorder of their experiences of Eating Disorders MBS item use:** To assess their perceptions of cost and affordability, overall satisfaction of the psychological and dietetic services, and the experience of seeing the psychological and dietetic providers in terms of logistical factors such as availability of services and personal factors such as empathy and understanding of the providers. Lastly, outcomes of care, with respect to self-rated eating disorder symptoms pre- and post-treatment and symptom improvement attributed to psychological and/or dietetic care, were examined;
3. **Identifying potential drivers or correlates of symptoms improvement:** To explore whether demographic factors, level of service utilisation, treatment modality, out-of-pocket costs and



overall satisfaction with services predict eating disorder symptom change derived from patient self-report of symptoms at baseline and post-treatment; and

4. **Using Eating Disorders MBS and PBS data linkage to supplement survey findings:** To supplement the survey data with respect to number of sessions received and treatment modality and in particular to determine the out-of-pocket costs for those who accessed Eating Disorders MBS items.

Recognising that level of uptake and experiences with Eating Disorders MBS items is likely to be heterogeneous, these four research objectives were examined for our sample overall as well as by individual demographics including SEIFA, location, gender and eating disorder subtype. This evaluation of potential heterogeneity provided a means to test potential inequities in healthcare access, utilisation, and experience.

Methods

Study design

Study 4 involved a cross-sectional survey of people who are aged 15 years and older who had received eating disorder services as part of an EDP.

Sampling and recruitment

People who had received eating disorder services under the EDP were identified by Services Australia as potential participants for the study. Services Australia approached the entire population of recipients of Eating Disorders MBS services who were 15 years and older who had accessed at least one psychological treatment session and/or at least one dietetic session as part of their EDP since 2019. This was 27,658 individuals at the time of 25th August 2023.

The target sample was 1,800 participants. With an estimated 7% response rate, based on the response rate of a prior, similar survey that evaluated the Better Access scheme ², it was estimated that we would need to approach at least 25,800 participants to achieve the target sample size. Given the number of individuals approached (27,658), this target was seen as achievable.

Services Australia sent each identified consumer a letter on our behalf, which invited them to complete the online survey and to consent to their MBS and PBS data being linked with their survey responses. The letter directed potential participants to the survey via a URL link and a QR code. Invitation letters were delivered by Australia Post by Services Australia's mail-house on Thursday 12th October and the survey closed on Monday 13th November.



Procedure

Interested consumers used the URL or QR code to access the survey online. The online survey presented participants with a plain language statement that described what their participation in the survey would involve. Once they had read the plain language statement, participants who chose to participate in the survey clicked on a box indicating that they consented to do so. Participants younger than 18 years of age were asked to complete an additional step, obtaining parental or guardian consent.

This additional step for those participants younger than 18 years (i.e., aged 15 – 17 years) required them to ask their parents/guardians to view a separate plain language statement to provide consent for them to complete the survey. The phone number or email of the parent/guardian was also obtained for those under 18 years old, which the researcher used to contact the parent or guardian to confirm parental consent.

The survey asked questions about demographics, Eating Disorders MBS treatment type, reasons for starting and ceasing treatment, their experiences of obtaining and continuing their EDP, their experiences of receiving care through their EDP, the outcomes of this care, and their overall evaluation of the care they received. The survey used branch logic, displaying a different combination of items depending on which services the participant had received (dietetic services, psychological treatment services, or both), and took participants between 15 and 25 minutes to complete.

After completing the survey questions, the participants were provided with a second plain language statement and consent form that described the MBS and PBS data linkage component of the study and sought their signed consent. Those who agreed to have their survey, MBS and PBS data linked checked several boxes indicating that they had been provided with sufficient information to provide consent. These individuals were required to provide relevant details so that Services Australia could locate their service use-related data.


At the end of the survey, participants were asked if they would like to enter a draw to win a prize (one of 50 gift vouchers valued at \$AU200 each). If they chose to participate in the prize draw, they were asked to provide contact details so that they could be notified if they won.

Those who did not wish to enter the prize draw and did not consent to data linkage remained anonymous. The identifying details of those who agreed to one or both were stored separately from their survey responses.

The survey instrument

The survey was initially based on a similar survey conducted for the Better Access evaluation because this study had similar objectives and research questions². However, there are some differences between Better Access and the EDP including the use of dietitian and psychological health care providers with an EDP compared to psychological treatment providers only for Better Access, which necessitated changes to the Better Access-based survey.

These changes were to include separate sections to evaluate dietetic services and psychological services. A section was also included to determine additional health services used such as ambulance, emergency department, and hospital inpatient care. In addition, through consultation



with the Eating Disorders MBS team, the Department of Health and Aged Care and a lived experience consultant, more inclusive language was included throughout the survey. The final version of the survey is shown in Appendix 4.1.

The final survey comprised 48 items designed to characterise the sample, as well as address the four research objectives elaborated on in the Introduction.

Sample characteristics

This subset of items includes participant demographics including postcode, age, gender, nationality and eating disorder diagnosis. Postcode was mapped to the Index of Relative Socioeconomic Disadvantage (IRSD) of the Socioeconomic Indexes for Areas (SEIFA)³. Demographic information was collected to characterise our sample and to enable evaluation of differences in experiences with the EDP as a function of demographics.


Service use

This subset of items explored use of Eating Disorders MBS services (including plan, treatment, and review items). Specifically, this section includes the type of health provider seen (GP, psychologist, occupational therapist, social worker, or dietitian), session type (face-to-face, telehealth, or phone), session delivery (individual or group sessions), number of sessions received (recorded separately for psychological and dietetic services), and broader eating disorder health service use (ambulance services, emergency department services, and inpatient hospital services).

Perceptions of service

This subset of items explored the ways in which individuals perceived different components of the Eating Disorders MBS services. Questions related to reasons for seeking help, self-rated eating disorder symptoms, adequacy of number of sessions, early cessation of care, reasons for early cessation of care, payment and payment perceptions, experience of seeing the health care provider, and overall satisfaction with health care. Further explanation of the methodology for items that explore the experience of seeing the mental health or dietetic provider, the overall satisfaction with care and outcomes of care are provided below:

- The experience of seeing the mental health professional and/or the dietitian: Consumers were asked to rate the extent to which they agreed or disagreed with 11 statements on a scale ranging from 1 (*strongly disagree*) to 5 (*strongly agree*). Examples of the statements include “I found the referral process straightforward” and “I was offered sessions at a time that suited me”. These statements were based on items that had been used in the National Audit of Psychological Therapies (NAPT) in the United Kingdom⁴ and were modified for the EDP context.
- Overall satisfaction with care: A single question, “How satisfied were you with your care?”, assessed consumers’ overall satisfaction with their care. There were five response options ranging from 1 (*very dissatisfied*) to 5 (*very satisfied*). This frequently used question corresponds to those used to assess satisfaction with services in other health care settings in Australia⁵.
- Outcomes of care: If participants had seen both a dietitian and mental health professional, six questions were asked to assess outcomes of care. Three questions were related to mental health



professionals and three questions related to services provided by dietitians. Participants were asked to think back to how their eating disorder symptoms were before they received treatment from a psychological treatment provider through their EDP, and then to consider how it was after they had done so. More specifically, they were asked “On a scale of 1 to 10, where 1 is the worst possible eating disorder symptoms and 10 is the best possible eating disorder symptoms, how would you rate your eating disorder symptoms before/after your first session with the mental health professional?” These same questions were then asked with respect to symptom levels prior to and after sessions with a dietitian.

These questions are based on standard questions about self-rated mental health used in large-scale population surveys like the Australian Health Survey⁶. In the current context, they were followed by a question about the cause of any change in eating disorder symptoms; “To what extent do you think that the treatment you received from the health professional/dietitian was responsible for any change in your eating disorder?” and the response options allowed participants to indicate that the treatment from the mental health professional or dietitian was “entirely responsible”, “partially responsible” or “not at all responsible” for any change.

MBS/PBS data linkage


MBS/PBS data linkage was requested and obtained from Services Australia. Services Australia provided a data file containing MBS/PBS item use specifically for MBS items provider fees charged, MBS and PBS benefits paid, and patient contribution (out-of-pocket costs). These data covered the period of January 2019 to December 2023 for all participants who consented to Services Australia to link MBS/PBS data. The MBS/PBS linkage thus provided an objective measure of health care utilisation and treatment modality type to supplement the self-report survey responses. Out-of-pocket costs were also reported for those individuals using Eating Disorders MBS items.

Data analysis

A range of descriptive and inferential statistics were used to characterise the sample and to address our research questions. To characterise our sample, we conducted descriptive analyses, reporting frequencies, percentages and means (and standard deviations) for all variables.

To achieve research objective 1, which sought to obtain a better understanding of Eating Disorders MBS service use, we used frequencies and percentages to report number of sessions, format of sessions, payment of sessions and the need for broader health services. These analyses were completed for the full sample. Information on number of sessions was also completed for individuals who had finished treatment or chosen to cease their treatment (i.e., omitting from analyses those who were still in treatment at the time of the survey).

To evaluate research objective 2, which aimed to determine the individual’s perceptions and outcomes of the Eating Disorders MBS items, we reported the results in frequencies and percentages. Outcomes of care were measured as the difference between participants’ self-rated eating disorder symptoms after receipt of care from the mental health professional/dietitian and their self-rated eating disorder symptoms before this care. This yielded two outcome scores for psychological treatment and dietetic services respectively, ranging between -9 and +9, where positive



scores indicated improvement, negative scores indicated deterioration, and a score of 0 indicated no change.


We reported this raw change in symptom improvement in the descriptive analyses. In addition, we adopted a standardised difference approach to classifying outcomes on this scale, using an effect size of 0.3 (small-to-medium, as per Cohen's classification⁷) of a standard deviation of the self-rated mental health before receipt of care as the indicator of change. This yielded three outcome groups: "Significantly deteriorated"; "No significant change"; and "Significantly improved". The number of individuals in these categories were then reported as frequencies and percentages.

Data analyses were completed for the full sample in research objective 2 focused on reasons for seeking help, self-rated eating disorder symptoms, payment and payment perceptions, experience of seeing the health care provider and overall satisfaction with health care. Where relevant, analyses were presented separately for the full sample and for those who had finished treatment, either having completed their course of treatment or having chosen to cease treatment early (i.e., those who were still in current treatment were not included in this subsample). This included analyses of reasons for early cessation of care, adequacy of number of sessions, and self-rated eating disorder symptoms (analysis for both samples were reported). Significance testing of the mean eating disorder symptom improvement and satisfaction with treatment sessions (the right number of sessions, too many sessions or too few sessions) and mean eating disorder symptom improvement and overall satisfaction of services was performed.

To evaluate research objective 3, which aimed to explore the drivers or correlates of improvement, we conducted multivariable logistic regression analyses to estimate the strength of association between selected covariates and the outcomes of improvement ("Significantly improved" versus "Significantly deteriorated" and "No significant change" combined) in the main report, and deterioration ("Significantly deteriorated" versus "Significantly improved" and "No significant change" combined) in the Appendices. The covariates of interest were age, gender, sexual identity, country of birth, First Nations status, area of residence, socioeconomic status (as indicated by the SEIFA IRSD), baseline self-rated mental health, self-reported provider type and self-reported number of sessions. A $p < .05$ level (two-tailed) was adopted as our criterion for statistical significance. We report the results of the regression analyses as adjusted odds ratios. These data analyses were completed for individuals who had finished treatment or chosen to cease their treatment (i.e., those who were still in current treatment were not included).

To evaluate research objective 4, we used MBS and/or PBS linked data to determine out-of-pocket costs. We converted out-of-pocket costs to 2022 – 2023 values using the ABS Consumer Price Index for medical and hospital services^{8,9}. We also used these data to estimate the number of sessions, session modality (face-to-face, phone or telehealth) and session type (individual or group).

For the out-of-pocket costs per session from the MBS/PBS data linkage, we reported mean and median values. Median values are the preferred option in cases where data may be skewed, for example where the majority of people have low out-of-pocket costs, but a small number of people have high costs. This is a frequently used approach to reporting out-of-pocket costs^{10,11}. We reported median values for total out-of-pocket costs incurred during the study period as well as the range of mean out-of-pocket costs per person. We reported percentages and frequencies and the types of



services used. We also reported the payment of these services with respect to perceptions of treatment cost.

Furthermore, we re-ran the univariate and multivariable logistic regression analyses to estimate the strength of association between selected covariates and the outcomes of improvement (“Significantly improved” versus “Significantly deteriorated” and “No significant change” combined) for individuals who consented to linking their MBS and/or PBS data. Secondly, we included these objective MBS predictors, including number of services (both dietetic and psychological services), provider type and modality of services (face-to-face, telehealth, phone for both dietetic and psychological services) in place of data that had been collected by self-report in logistic regression analyses conducted to address research objective 3. The MBS logistic regression models were completed for individuals who consented to linking their MBS data and individuals who had finished treatment or chosen to cease their treatment (i.e., those who were still in current treatment were not included).

Missing data

There were 2,421 individuals who completed the full survey, and an additional 763 who did not complete the full survey. Those with partially completed responses were excluded from analyses. Statistical analysis comparing complete and partial responders identified no significant differences between the groups for eating disorder diagnosis ($X^2(2) = 1.58, p = .45$), eating disorder diagnosis groups ($X^2(8) = 5.96, p = .65$), and EDP treatment providers ($X^2(5) = 7.38, p = .19$).

In the complete responders sample, there was less than 5% missing data and missing data for demographics, referral and provider type and eating disorder diagnoses were missing completely at random ($X^2(10, n = 2,421) = 1.43, p = .999$); therefore, complete case analysis was used.

MBS/PBS linkage

MBS and PBS data linkage to the survey responses was approved and extracted for 1,959 individuals (81% consented to MBS and/or PBS linkage) to explore occasions of service use and co-payment of services.

Approvals

The Monash University Human Research Ethics Committee approved the study (HREC ID: 2023-37760). Services Australia External Requests Evaluation Committee approved the mail-out (EREC ID: RMS3086) and MBS and PBS records data linkage (EREC ID: RMS3109).

Acknowledgements

We would like to acknowledge Services Australia for assisting us with recruiting participants for Study 4. We would also like to thank the participants who contributed their time to complete the survey for Study 4. All MBS and PBS data reported in Study 4 were supplied to us by Services Australia.

Results

Sample characteristics

The invitation to participate was sent to 27,658 individuals. Of these, 3,184 individuals consented to complete the survey (11.5% response rate) and 2,421 individuals completed the survey and were included in the analyses. The number of individuals younger than 18 years of age who completed the survey was 279 (11.5%).

Table 4.1 shows that almost half of the individuals who completed the survey were younger than 24 years old, whilst less than 10% of the sample was older than 50 years old. The majority of the sample was female (92%), heterosexual (67%), born in Australia (89%), and were not Aboriginal or Torres Strait Islander (98%). Over 80% of the participants were from either Victoria, New South Wales, or Queensland. The proportion of individuals with a SEIFA disadvantage score indicating least disadvantage was 40% and lower proportions of participants were in categories of increasing disadvantage. First Nations people accounted for 2% of the sample.

Table 4.1. Sociodemographic profile of the survey sample

	<i>n</i> (%)
Age (<i>n</i> = 2,421)	
< 18 years	283 (12)
18 – 20	440 (18)
21 – 24	448 (19)
25 – 29	395 (16)
30 – 34	242 (10)
35 – 39	194 (8)
40 – 44	142 (6)
45 – 50	77 (3)
50 – 54	78 (3)
55 – 59	64 (3)
60 – 64	30 (1)
65 – 69	16 (1)
70 – 74	8 (< 1)
74 – 79	3 (< 1)
> 80	1 (< 1)

		<i>n</i> (%)
Sex (<i>n</i> = 2,420)	Female	2227 (92)
	Male	105 (4)
	Non-binary sex	83 (3)
	Prefer not to say	5 (1)
Sexual identity (<i>n</i> = 2,419)	Lesbian, gay, or homosexual	135 (6)
	Straight or heterosexual	1,631 (67)
	Asexual	121 (5)
	Bisexual or pansexual	467 (19)
	Unsure	72 (3)
	Prefer not to say	39 (2)
	Other	58 (2)
Country of birth (<i>n</i> = 2,420)	Australia	2,145 (89)
	Overseas	275 (11)
First Nations status (<i>n</i> = 2,420)	Aboriginal	38 (2)
	Torres Strait Islander	0 (0)
	Both	2 (< 1)
	Neither	2,380 (98)
State of residence (<i>n</i> = 2,400)	NSW	759 (32)
	VIC	724 (30)
	QLD	452 (19)
	SA	121 (5)
	WA	272 (11)
	TAS	68 (3)
	NT	4 (< 1)
Area level socioeconomic status (SEIFA IRSD quintiles; <i>n</i> = 2,392)	Q1 (Most disadvantaged)	173 (7)
	Q2	297 (12)
	Q3	388 (16)
	Q4	576 (24)
	Q5 (Least disadvantaged)	958 (40)

Note. Denominators differ due to missing data. Variable columns may not add up to 100% due to rounding.

The demographic profile of participants in Study 4 is generally similar to the patient population identified in Study 2 (a population-level study of individuals who accessed any Eating Disorders MBS items). For the year 2022 (the latest year with full data available for Study 2), the proportion of individuals aged 39 years and younger was 86% in Study 2, which is comparable to the 83% found in Study 4 (see Table 4.1). Similar to Study 4, about 93% of Study 2's patient population in 2022 were females. The majority of individuals in Study 2 (78%) were from either Victoria, New South Wales, or Queensland, which is similar to the location pattern of participants in Study 4. Approximately 79% of individuals in Study 2 were identified as living in major cities in Australia, 16% in inner regional areas, 4% in outer regional areas and less than 1% in remote and very remote areas. While not directly comparable, this geographical pattern is nevertheless consistent with the gradient observed in SEIFA scores for Study 4 participants.

Eating disorder diagnoses at the time the EDP was given are reported in Tables 4.2 and 4.3. Table 4.2 shows whether the individual was provided with a diagnosis at the time of receiving the EDP, and Table 4.3 shows the specific diagnoses of the sample. Table 4.2 shows that 71% of individuals were given an eating disorder diagnosis whilst 18% did not report a diagnosis and a smaller proportion were unsure. As shown in Table 4.3, anorexia nervosa was identified as the most common diagnosis at the time of EDP preparation (29% of individuals). Multiple diagnoses, where two or more eating disorder diagnoses were providedⁱ, represented the second highest proportion of respondents (22%). Interestingly, 18% of individuals reported no diagnosis at the time they were given an EDP.

Table 4.2. Diagnosis status at time after receiving EDP

	<i>n</i> (%)
Given diagnosis	1,729 (71)
Not given diagnosis	427 (18)
Unsure	265 (11)

Note. *n* = 2,421.

Table 4.3. Diagnosis at time when EDP was given (multiple responses permitted)

	<i>n</i> (%)
Anorexia nervosa	704 (29)
Bulimia nervosa	132 (6)
Binge-eating disorder	260 (11)
Atypical anorexia nervosa	147 (6)
OSFED	82 (3)
AFRID	66 (3)
Total multiple diagnoses group (more than one diagnosis)	541 (22)
Anorexia nervosa + OSFED or anorexia nervosa + atypical anorexia nervosa	31 (1)
Anorexia nervosa + bulimia nervosa	83 (3)
Anorexia nervosa + binge eating disorder	17 (1)
Bulimia nervosa + binge eating disorder	37 (2)
Bulimia nervosa + OSFED	9 (< 1)
All other multiple diagnosis groups	364 (15)
Unsure	62 (3)
No diagnosis	427 (18)

Note. *n* = 2,421. OSFED = other specified feeding or eating disorder, ARFID = avoidant/restrictive food intake disorder. Variable columns may not add up to 100% due to rounding.

Service use

The service use subsection explores a number of factors related to service use including EDP treatment provider, who provided the EDP referral, prior use of Eating Disorders MBS services,

* Multiple diagnoses was due to different diagnoses being given at different points throughout the 2019 to 2023 timeframe. This may be due to the eating disorder diagnosis changing or due to initial misdiagnosis. This will be discussed in further detail in the Discussion section.

current use of Eating Disorders MBS services (from the survey), number of sessions and modality of sessions.

As shown in Table 4.4, two-thirds (63%) of individuals self-reported receiving both psychological treatment and dietetic services and that the EDP referrer was most commonly a GP (89%). For most individuals, it was the first time they had received Medicare funded dietetic (77%) or psychological (61%) health care for their eating disorder.

Appendix Table 4.2.1 in Appendix 4.2 shows that for most eating disorder diagnoses the percentage of individuals who used psychological treatment only was approximately 30%, except for atypical anorexia nervosa, which was 18%. The number of individuals who used dietetic services only ranged from 2% for atypical anorexia to 19% for those with an unspecified diagnosis. Finally, those who used both dietetic services and psychological treatment ranged from 50% for an unspecified diagnosis to 80% for those with atypical anorexia nervosa.

Appendix Table 4.2.2 in Appendix 4.2 shows first time use of psychological and dietetic services. The results range from 47% for unspecified diagnosis to 67% for a diagnosis of avoidant/restrictive food intake disorder (ARFID) for first time use of psychological services, and 51% for no diagnosis to 69% for atypical anorexia nervosa for first time use of dietitian services. Further details of additional service use outside of the EDP, help seeking reasons, mean symptom change and symptom improvement by eating disorder diagnosis type are found in Appendix 4.2.

Table 4.4. EDP referral, provider, and prior use of Eating Disorders MBS services

		<i>n</i> (%)
EDP Provider (<i>n</i> = 2,421)	Only psychological treatment provider	707 (29)
	Only dietitian	159 (7)
	Both psychological treatment provider and dietitian	1,529 (63)
	Any psychological treatment	2,236 (92)
	Any dietetic intervention	1,688 (70)
EDP Referrer (<i>n</i> = 2,421)	GP	2,150 (89)
	Psychiatrist	133 (5)
	Paediatrician	45 (2)
	Other medical practitioner	72 (3)
	Unsure	21 (< 1)
Prior use of Medicare psychological services (<i>n</i> = 2,261)	First time seeing a Medicare funded psychological health professional	1,389 (61)
	Not first time seeing a Medicare funded psychological health professional	758 (34)
	Unsure	114 (5)
Prior use of Medicare dietetic services (<i>n</i> = 1,716)	First time seeing a Medicare funded dietitian	1,317 (77)
	Not first time seeing a Medicare funded dietitian	301 (18)
	Unsure	97 (6)

Note. Denominators differ due to missing data. Variable columns may not add up to 100% due to rounding. GP: general practitioner.

Table 4.5 indicates if care was still being received at the time of survey completion. Over half (57%) of individuals were still receiving care (under EDP) from a mental health professional, whilst 39% of individuals were still receiving care (under EDP) from a dietitian.

Table 4.5. Ongoing receipt of sessions of care

		<i>n</i> (%)
Still receiving sessions of care from a mental health professional (<i>n</i> = 2,259)	Yes	1,281 (57)
	No	879 (39)
	Unsure	99 (4)
Still receiving sessions of care from a dietitian (<i>n</i> = 1,713)	Yes	670 (39)
	No	951 (56)
	Unsure	92 (5)

Table 4.6 shows the self-reported number of psychological and dietetic services received and also reports the number of psychological services and dietetic services as per the MBS data. For the full self-report sample (those both in and out of treatment), 29% of individuals received 40 or more psychological sessions and 23% of individuals received 20 or more dietetic sessions. Whereas when using the MBS data to determine the number of sessions received for the full sample (individuals both in and out of treatment), 19% of individuals received 40 or more psychological sessions and 41% of individuals received 20 or more dietetic sessions. For those no longer using EDP services (due to completion or early cessation), 21% received 40 or more psychological sessions and 14% of individuals received 20 or more dietetic sessions based on self-report responses. The MBS data for those no longer in treatment found 8% of individuals received 40 or more psychological sessions, and 36% of individuals received 20 or more dietetic sessions.

The number of sessions received was further examined as a function of socioeconomic status, which can be found in Table 4.7. For the full sample, the most disadvantaged group had the highest percentage of individuals who received fewer than 10 psychological treatment sessions (17%) and fewer than five dietetic service sessions (23%), whilst the least disadvantaged group had the highest percentage of individuals who received 40 or more psychological sessions (35%). The percentage of individuals obtaining 20 or more dietetic sessions was the same for the most disadvantaged and least disadvantaged groups (25%).

Table 4.6. Number of sessions of health care received at time of survey completion

			Total sample <i>n</i> (%)	No longer in EDP services <i>n</i> (%)
			<i>n</i> = 2,260	<i>n</i> = 879
Self-report results	Number of sessions of care from mental health professional	Fewer than 10	298 (13)	172 (20)
		10 – 19	480 (21)	200 (23)
		20 – 29	359 (16)	126 (14)
		30 – 39	242 (11)	85 (10)
		40+	657 (29)	188 (21)
		Unsure	224 (10)	108 (12)
			<i>n</i> = 1,637	<i>n</i> = 720
MBS data results	Number of sessions of care from mental health professional	Fewer than 10	493 (30)	312 (43)
		10 – 19	423 (26)	205 (28)
		20 – 29	270 (16)	98 (14)
		30 – 39	140 (9)	46 (6)
		40+	311 (19)	59 (8)
		Unsure		
			<i>n</i> = 1,712	<i>n</i> = 951
Self-report results	Number of sessions of care from dietitian	Fewer than 5	344 (20)	266 (28)
		5 – 9	344 (20)	219 (23)
		10 – 14	300 (18)	159 (17)
		15 – 19	210 (12)	108 (11)
		20+	392 (23)	135 (14)
		Unsure	122 (7)	64 (7)
			<i>n</i> = 1,461	<i>n</i> = 932
MBS data results	Number of sessions of care from dietitian	Fewer than 5	403 (28)	291 (31)
		5 – 9	170 (12)	106 (11)
		10 – 14	169 (12)	125 (13)
		15 – 19	122 (8)	79 (8)
		20+	597 (41)	331 (36)
		Unsure		


For the individuals who were no longer receiving care via an EDP, the second most disadvantaged group had the highest percentage of individuals who received fewer than 10 psychological sessions (26%) and the most disadvantaged group had the highest percentage of individuals who received fewer than five dietitian sessions (35%). The least disadvantaged group had the highest percentage of individuals who received 40 or more psychological sessions (26%), while the most disadvantaged groups had the highest percentage of individuals who received 20 or more dietetic sessions (20%).



Table 4.7. Number of sessions of health care received according to socioeconomic status

Socioeconomic disadvantage	Total sample <i>n</i> (%)					No longer in EDP services <i>n</i> (%)				
	0 – 20%	21 – 40%	41 – 60%	61 – 80%	81 – 100%	0 – 20%	21 – 40%	41 – 60%	61 – 80%	81 – 100%
Sessions	Psychological treatment sessions									
	<i>n</i> = 156	<i>n</i> = 266	<i>n</i> = 354	<i>n</i> = 540	<i>n</i> = 915	<i>n</i> = 68	<i>n</i> = 116	<i>n</i> = 143	<i>n</i> = 193	<i>n</i> = 348
< 10	26 (17)	43 (16)	55 (16)	57 (11)	112 (12)	14 (21)	30 (26)	34 (24)	27 (14)	64 (18)
10 – 19	31 (20)	62 (23)	86 (24)	120 (22)	172 (19)	16 (24)	26 (22)	37 (26)	44 (23)	75 (22)
20 – 29	28 (18)	37 (14)	57 (16)	102 (19)	132 (14)	12 (18)	11 (9)	21 (15)	38 (20)	42 (12)
30 – 39	16 (10)	27 (10)	32 (9)	62 (11)	101 (11)	6 (9)	9 (8)	17 (12)	19 (10)	32 (9)
> 40	35 (22)	68 (26)	92 (26)	142 (26)	316 (35)	13 (19)	22 (19)	18 (13)	44 (23)	91 (26)
Unsure	20 (13)	29 (11)	32 (9)	57 (11)	82 (9)	7 (10)	18 (16)	16 (11)	21 (11)	44 (13)
	Dietetic health sessions									
	<i>n</i> = 132	<i>n</i> = 205	<i>n</i> = 281	<i>n</i> = 404	<i>n</i> = 677	<i>n</i> = 69	<i>n</i> = 117	<i>n</i> = 148	<i>n</i> = 221	<i>n</i> = 388
< 10	31 (23)	42 (20)	55 (20)	85 (21)	128 (19)	24 (35)	35 (30)	42 (28)	64 (29)	99 (26)
10 – 19	23 (17)	46 (22)	61 (22)	81 (20)	129 (19)	12 (17)	30 (26)	43 (29)	47 (21)	86 (22)
20 – 29	23 (17)	28 (14)	50 (18)	69 (17)	126 (19)	11 (16)	14 (12)	21 (14)	38 (17)	73 (19)
30 – 39	10 (8)	26 (13)	37 (13)	53 (13)	82 (12)	3 (4)	14 (12)	20 (14)	25 (11)	45 (12)
> 40	33 (25)	49 (24)	58 (21)	84 (21)	166 (25)	14 (20)	19 (16)	14 (9)	28 (13)	59 (15)
Unsure	12 (9)	14 (7)	18 (6)	32 (8)	45 (7)	5 (7)	5 (4)	8 (5)	19 (9)	26 (7)

Note. 0 – 20% represents most disadvantage, 81 – 100% represents least disadvantage. Columns may not add to 100% due to rounding



When the number of services received are further broken down according to other demographics categories (see Appendix 4.3), the results show that for psychological treatments, those in the most disadvantaged SEIFA group were most likely to have less than 10 sessions (17%) and were least likely to have 40 or more sessions (22%) compared to other SEIFA groups (Appendix Table 4.3.1). Appendix Table 4.3.2 shows that males were most likely to receive fewer than 10 psychological sessions (21%). Older age groups (35 years and older) were more likely to attend fewer than 10 psychological treatment sessions compared to younger age groups (34 years and younger) (see Appendix Table 4.3.4).

For dietetic sessions, results showing the number of sessions attended according to demographic characteristics are reported in Appendix Tables 4.3.6 to 4.3.10. Those in the most disadvantaged SEIFA group were most likely to have fewer than five sessions (23%) compared to other SEIFA groups. Second, those who preferred to self-describe their gender were most likely to have fewer than five dietetic sessions (44%) compared to other genders.

Data from self-report and MBS-linked sources on the modality and format of the psychological and dietetic services received by the respondents are presented in Tables 4.8 and 4.9. For the self-report data, the most common form of treatment modality was face-to-face treatment for both psychological (88%) and dietetic services (81%). When looking at face-to-face only, electronic only (telehealth or phone), or the combination of these formats, self-report data indicated that the most common format of session delivery was a combination of face-to-face or electronic formats (45%) for psychological services and face-to-face only format (49%) for dietetic services. Furthermore, for the self-report data, 99% (for psychological treatment) and 97% (for dietetic services) of respondents identified that their treatments were delivered in an individual setting. The modality and format of sessions were similar for the MBS linked data.

When the EDP treatment session modality and format were broken down further into state and SEIFA groups for psychological treatment, the results showed similar session delivery modality and format across states. The only major difference was that Queensland, Western Australia and Tasmania had over 50% of face-to-face only sessions which was higher than that observed for other states. When looking at the breakdown of socioeconomic status using SEIFA codes, the results show that the most disadvantaged are less likely to use face-to-face services and more likely to use phone sessions or electronic health only compared to the least disadvantaged individuals. These results are found in Appendix Table 4.4.1 and Appendix Table 4.4.2.

When the EDP treatment session modality and format were examined across state and SEIFA groups for dietetic services, similar findings for session delivery were found across states. However, Victoria had higher levels of any telehealth (64%) and only electronic health (29%) than other states, while Queensland, South Australia and Tasmania had higher levels (over 60%) than other states of face-to-face only sessions. With respect to socioeconomic status, the results were similar for all socioeconomic groups and thus reflected the pattern of session delivery described above for the full sample. Further details on these results are in Appendix Tables 4.4.3 to 4.4.4.

Table 4.8. Modality and format of mental health psychological sessions

		<i>n</i> (%)
Session modality self-report (<i>n</i> = 2,259)	Face-to-face any	1980 (88)
	Telehealth any	1303 (53)
	Phone any	267 (12)
	Face-to-face only	954 (42)
	Electronic health only (telehealth or phone)	277 (12)
	Face-to-face and electronic	1,026 (45)
	Unsure	3 (< 1)
Session modality MBS data (<i>n</i> = 1,637)	Face-to-face any	1,457 (89)
	Telehealth any	908 (55)
	Phone any	151 (9)
	Face-to-face only	679 (41)
	Electronic health only (telehealth or phone)	180 (11)
	Face-to-face and electronic	778 (48)
Session format self-report (<i>n</i> = 2,259)	Individual	2,235 (99)
	Group	193 (9)
	Unsure	7 (< 1)
Session format MBS data (<i>n</i> = 1,637)	Individual	1,632 (99)
	Group	5 (< 1)

Note. Columns do not add to 100%, as multiple responses were permitted.

Table 4.9. Modality and format of dietetic sessions

		<i>n</i> (%)
Session modality self-report (<i>n</i> = 1,716)	Face-to-face any	1,392 (81)
	Telehealth any	774 (45)
	Phone any	173 (10)
	Face-to-face only	841 (49)
	Electronic health only (telehealth or phone)	310 (18)
	Face-to-face and electronic	551 (32)
	Unsure	12 (< 1)
Session modality MBS data (<i>n</i> = 1,461)	Face-to-face any	1,251 (86)
	Telehealth any	746 (51)
	Phone any	136 (9)
	Face-to-face only	663 (45)
	Electronic health only (telehealth or phone)	210 (14)
	Face-to-face and electronic	588 (40)
Session format self-report (<i>n</i> = 1,716)	Individual	1,669 (97)
	Group	31 (2)
	Unsure	12 (< 1)
Session format MBS data (<i>n</i> = 1,461)	Individual	1,461 (100)
	Group	0 (0)

Note. Columns do not add to 100%, as multiple responses were permitted.

Broader use of emergency and acute eating disorder services

This study also explored use of broader eating disorder health services. Table 4.10 shows that the majority of individuals accessed no ambulance, emergency department, hospital day programs, or hospital inpatient services. However, 5% of individuals used ambulance and hospital day programs at least once in the past 12 months, while 9% accessed an emergency department at least once in the past year, and 8% were admitted to hospital as an inpatient in the prior year.

Further details of ambulance, emergency department and hospital utilisation by diagnosis group are provided in Appendix Tables 4.2.18 to 4.2.21. The majority of individuals within each diagnostic group used no emergency or hospital inpatient services. However, people with atypical anorexia, anorexia nervosa, and multiple diagnoses were the diagnosis groups that used the most emergency, ambulance, and hospital inpatient services. Appendix Tables 4.5.1 to 4.5.6 show emergency and hospital inpatient use by the number of sessions of care. These show that individuals who used more psychological and dietetic services had greater usage of ambulance, emergency department and hospital inpatient attendances.

Table 4.10. Use of ambulance, emergency department and hospital services

	Ambulance (<i>n</i> = 2,419)	Emergency department (<i>n</i> = 2,419)	Hospital day program (<i>n</i> = 2,418)	Hospital inpatient (<i>n</i> = 2,419)
None, <i>n</i> (%)	2,209 (92)	1,997 (83)	2,234 (93)	2,081 (87)
1 time, <i>n</i> (%)	107 (5)	195 (9)	107 (5)	177 (8)
2 to 4 times, <i>n</i> (%)	71 (3)	172 (8)	49 (3)	129 (6)
5 to 7 times, <i>n</i> (%)	10 (1)	31 (2)	4 (1)	16 (1)
More than 8 times, <i>n</i> (%)	5 (1)	12 (1)	14 (1)	8 (1)
Unsure, <i>n</i> (%)	17 (1)	12 (1)	10 (1)	8 (1)

Perceptions of service use

We explored perceptions of service use including information on reasons for engaging in Eating Disorders MBS services, adequacy of number of sessions, early cessation of care, reasons for early cessation of care, payment and payment perceptions, experience of seeing the health care provider, overall satisfaction with health care, and self-rated improvement in eating disorder symptoms.

Table 4.11 provides information on the reasons given by survey respondents for engaging with eating disorders treatment with Eating Disorders MBS services via an EDP. Over half of the sample (58%) recognised they needed help and gave this as a reason for seeking treatment. Just under half of the sample (43%) stated that they were encouraged by family or friends to seek help for their eating disorder.

Table 4.11. Reasons for engaging Eating Disorders MBS services (*n* = 2,421)

	<i>n</i> (%)
Recognised I needed help	1,434 (59)
Encouraged by friends/family	1,022 (42)
Referred by medical practitioner	948 (39)

Very low weight symptoms	878 (36)
Physically unwell	780 (32)
Binge eating symptoms	733 (30)
Vomiting symptoms	570 (24)
Other	430 (17)
Unsure	5 (< 1)

Note. Columns do not add to 100% as multiple responses were permitted.

Perceived adequacy of the number of services received for those who were no longer in treatment is provided in Table 4.12. Over one-third of respondents (40% for psychological sessions and 38% of dietitian services) found the number of sessions they received to be adequate. A higher proportion of respondents perceived the number of sessions they received to be too few, rather than too many. Further details of adequacy of number of psychological and dietetic sessions for those who were no longer in treatment by diagnosis type are found in Appendix Tables 4.2.8 and 4.2.9. These show that for psychological services, individuals with bulimia nervosa and with no diagnosis were those that had the highest percentage (44%) agreeing that they had too few sessions. The percentage of individuals who were no longer in treatment who agreed that the number of psychological sessions was just right ranged from 23% for anorexia nervosa + OSFED or anorexia nervosa + atypical anorexia nervosa to 60% for bulimia nervosa + OSFED. For dietetic services, individuals with bulimia nervosa who were no longer in treatment had the highest percentage (37%) agreeing that they had too few sessions. The percentage of individuals who agreed that the number of dietetic sessions was just right ranged from 23% for anorexia nervosa + OSFED or anorexia nervosa + atypical anorexia nervosa to 47% for each atypical anorexia nervosa and OSFED.

Table 4.12. Perception of adequacy of number of treatment sessions by people no longer receiving Eating Disorders MBS services

		<i>n</i> (%)
Adequacy of number of psychological sessions (<i>n</i> = 977)	Too many	62 (6)
	Too few	336 (34)
	Just right	390 (40)
	Unsure	189 (19)
Adequacy of number of dietitian sessions (<i>n</i> = 1,042)	Too many	93 (9)
	Too few	268 (26)
	Just right	401 (38)
	Unsure	280 (27)

Note. Columns may not add to 100% due to rounding.

The perceived adequacy of the number of treatment services for those who were no longer in treatment as part of their EDP was then reviewed with respect to the number of psychological sessions and the number of dietetic sessions received (Table 4.13). Of individuals who received 40 or more psychological sessions and were no longer in treatment, 49% thought this was the right number of sessions, 25% believed this was too few sessions and just 11% thought this was too many sessions. Furthermore, Table 4.13 shows that half (52%) of individuals who had less than 10 psychological sessions found this to be too few sessions. Approximately half of individuals who had 10 or more sessions found this number of psychological sessions to be just right.



Of the individuals who received 20 or more dietetic sessions (the full treatment course) and were no longer in treatment, 11% believed this was too many sessions, 20% thought that this was too few sessions and 57% believed that this was the right number of sessions. Furthermore, 37% of individuals who had fewer than five sessions found this to be too few sessions, while over half of individuals who had 10 or more sessions (20 is the maximum number of dietetic sessions in a 12-month period on an EDP) found this number of sessions to be just right. Baseline eating disorder symptom severity was also unrelated to perceived adequacy of number of dietetic ($F[2,532] = 2.48, p = .085$) and psychological ($F[2,720] = 0.21, p = .812$) treatment services received.

Table 4.13. Adequacy of number of treatment sessions by the number of psychological treatment and dietetic sessions received for those individuals no longer using Eating Disorders MBS services as part of their EDP

Psychological sessions (<i>n</i> = 879)	Fewer than 10 sessions (<i>n</i> = 172)	10 – 19 sessions (<i>n</i> = 200)	20 – 29 sessions (<i>n</i> = 126)	30 – 39 sessions (<i>n</i> = 85)	40 or more sessions (<i>n</i> = 188)	Unsure (<i>n</i> = 108)
Too many	7 (4)	8 (4)	7 (6)	7 (8)	20 (11)	12 (11)
Too few	90 (52)	73 (37)	37 (29)	21 (25)	47 (25)	25 (23)
Just right	31 (18)	81 (41)	59 (47)	47 (55)	92 (49)	50 (46)
Unsure	44 (26)	38 (19)	23 (18)	10 (12)	29 (15)	20 (19)
Dietetic sessions (<i>n</i> = 951)	Fewer than 5 sessions (<i>n</i> = 266)	5 – 9 sessions (<i>n</i> = 219)	10 – 14 sessions (<i>n</i> = 159)	15 – 19 sessions (<i>n</i> = 108)	20 or more sessions (<i>n</i> = 135)	Unsure (<i>n</i> = 64)
Too many	28 (11)	21 (10)	11 (7)	8 (7)	15 (11)	4 (6)
Too few	99 (37)	60 (27)	23 (14)	25 (23)	27 (20)	10 (16)
Just right	39 (15)	75 (34)	87 (55)	64 (59)	77 (57)	29 (45)
Unsure	100 (38)	63 (29)	38 (24)	11 (10)	16 (12)	21 (33)

Note. *n* (%). Columns may not add to 100% due to rounding.

Further details on the adequacy of sessions according to session modality and service provider are found in Appendix 4.6. Appendix Table 4.6.1 shows that over 30% of individuals who had face-to-face, telehealth, phone, and individual sessions felt they had too few psychological sessions, whereas 19% of those who had a group session thought they had too few psychological sessions. The results also showed that approximately 40% of respondents across all treatment modality types for psychological sessions thought the number of sessions was just right. Appendix Table 4.6.2 shows that respondents indicating they received the right number of dietetic sessions ranged from 26% for those in group sessions to 49% for those receiving phone sessions. Only 4% of individuals that had group dietetic sessions thought they had too few sessions, while 26% of those who had face-to-face dietetic sessions believed they had too few dietetic sessions.

Early cessation of care

Early cessation of care for those who were no longer using Eating Disorders MBS services is reported in Table 4.14. A little over one-third (36%) of individuals continued to see their psychological treatment provider for as long as they could, while 53% ceased their psychological treatment early. Table 4.14 also identifies that 26% of individuals continued to see their dietitian for as long as they could and 63% ceased their dietetic sessions early.

Further detail on session attendance according to diagnosis is presented in Appendix 4.2. Appendix Tables 4.2.10 and 4.2.11 show that with respect to single diagnoses, individuals attended their psychological treatment and dietetic sessions for as long as they could have at the lowest rates when no diagnosis was provided (22% for psychological treatment and 15% for dietetic sessions). Higher proportions of individuals attending the sessions for as long as they could were observed for those with atypical anorexia (54% for psychological treatment) and anorexia nervosa and atypical anorexia (34% for dietitian services).

Further breakdown of psychological and dietetic session early cessation for those who were no longer in treatment by treatment modality, treatment setting and number of sessions received are shown in Appendix 4.7. Appendix Tables 4.7.1 and 4.7.2 show that face-to-face (37% for psychological treatment and 26% for dietetic sessions) and individual (36% for psychological treatment and 26% for dietetic sessions) treatments had the lowest rates of early cessation. Furthermore, Appendix Table 4.7.3 and Appendix Table 4.7.4 show that 3% or less of individuals who had fewer than 10 psychological sessions or fewer than five dietetic sessions ceased their treatment early. Approximately one quarter (27% for psychological treatment and 22% for dietetic sessions) ceased their treatment early if they had half the total number of available sessions (between 20 – 29 for psychological services and between 10 – 14 for dietetic services).

Table 4.14. Early cessation of care

		<i>n</i> (%)
Continued seeing psychological provider for as long as could have done (<i>n</i> = 978)	Yes	349 (36)
	No	517 (53)
	Unsure	112 (11)
Continued seeing dietitian for as long as could have done (<i>n</i> = 1,043)	Yes	266 (26)
	No	659 (63)
	Unsure	118 (11)

For individuals who ceased psychological and dietetic care early, reasons for this early cessation are provided in Tables 4.15 and 4.16. The most commonly reported reasons for early cessation of psychological treatment were the fee being too expensive (47%) and sessions not being helpful (36%). The least commonly reported reasons for early cessation of psychological treatment were language barriers (< 1%) and not liking session format (4%).

Table 4.15. Reasons for early cessation of psychological treatment

	<i>n</i> (%)
Fee too expensive	293 (47)
Sessions not helpful	228 (36)
Other	209 (33)
Felt better	171 (27)
Did not like provider	149 (24)
Other commitments	125 (20)
Did not want another review	72 (11)
Other costs incurred	66 (10)
Provider moved	46 (7)
Choose a different eating disorder service	39 (6)
Did not like format of session	22 (4)
Unsure	10 (2)
Language barrier	1 (< 1)

Note. *n* = 629. Multiple responses were permitted, therefore columns do not add to 100%. Sample includes only respondents who did not continue to see the psychological provider for the full number of available sessions.

Table 4.16 identifies the most commonly reported reasons for early cessation of dietetic sessions were the sessions not being helpful (45%) and the fee being too expensive (33%). The least commonly reported reasons for early cessation of dietetic sessions were language barriers (< 1%) and not liking session format (3%).

Further details of reasons for early cessation of psychological and dietetic sessions by diagnosis are found in Appendix 4.2, Appendix Table 4.2.12 and Appendix Table 4.2.13. Appendix Table 4.2.12 shows that for most diagnoses the most commonly reported reason for early cessation of psychological treatment was ‘fee was too expensive.’ The exceptions were anorexia nervosa, where the highest percentage of individuals stopped treatment due to ‘sessions not being helpful’ (45%) and atypical anorexia nervosa and ARFID where the most cited reason for ceasing treatment was ‘I felt better’ (40% for atypical anorexia nervosa and 38% for ARFID). Appendix Table 4.2.13 shows that the most commonly reported reason for early cessation of dietetic sessions was ‘sessions were not helpful’. The exceptions were bulimia nervosa (52%), binge eating disorder (46%) and diagnosis of unsure (39%), where ‘fee was too expensive’ was most commonly reported as the reason for early cessation of sessions under the EDP.

Table 4.16. Reasons for early cessation of dietetic health sessions

	<i>n</i> (%)
Sessions not helpful	347 (45)
Fee too expensive	258 (33)
Other	204 (26)
Felt better	177 (23)
Did not like provider	167 (22)
Other commitments	129 (17)
Did not want another review	72 (9)
Other costs incurred	68 (9)
Provider moved	39 (5)
Choose a different eating disorder service	35 (5)
Did not like format of session	21 (3)
Language barrier	0 (0)

Note. *n* = 776. Multiple responses were permitted, therefore columns do not add to 100%. Sample includes only respondents who did not continue to see the psychological provider for the full number of available sessions.

A pattern between the number of psychological sessions received and early cessation and the reason for the early cessation was observed. Table 4.17 shows different reasons for cessation of treatment were endorsed among people who had received a lower or higher number of psychological sessions. Among people who had received fewer than 10 sessions, the most common reason for early cessation was not liking the psychological provider’s approach or manner (43% of individuals), whereas among people who had received 10 – 19 sessions, the most common reason for early cessation was not wanting a review with the GP or specialist to renew the EDP (40% of individuals). The most common reason given for ceasing psychological treatment between 20 and 29 sessions was related to the psychological provider moving out of the area (28% of individuals). The most common reason for ceasing psychological treatment between 30 and 39 sessions was related to not liking the session format (14% of individuals).

The number of dietetic sessions received was linked with early cessations and the reason for early cessation. Table 4.18 shows that a greater number of reasons for ceasing treatment were endorsed for those who had fewer dietetic sessions compared to those who had received a higher number of sessions (participants could choose multiple reasons). The most common reason for early cessation at less than five sessions, was due to not liking the manner of the dietitian (51% of individuals). The most common reason for early cessation at five to nine sessions was due to other associated costs and the health professional moving out of the area (31% of individuals for each reason). The most common reason for early cessation of dietetic sessions between both 10 and 14 and 15 and 19 sessions were related to not liking the session format (24% and 19% of individuals respectively).

Results regarding payment and perceptions of payment are presented in Table 4.19. Of the possible payment options, most participants (83% for psychological treatment and 77% for dietetic sessions) had some of the costs of their treatment paid by Medicare, with the individual paying the remainder. Over half (55%) of the individuals identified that the fee paid for psychological treatment was too expensive and almost half (41%) of individuals stated that the fee paid for the dietetic sessions was too expensive.

Table 4.17. Number of mental health psychological sessions by early cessation of care and reasons for early cessation

		Number of Sessions						
		< 10	10 – 19	20 – 29	30 – 39	> 40	Unsure	Total
Still receiving sessions of care, <i>n</i> (%)	Yes	113 (38)	263 (55)	215 (60)	151 (62)	444 (68)	95 (42)	1,281 (57)
	No	172 (83)	200 (42)	126 (35)	85 (35)	188 (29)	108 (48)	879 (39)
	Unsure	13 (6)	17 (4)	17 (5)	6 (2)	25 (4)	21 (9)	99 (4)
	Total	298	480	359	242	657	224	2,259
Continued seeing mental health professional for as long as could have done, <i>n</i> (%)	Yes	5 (2)	24 (11)	39 (27)	52 (57)	185 (87)	44 (34)	349 (36)
	No	176 (95)	175 (81)	82 (57)	23 (25)	19 (9)	42 (33)	517 (53)
	Unsure	4 (2)	18 (8)	22 (15)	16 (18)	9 (4)	43 (33)	112 (11)
	Total	185	217	143	91	213	129	978
Reasons for early cessation of care, <i>n</i> (%)	I felt better	16 (9)	59 (35)	38 (22)	18 (11)	11 (6)	29 (17)	171
	The fee I had to pay out of my own pocket was too expensive	103 (35)	98 (33)	30 (10)	16 (5)	9 (3)	37 (13)	293
	I did not want to have another review by the GP/specialist for additional sessions	15 (21)	29 (40)	9 (13)	8 (11)	4 (6)	7 (10)	72
	The other costs were too high	24 (36)	19 (29)	12 (18)	3 (5)	1 (2)	7 (11)	66
	I did not find the sessions helpful	87 (38)	62 (27)	32 (14)	13 (6)	9 (5)	25 (11)	228
	I did not like the health professional’s manner or approach	64 (43)	33 (22)	20 (13)	3 (2)	8 (5)	21 (14)	149
	I had difficulty fitting the sessions in around my other commitments	43 (34)	31 (25)	23 (18)	8 (6)	3 (2)	17 (14)	125
	The health professional moved out of my area	5 (11)	11 (24)	13 (28)	3 (7)	3 (7)	11 (24)	46
	I chose to access a different eating disorder health service	14 (36)	10 (26)	8 (21)	2 (5)	2 (5)	3 (8)	39
	I did not like the session format	7 (32)	5 (23)	3 (14)	3 (14)	1 (5)	3 (14)	22
	Language was a barrier for me	0 (0)	0 (0)	1 (100)	0 (0)	0 (0)	0 (0)	1
	Other	58 (28)	67 (32)	40 (19)	9 (4)	10 (5)	25 (12)	209
	Unsure	3	1 (10)	1 (10)	1 (10)	0 (0)	4 (40)	10

Note. * Rows may not add to 100% due to rounding. GP = general practitioner.



Table 4.18. Number of dietitian sessions by early cessation of care and reasons for early cessation

			Number of Sessions						
			< 5	5-9	10-14	15-19	20+	Unsure	Total
Still receiving sessions of care, <i>n</i> (%)	Yes		61 (18)	109 (32)	122 (41)	94 (45)	236 (60)	48 (39)	670 (39)
	No		266 (77)	219 (64)	159 (53)	108 (51)	135 (34)	64 (52)	951 (56)
	Unsure		17 (5)	16 (5)	19 (6)	8 (4)	21 (5)	10 (8)	92 (5)
	Total		344	344	300	210	392	122	1,713
Continued seeing mental health professional for as long as could have done, <i>n</i> (%)	Yes		4 (1)	22 (9)	40 (22)	53 (20)	126 (47)	21 (8)	266 (26)
	No		274 (97)	192 (82)	110 (62)	46 (7)	16 (3)	21 (3)	659 (63)
	Unsure		5 (2)	21 (9)	28 (16)	17 (15)	14 (12)	32 (27)	117 (11)
	Total		283	235	178	116	156	74	1042
Reasons for early cessation of care, <i>n</i> (%)	I felt better		31 (18)	48 (27)	47 (27)	26 (15)	7 (4)	18 (10)	177
	The fee I had to pay out of my own pocket was too expensive		98 (38)	77 (30)	43 (17)	22 (9)	6 (2)	12 (5)	258
	The other costs associated with seeing the health professional were too high		25 (37)	21 (31)	9 (13)	6 (9)	3 (4)	4 (6)	68
	I did not find the sessions helpful		160 (46)	99 (29)	49 (14)	14 (4)	9 (3)	16 (5)	347
	I did not like the health professional's manner or approach		86 (51)	40 (24)	24 (14)	7 (4)	3 (2)	7 (4)	167
	I had difficulty fitting the sessions in around my other commitments		46 (36)	35 (27)	23 (18)	11 (9)	8 (6)	6 (5)	129
	The health professional moved out of my area		9 (23)	12 (31)	6 (15)	3 (8)	3 (8)	6 (15)	39
	I chose to access a different eating disorder health service		10 (29)	8 (23)	6 (17)	5 (14)	2 (6)	4 (11)	35
	I did not like the session format		8 (38)	3 (14)	5 (24)	4 (19)	0 (0)	1 (5)	21
	Language was a barrier for me		0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)	0
	Other		65 (32)	49 (24)	37 (18)	20 (10)	9 (4)	24 (12)	204

Note. * Rows may not add to 100% due to rounding.

Table 4.19. Payment and perceptions of EDP psychological and dietetic services

		<i>n</i> (%)
Payment source – psychological sessions (<i>n</i> = 2,260)	Medicare covered all of the costs	156 (7)
	Medicare covered some of the costs, and I paid less than half of the costs out of my own pocket	885 (39)
	Medicare covered some of the costs, but I paid more than half of the costs out of my own pocket	984 (44)
	Some other payment arrangement	129 (6)
	Unsure	106 (5)
Perceptions of affordability – psychological sessions (<i>n</i> = 2,260)	I didn't pay anything; Medicare covered all of the cost	166 (8)
	I paid a fee that was affordable	668 (30)
	I paid a fee that was too expensive	1243 (55)
	Unsure	183 (9)
Payment source – dietetic sessions (<i>n</i> = 1,712)	Medicare covered all of the costs	213 (12)
	Medicare covered some of the costs, and I paid less than half of the costs out of my own pocket	663 (39)
	Medicare covered some of the costs, but I paid more than half of the costs out of my own pocket	659 (38)
	Some other payment arrangement	64 (4)
	Unsure	113 (7)
Perceptions of affordability – dietetic sessions (<i>n</i> = 1,712)	I didn't pay anything; Medicare covered all of the cost	212 (13)
	I paid a fee that was affordable	635 (38)
	I paid a fee that was too expensive	696 (41)
	Unsure	169 (10)

Further breakdown of costs by diagnosis are reported in Appendix Tables 4.2.14, 4.2.15, 4.2.16 and 4.2.17 and show that the majority of individuals (> 74% for psychological treatment and > 67% for dietetic treatment) for all diagnosis groups had their treatment paid at least partially by Medicare. Individuals who believed the fee they paid for psychological treatment was too expensive ranged from 43% for OSFED to 62% for no diagnosis. For dietetic sessions, individuals who believed the fee they paid was too expensive ranged from 22% for ARFID to 48% for no diagnosis.

Further breakdown of payment and perceptions with respect to treatment modality, services received, and number of services received may be found in Appendix 4.8. These results show that more than half of individuals who had telehealth services (58%) and individual sessions (56%) agreed that they paid a fee that was too expensive for their psychological treatment (Appendix Table 4.8.4), whilst 65% of those who had fewer than 10 sessions and 55% of those who had 40 or more sessions thought the psychological treatment fee was too expensive (Appendix Table 4.8.6). With respect to dietetic services, individuals who had telehealth services (45%) and individual sessions (42%) agreed that they paid a fee that was too expensive (Appendix Table 4.8.10). Furthermore, 46% of those who had fewer than five dietetic sessions and 41% of those who had 20 or more dietetic sessions thought the fee was too expensive (Appendix Table 4.8.12).

Perception of treatment costs was examined in relation to socioeconomic status (SES). As shown in Table 4.20, the most disadvantaged group were most likely to not pay anything for their

psychological (12%) and dietetic (27%) sessions. The second least disadvantaged group were the most likely (58%) to state that they paid a fee that was too expensive for their psychological treatment. The least disadvantaged group were the most likely (45%) to state that they paid a fee that was too expensive for their dietetic sessions.

Table 4.20. Perceptions of cost and socioeconomic status

	0 – 20% (n = 156)	21 – 40% (n = 266)	41 – 60% (n = 354)	61 – 80% (n = 540)	81 – 100% (n = 915)
I didn't pay anything for the psychological treatment	18 (12)	27 (11)	22 (7)	49 (10)	48 (6)
I paid a fee that was affordable for the psychological treatment	43 (28)	83 (32)	106 (30)	137 (26)	293 (33)
I paid a fee that was too expensive for the psychological treatment	87 (56)	140 (53)	200 (57)	308 (58)	494 (54)
Unsure of the costs associated with the psychological treatment	8 (6)	16 (7)	26 (8)	46 (9)	80 (9)
I didn't pay anything for the dietetic treatment	35 (27)	38 (19)	45 (17)	36 (9)	56 (9)
I paid a fee that was affordable for the dietetic treatment	46 (35)	77 (38)	112 (40)	142 (36)	253 (38)
I paid a fee that was too expensive for the dietetic treatment	40 (31)	71 (35)	103 (37)	176 (44)	299 (45)
Unsure of the costs associated with the dietetic treatment	11 (9)	19 (10)	20 (8)	50 (13)	67 (10)

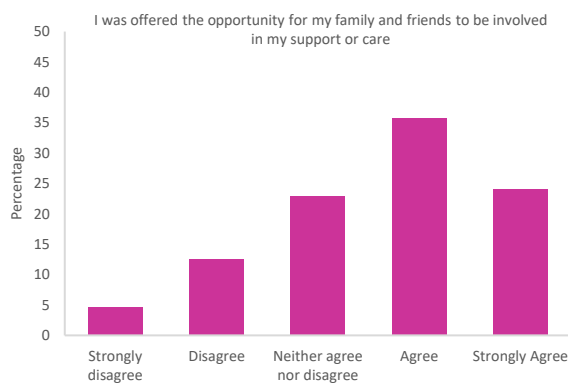
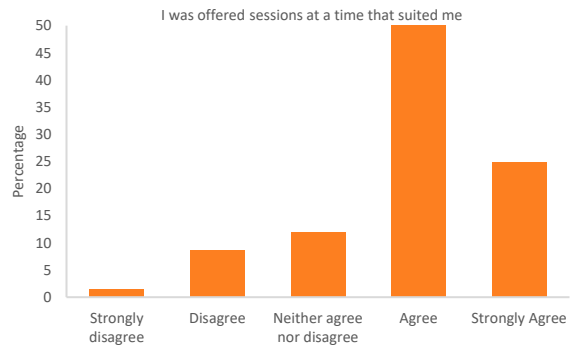
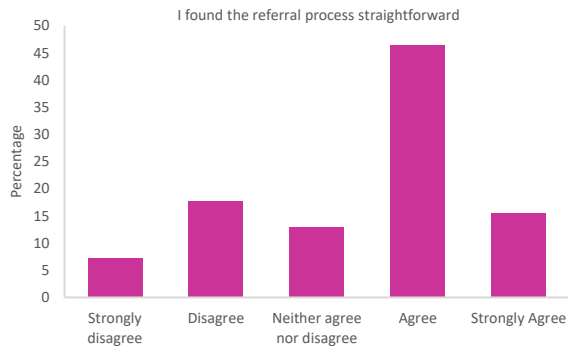
Note. n (%), 0 – 20% = most disadvantaged, 81 – 100% = least disadvantaged.

Experience of seeing the service provider

Participants were asked about their experience of seeing the psychological health professional and the dietitian. They were asked to assess level of (dis)agreement with 11 statements relating to the psychological (see Figure 4.1) or dietetic (see Figure 4.2) session provider. Given item wording, figures in pink show level of agreement with positive experiences and figures in orange show levels of agreement with negative experiences.

The majority of participants indicated that they had positive treatment experiences for both psychological and dietetic services. With respect to psychological services, 62% of participants found the referral process straightforward and 78% were offered sessions at a time that suited them. Over 80% of the participants identified that their psychological treatment provider was empathic (87%), listened to them (88%), respected their right to make decisions (83%), and that they had a good relationship with the psychological provider (83%). Only 16% of individuals felt they had to travel too far to see their psychological treatment provider.

However, more than one-third (37%) of participants identified that they had to wait too long for an appointment with the psychological provider, whilst one-quarter of participants did not find the referral process to be straightforward.



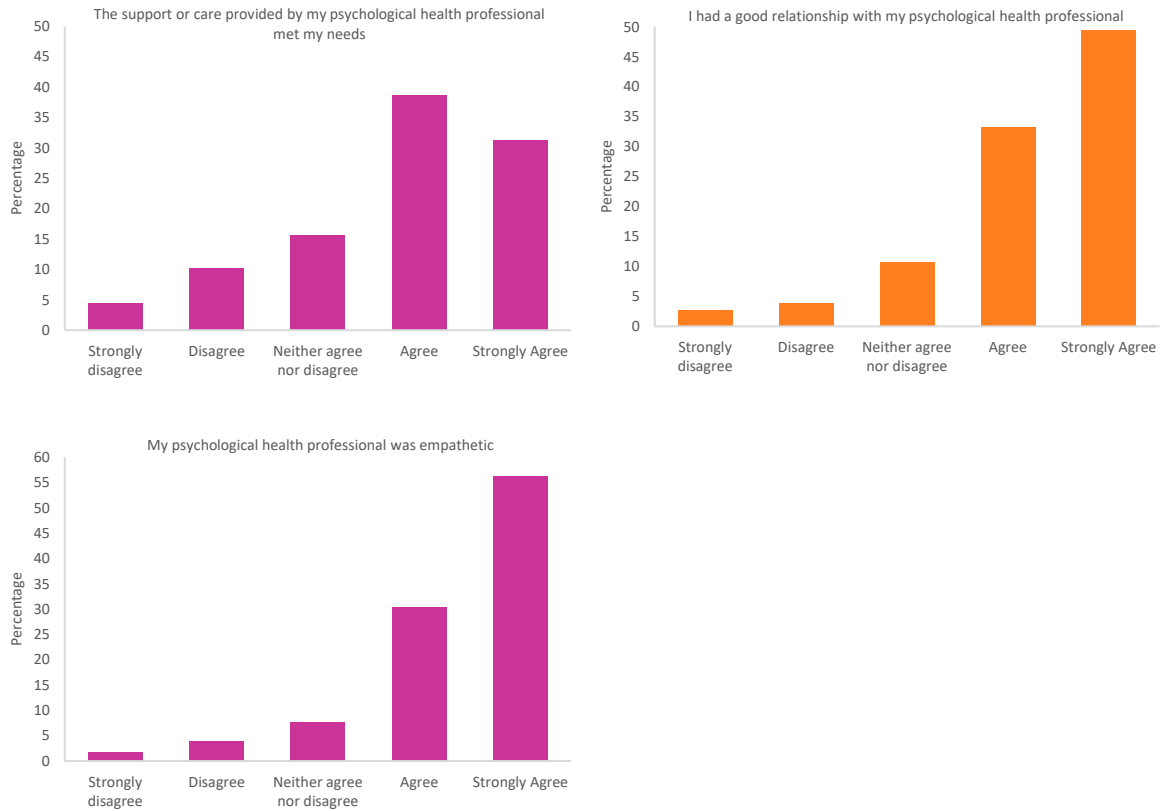
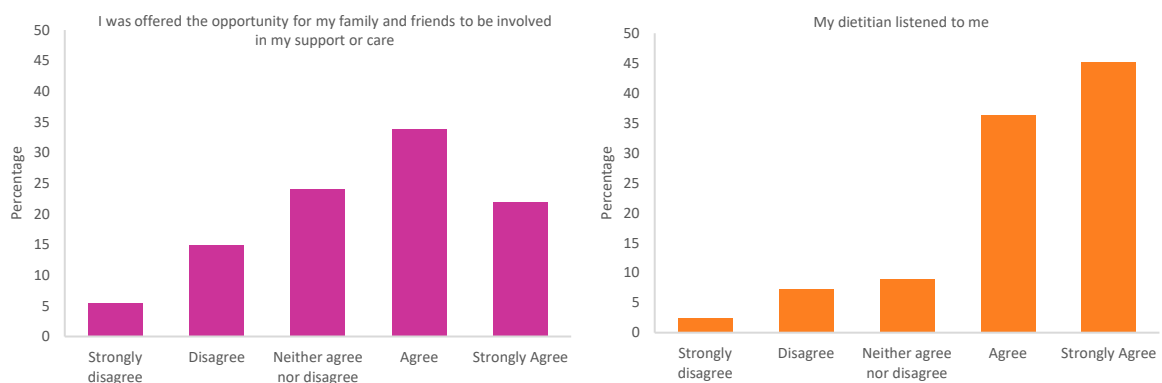
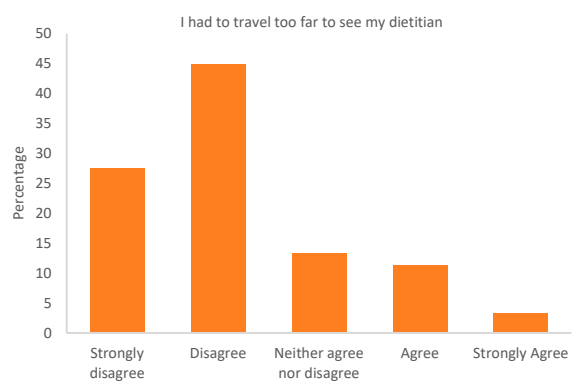
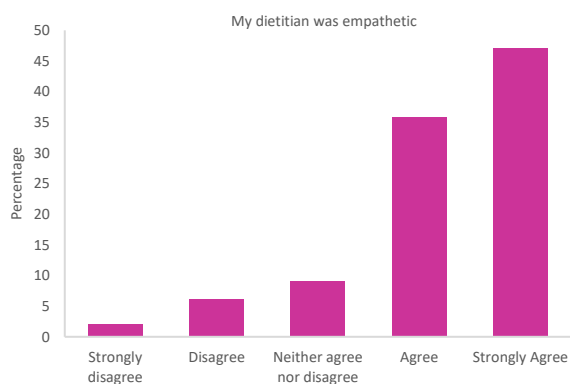
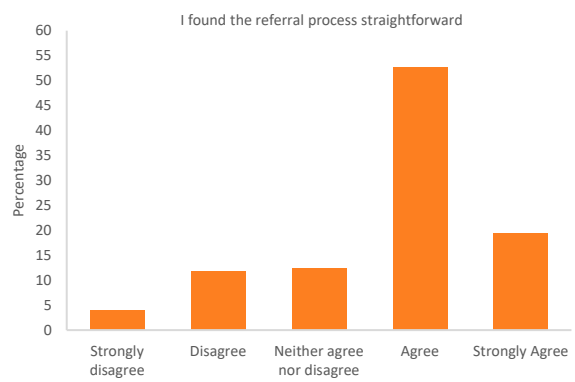
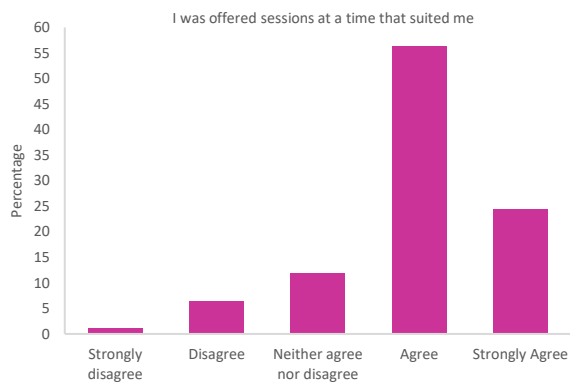
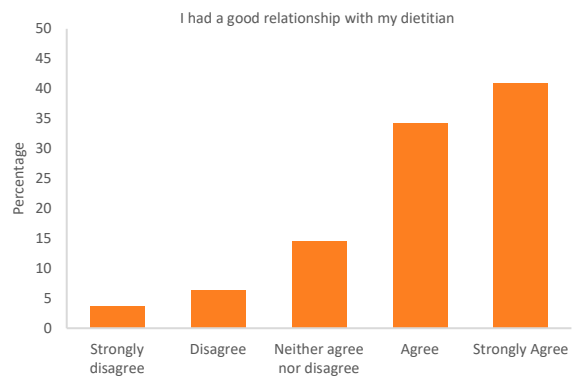
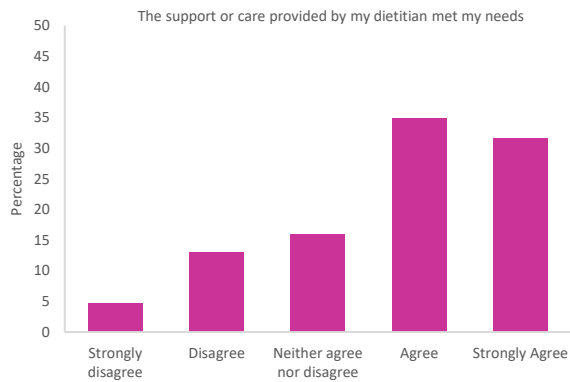
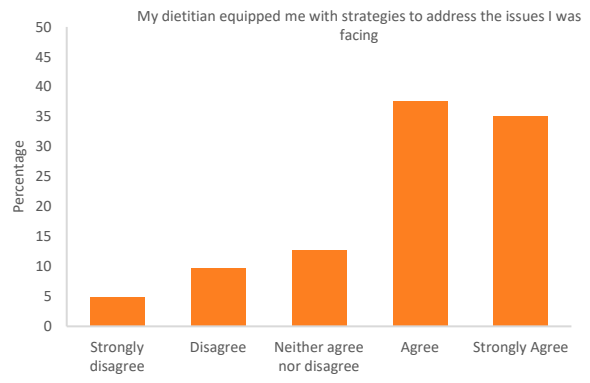
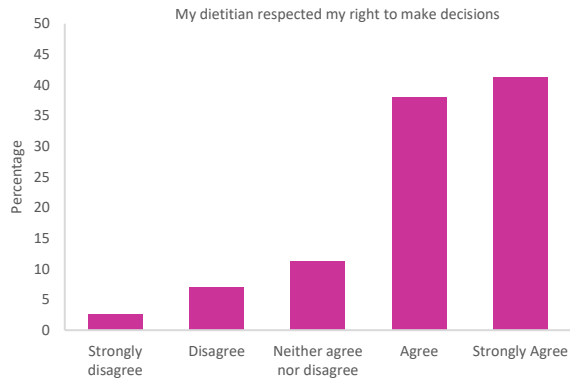


Figure 4.1. Participants' experiences with psychological treatment sessions

With respect to dietetic services (Figure 4.2), 72% of participants found the referral process straightforward and 79% agreed that the dietitian respected the individual's right to make decisions pertaining to their own care. Over 80% of the participants identified that their dietetic service provider was empathetic (83%), listened to them (82%) and offered suitable times for sessions (81%). Seventy-nine percent of individuals thought their dietitian respected their right to make decisions, 75% had a good relationship with their dietitian and 66% identified that the support or care from the dietitian met their needs. Only 14% of individuals felt they had to travel too far to see their dietetic service provider.





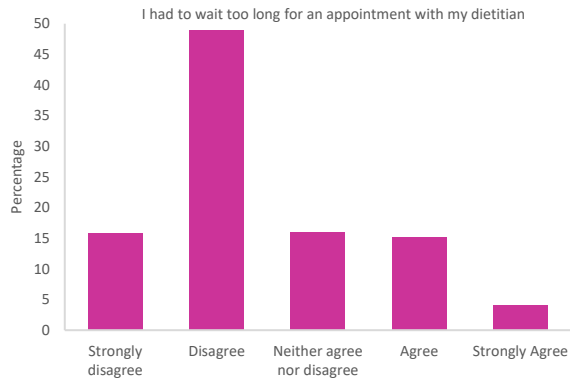


Figure 4.2. Participants’ experiences with dietetic health services

Overall satisfaction with treatment services

Overall satisfaction with psychological and dietetic care is shown in Figure 4.3; 71% of people were either satisfied or very satisfied with their psychological care and 68% of people were either satisfied or very satisfied with their dietetic care. Overall satisfaction with care was significantly and positively associated with the psychological ($r = .33, p < .001$) and number of dietetic ($r = .40, p < .001$) services received. Improvement in self-reported eating disorder symptoms from baseline to post-treatment was also positively related with satisfaction with both psychological services ($r = .42, p < .001$) dietetic services ($r = .50, p < .001$).

Further breakdown of overall satisfaction of psychological and dietetic services by diagnosis is found in Appendix 4.2. Appendix Figures 4.2.3 and 4.2.4 show that for most diagnosis types, between 70% and 80% of individuals were satisfied or very satisfied with their overall psychological treatment. The exceptions to this were individuals with multiple eating disorders diagnosed, where satisfaction fell a little under 70% (67%). Second, Appendix Figure 4.2.4 shows that for most diagnosis types, between 65% and 75% were satisfied or very satisfied with their dietetic care. The exception to this was for the group with multiple diagnoses, where the satisfaction rating was just under this range (64% satisfaction).

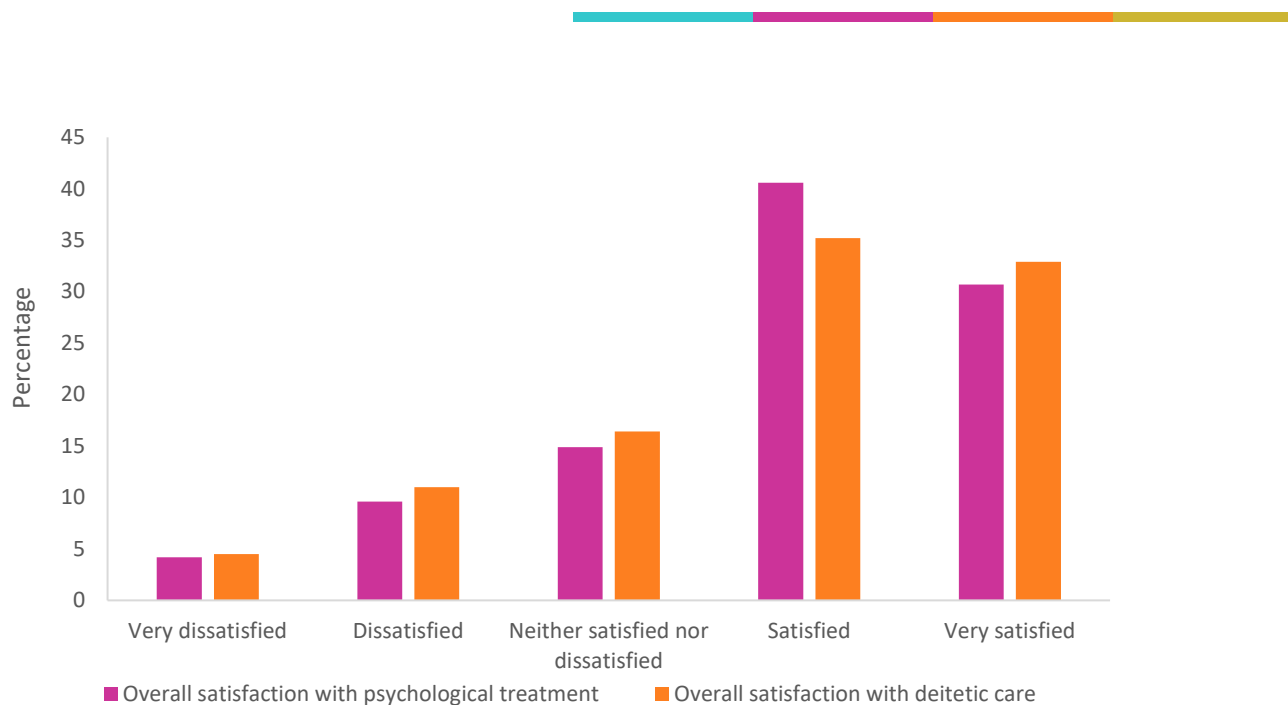


Figure 4.3. Overall satisfaction with psychological treatment and dietetic care

Eating disorder symptoms before and after treatment

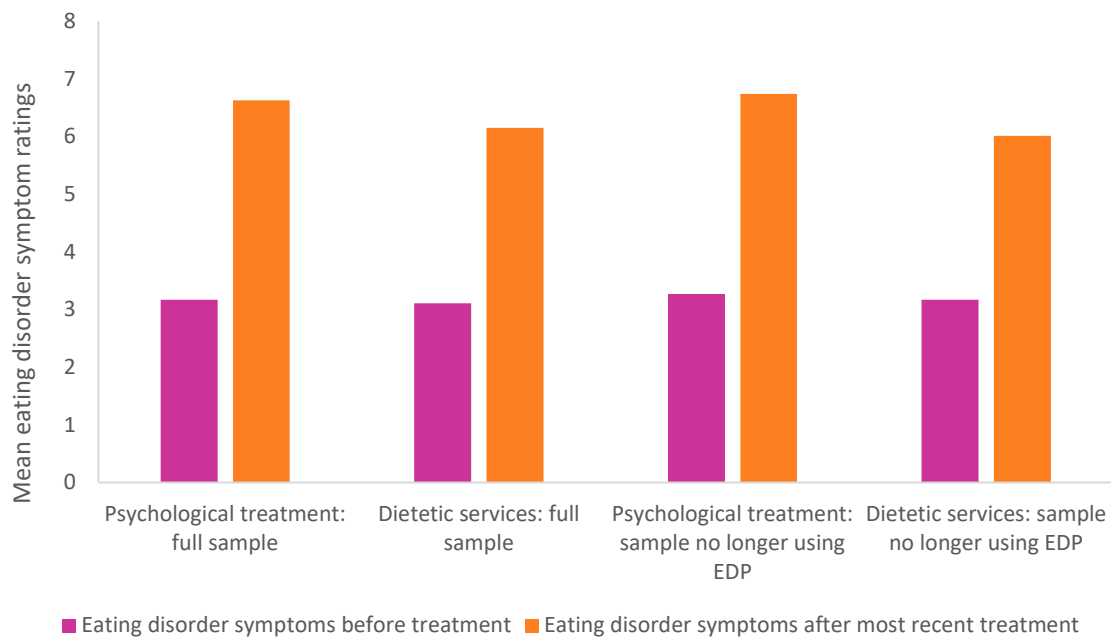
Self-rated eating disorder symptoms before and after receipt of treatment were reported for the full sample and for those who were no longer using Eating Disorders MBS services as part of their EDP, with outcomes for the latter sample reflecting post-treatment symptom levels. Figure 4.4 shows the mean level of self-rated eating disorder symptoms before the first session of psychological treatment and dietetic sessions, and after the most recent session with the psychological treatment provider and the dietitian for the full sample and for those no longer receiving services.

With a possible range of 1 (worst possible eating disorder symptoms) to 10 (best possible eating disorder symptoms), the symptom levels were reported to be lower (worse) before starting sessions and higher (better) after the most recent psychological or dietetic session. The mean self-reported eating disorder symptoms for the full sample before psychological treatment was 3.17 (95% CI 3.10, 3.24). After the most recent psychological session, the mean symptom level was 6.63 (95% CI 6.54, 6.71). The mean self-reported eating disorder symptom before dietetic sessions was 3.11 (95% CI 3.02, 3.21) and after the most recent dietetic session was 6.15 (95% CI 6.04, 6.26). The mean self-report symptom levels prior to starting treatment and at post treatment were similar for those who were no longer accessing Eating Disorders MBS services via their EDP as shown in Figure 4.4.

For the full sample, self-reported eating disorder symptoms related to both psychological treatment and dietetic intervention were significantly worse prior to receiving services under the Eating Disorders MBS services than after the most recent session ($t(2,224) = -58.64, p < .001$; $t(1,673) = -47.61, p < .001$, respectively). Differences in self-report symptoms between the two time points were large for psychological treatment ($d = -1.24$) and for dietetic sessions ($d = -1.16$).

A similar pattern was also observed when comparing eating disorder symptoms prior to and after treatment for the subsample no longer in treatment. Eating disorder symptoms were significantly worse before starting treatment than at the end of treatment for those who received psychological,

$t(864) = -37.67, p < .001$, or dietetic sessions, $t(720) = -28.40, p < .001$. Effect sizes were also large, $d = -1.28$ and $d = -1.06$, respectively.



Note. Eating disorder symptom ratings ranged from 1 (worst possible symptoms) to 10 (best possible symptoms). EDP = Eating Disorder Plan.

Figure 4.4. Self-rated eating disorder symptoms before receipt of any psychological or dietetic sessions and after receipt of the most recent psychological or dietetic session

The mean change in eating disorder symptoms prior to and after most recent session with the healthcare provider was determined for different eating disorder types and is provided in Appendix Figure 4.2.1 and Appendix Figure 4.2.2. The results show that for all eating disorder diagnoses, the mean symptom score improved after the most recent sessions of care relative to symptom levels before treatment. For both dietetic sessions and psychological treatment for single diagnoses, the largest mean improvement score was for anorexia nervosa, whilst for individuals with multiple diagnoses, the largest mean improvement score was for anorexia nervosa + OSFED or anorexia nervosa + atypical anorexia nervosa.

We explored the relationship between eating disorder symptom improvement and satisfaction with the number of treatment sessions received (dietetic and psychological services reported separately) for the sample who were no longer receiving treatment. Mean level of improvement was significantly higher ($p < .05$) for individuals who reported the number of psychological sessions received was just right ($M = 4.35, SD = 2.49$) relative to those who reported receiving too many ($M = 2.86, SD = 2.87$) or too few ($M = 2.71, SD = 2.70$) sessions. Average level of eating disorder symptom improvement did not differ between individuals who felt they received too few or too many psychological services.

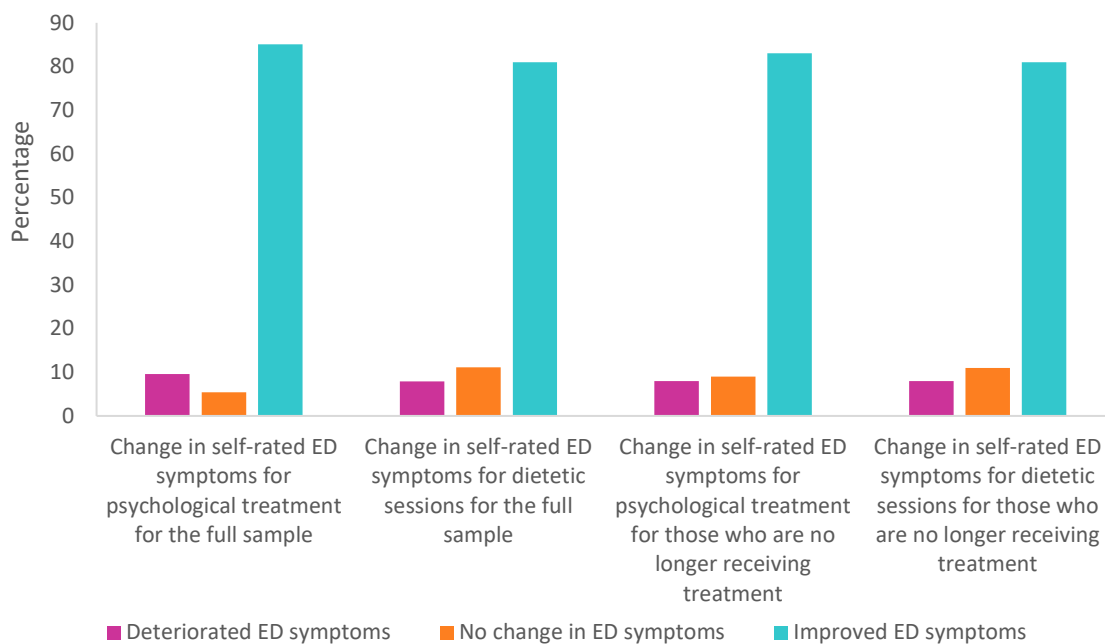
A similar pattern was found for dietetic services among individuals no longer receiving treatment. Mean level of improvement was significantly higher ($p < .05$) for individuals who reported the number of dietetic sessions received was just right ($M = 4.09, SD = 2.41$) relative to those who reported receiving too many ($M = 2.10, SD = 2.91$) or too few ($M = 2.58, SD = 2.73$) sessions. Average



level of eating disorder symptom improvement did not differ between individuals who felt they received too few or too many dietetic services.

We also explored the relationship between eating disorder symptom improvement and satisfaction with the number of treatment sessions received for the full sample, noting that a moderate portion of this full sample were still receiving ongoing sessions (see Table 4.5). Mean level of improvement was significantly higher ($p < .05$) for individuals who reported the number of psychological sessions received was just right ($M = 3.80, SD = 2.75$) relative to those who reported receiving too many ($M = 2.86, SD = 3.26$) or too few ($M = 2.93, SD = 2.53$) sessions. Average level of eating disorder symptom improvement did not differ between individuals who felt they received too few or too many psychological services. The pattern of findings for the full sample for dietetic services was similar. Mean level of improvement was significantly higher ($p < .05$) for individuals who reported the number of dietetic sessions received was just right ($M = 3.89, SD = 2.51$) relative to those who reported receiving too many ($M = 2.08, SD = 2.81$) or too few ($M = 2.77, SD = 2.63$) sessions. Average level of eating disorder symptom improvement was also significantly higher for individuals who felt they received too few rather than too many dietetic services ($p < .05$).

On the basis of self-rated eating disorder scores, participants were categorised into symptom change outcome groups (improved, deteriorated, or no change). As shown in Figure 4.5, 85% (full sample) and 83% (those no longer in treatment) of the participants had improved eating disorder symptoms after psychological treatment and 81% of individuals had improved eating disorder symptoms after dietetic sessions for both the full sample and those who were no longer in treatment.



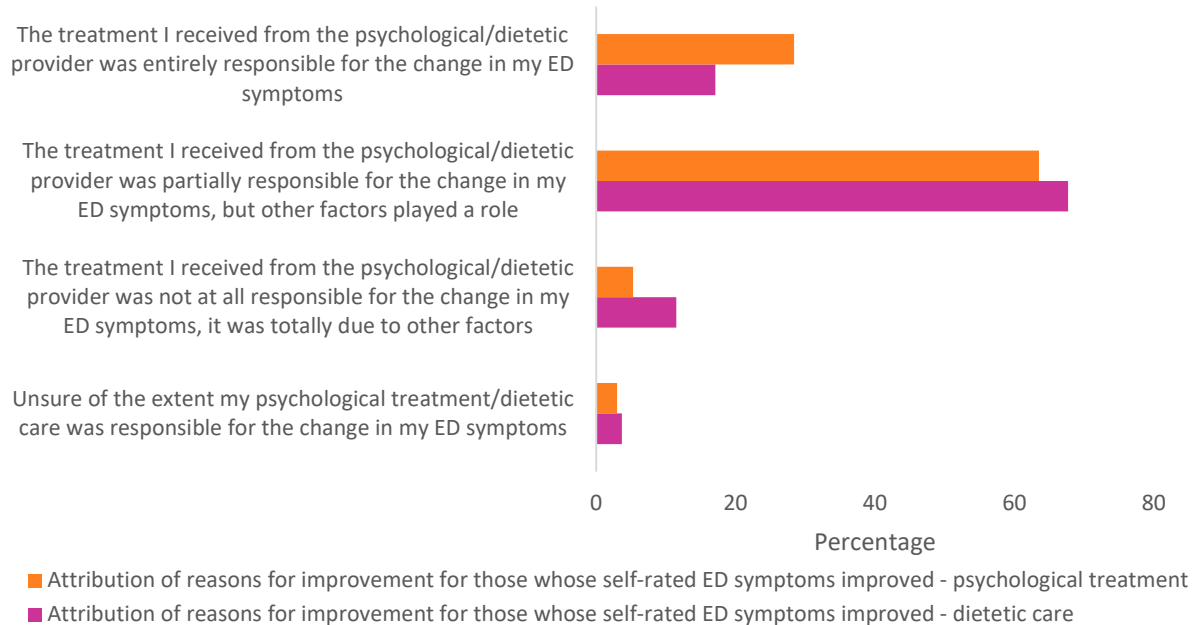
Note. ED = eating disorder.

Figure 4.5. Change in self-rated eating disorder symptoms for the full sample

Figure 4.6 shows that 92% of individuals whose eating disorder symptoms improved attributed this improvement to the treatment that they received from the psychological health care provider. More than one quarter (28%) of individuals stated that the psychological health provider was entirely responsible and 64% said that the psychological provider was partially responsible for the improved



symptoms. Figure 4.6 shows that 85% of individuals whose eating disorder symptoms improved attributed this improvement to the treatment that they received from the dietitian. Seventeen percent of individuals stated that the dietitian was entirely responsible, 68% said that the dietitian was partially responsible and 11% said the dietitian was not at all responsible for their improved symptoms.




Note. ED = eating disorder.

Figure 4.6. Attribution of reason for improvement for those whose self-rated eating disorder symptoms improved for psychological provider

Predictors of improvement

We also explored whether there were any predictors of improvement. Table 4.21 provides the results of the logistic regression, which aimed to determine predictors of improvement in self-rated eating disorder symptoms with respect to psychological care (comparing improved to deteriorated symptoms; data from individuals who reported no change were not included in the regression analyses). When explored individually, variables that were statistically significant predictors were age, self-rated eating disorder symptoms at treatment start, provider type, number of sessions had with psychological provider, telehealth sessions with mental health provider and overall satisfaction with the psychological provider.

Being between the ages of 40 and 44 years old was associated with reduced odds of having improved eating disorder symptoms (by one-third) compared to those less than 18 years old (OR 0.33, 95% CI 0.11, 0.99). This effect became non-significant in the adjusted model. The second significant univariate predictor was self-rated eating disorder symptoms before psychological care was received. Individuals who had better self-rated eating disorder symptoms (above five out of a maximum score of ten) when they began their treatment, had significantly lower odds of showing improvement (OR 0.06, 95% CI 0.04, 0.11). Pre-treatment levels of eating disorder symptoms remained significant in the multivariable model (OR 0.06, 95% CI 0.03, 0.11).



The third variable that was significant in the univariate model was provider type. Seeing both a psychological provider and a dietitian was associated with symptom improvement (OR 1.59, 95% CI 1.03, 2.44) compared to seeing only a dietitian or only a psychological treatment provider, however this variable was no longer significant in the multivariable model. The fourth variable that was significantly associated with improvement was the number of sessions received. Compared with those who had fewer than 10 psychological sessions, those who had more psychological sessions had greater odds of improving. Compared with receiving fewer than 10 sessions, greater odds of improvement were associated with having between 10 and 19 psychological sessions (OR 2.48, 95% CI 1.33, 4.61) and greater than 40 sessions (OR 3.57, 95% CI 1.82, 7.02). In the multivariable model, having between 10 and 19 psychological sessions (OR 3.30, 95% CI 1.59, 6.83) and having greater than 40 psychological sessions (OR 2.64, 95% CI 1.24, 5.60) remained significant with respect to improved eating disorder symptoms compared to less than 10 psychological sessions.

The fifth predictor of improvement in eating disorder symptoms for psychological treatment was telehealth sessions. Compared to those who did not have telehealth sessions, individuals who had telehealth sessions had 1.64 greater odds of having improved eating disorder symptoms (OR 1.64, 95% CI 1.07, 2.52); however, this variable was no longer significant in the multivariable model (OR 1.62, 95% CI 0.99, 2.67).

Gender, sexual identity, First Nations status, SES and country of birth were not significantly associated with improvement in self-rated eating disorder symptom level individually, and were thus not included in the multivariable model.



Table 4.21. Predictors of improvement in self-rated eating disorder symptoms for those no longer in psychological treatment*

Variable		Univariate regression Odds ratio, (95% CI)	Multivariable model Odds ratio, (95% CI)
Age	< 18 years ^a	-	-
	18 – 20	0.58 (0.24, 1.41)	0.65 (0.25, 1.67)
	21 – 24	0.74 (0.30, 1.85)	0.79 (0.30, 2.12)
	25 – 29	0.47 (0.19, 1.16)	0.56 (0.21, 1.51)
	30 – 34	1.39 (0.39, 4.93)	1.72 (0.43, 6.85)
	35 – 39	0.42 (0.15, 1.13)	0.78 (0.25, 2.40)
	40 – 44	0.33** (0.11, 0.99)	0.70 (0.19, 2.59)
	45 – 50	0.29 (0.07, 1.09)	0.27 (0.06, 1.21)
	50 – 54	0.53 (0.13, 2.23)	0.85 (0.16, 4.40)
	55 – 59	0.38 (0.07, 2.08)	0.40 (0.06, 2.45)
	60 – 64	0.76 (0.08, 6.83)	0.71 (0.07, 6.76)
	65 – 69	Dropped (few observations/no variation)	Dropped (few observations/no variation)
	70 – 74	Dropped (few observations/no variation)	Dropped (few observations/no variation)
	74 – 79	Dropped (few observations/no variation)	Dropped (few observations/no variation)
> 80	Dropped (few observations/no variation)	Dropped (few observations/no variation)	
Gender	Female ^a	-	-
	Male	4.18 (0.56, 30.95)	-
	Non-binary	1.42 (0.33, 6.13)	-
	Prefer not to say	Dropped (few observations/no variation)	-
Sexual identity	Not heterosexual ^a	-	-
	Heterosexual	1.04 (0.65, 1.66)	-
Country of birth	Australia ^a	-	-
	Overseas	0.85 (0.47, 1.56)	-
First Nations status	Not First Nations ^a	-	-
	First Nations	0.64 (0.14, 2.95)	-

Variable		Univariate regression Odds ratio, (95% CI)	Multivariable model Odds ratio, (95% CI)
SEIFA IRSD quintile [^]	Q1 (Most disadvantaged) ^{^a}	-	-
	Q2	1.42 (0.60, 3.38)	-
	Q3	1.32 (0.58, 2.98)	-
	Q4	1.65 (0.75, 3.64)	-
	Q5 (Least disadvantaged)	1.57 (0.76, 3.24)	-
Self-rated eating disorder symptoms (before care)	Worse symptoms ^{^a}	-	-
	Better symptoms	0.06** (0.04, 0.11)	0.06** (0.03, 0.11)
Provider type	Service from either mental health or dietitian ^{^a}	-	-
	Both mental health professional and dietitian	1.59** (1.03, 2.44)	1.15 (0.68, 1.92)
No. of sessions dietitian	< 5 ^{^a}	-	-
	5 – 9	0.79 (0.38, 1.64)	-
	10 – 14	1.40 (0.56, 3.55)	-
	15 – 19	1.00 (0.41, 2.45)	-
	> 20	1.25 (0.56, 2.79)	-
Face-to-face sessions dietitian	No ^{^a}	-	-
	Yes	1.76 (0.91, 3.39)	-
Telehealth sessions dietitian	No ^{^a}	-	-
	Yes	0.97 (0.57, 1.65)	-
Phone sessions dietitian	No ^{^a}	-	-
	Yes	1.25 (0.44, 3.61)	-
No. of sessions mental health provider	< 10 ^{^a}	-	-
	10 – 19	2.48** (1.33, 4.61)	3.30** (1.59, 6.83)
	20 – 29	1.73 (0.91, 3.27)	1.54 (0.74, 3.20)
	30 – 39	1.90 (0.89, 3.99)	1.66 (0.70, 3.92)
	> 40	3.57** (1.82, 7.02)	2.64** (1.24, 5.60)



Variable		Univariate regression Odds ratio, (95% CI)	Multivariable model Odds ratio, (95% CI)
Face-to-face sessions	No ^a	-	-
mental health provider	Yes	0.95 (0.49, 1.84)	-
Telehealth sessions	No ^a	-	-
mental health provider	Yes	1.64** (1.07, 2.52)	1.62 (0.99, 2.67)
Phone sessions mental	No ^a	-	-
health provider	Yes	1.05 (0.52, 2.09)	-

Note. * Missing data excluded. ^ Socioeconomic status was ascribed to participants on the basis of their postcode, using quintiles derived from the Index of Relative Socioeconomic Disadvantage (IRSD) of the of the Socioeconomic Indexes for Areas (SEIFA). More specifically, the SEIFA concordance file was used to assign the IRSD. The IRSD file reports deciles which were then converted into quintiles. **Significant at $p < .05$. ^a denotes referent group.




Table 4.22 provides the summary statistics for the logistic regression which aimed to determine predictors of improvement in self-rated eating disorder symptoms with respect to dietetic care. When modelled individually, variables that were statistically significant included age, self-rated eating disorder symptoms at session start, provider type, number of sessions had with dietitian, telehealth sessions with dietitian, and number of sessions had with a psychological provider.

The first significant variable in univariate and adjusted models was self-rated eating disorder symptoms before dietetic care was received. Individuals who had better self-rated eating disorder symptom score (above five out of ten) when they began their treatment, had significantly lower odds of showing improvement (unadjusted model: OR 0.04, 95% CI 0.02, 0.08 and adjusted model: OR 0.04, 95% CI 0.02, 0.07).

The second variable that was significant in the univariate model was provider type. Seeing both a psychological provider and a dietitian was associated with eating disorder symptom improvement (OR 2.96, 95% CI 1.68, 5.21) compared to seeing only a dietitian or only a psychological treatment provider. The third variable associated with significant improvement in self-rated eating disorder symptoms related to dietetic intervention was the number of dietetic sessions received. Compared with those who had fewer than five dietetic sessions, those who had more than five sessions had improved odds of eating disorder symptom improvement. The magnitude of the odds ratio of this effect increased monotonically as the number of dietetic sessions increased. For example, individuals who had 20 or more dietetic sessions were almost three times more likely to self-report improved eating disorder symptoms compared to those less than five dietetic sessions (OR 2.81, 95% CI 1.29, 6.10). The number of dietetic sessions received became non-significant in the multivariable model.

The number of psychological sessions received by the individual was significantly associated with improved self-rated eating disorder symptoms. Compared with those who had fewer than 10 psychological sessions, those who had more than 10 sessions had improved odds of eating disorder symptom improvement. For example, individuals who had 40 or more psychological sessions were two and a half times more likely to self-report improved eating disorder symptoms compared to those less than 10 psychological sessions (OR 2.43, 95% CI 1.12, 5.28). Psychological sessions between 10 and 19 (OR 3.64, 95% CI 1.11, 12.00) remained significant in the multivariable model.

The results for dietetic care found that age, gender, sexual identity, country of birth, First Nations status and socioeconomic status as measured by the SEIFA IRSD were not significantly associated with improvement in self-rated eating disorder symptoms as individual predictors, and were thus not included in the multivariable model.



Table 4.22. Predictors of improvement in self-rated eating disorder symptoms for those no longer in dietetic treatment*

Variable		Univariate regression Odds ratio, (95% CI)	Multivariable model Odds ratio, (95% CI)
Age	< 18 years ^a	-	-
	18 – 20	0.44 (0.18, 1.04)	-
	21 – 24	0.69 (0.28, 1.70)	-
	25 – 29	0.91 (0.34, 2.44)	-
	30 – 34	1.85 (0.46, 7.40)	-
	35 – 39	0.63 (0.20, 1.96)	-
	40 – 44	0.63 (0.17, 2.29)	-
	45 – 50	0.46 (0.11, 1.93)	-
	50 – 54	0.32 (0.09, 1.22)	-
	55 – 59	Dropped (few observations/no variation)	-
	60 – 64	0.58 (0.06, 5.29)	-
	65 – 69	0.29 (0.03, 2.94)	-
	70 – 74	Dropped (few observations/no variation)	-
	74 – 79	Dropped (few observations/no variation)	-
> 80	Dropped (few observations/no variation)	-	
Gender	Female ^a	-	-
	Male	1.52 (0.35, 6.50)	-
	Non-binary	1.36 (0.32, 5.83)	-
	Prefer not to say	0.54 (0.06, 4.97)	-
Sexual identity	Not heterosexual ^a	-	-
	Heterosexual	1.26 (0.75, 2.10)	-
Country of birth	Australia ^a	-	-
	Overseas	0.93 (0.48, 1.81)	-
First Nations status	Not First Nations ^a	-	-
	First Nations	1.17 (0.15, 9.18)	-

Variable		Univariate regression Odds ratio, (95% CI)	Multivariable model Odds ratio, (95% CI)
SEIFA IRSD quintile	Q1 (Most disadvantaged) ^a	-	-
	Q2	1.57 (0.60, 4.10)	-
	Q3	1.98 (0.78, 5.04)	-
	Q4	1.65 (0.70, 3.89)	-
	Q5 (Least disadvantaged)	1.53 (0.70, 3.37)	-
Self-rated eating disorder symptoms (before care)	Worse symptoms ^a	-	-
	Better symptoms	0.04** (0.02, 0.08)	0.04** (0.02, 0.07)
Provider type	Service from either mental health or dietitian ^a	-	-
	Service from both mental health professional and dietitian	2.96** (1.68, 5.21)	Omitted because of collinearity
No. of dietetic sessions	< 5 ^a	-	-
	5 – 9	1.33 (0.76, 2.34)	1.18 (0.55, 2.53)
	10 – 14	3.32** (1.53, 7.19)	1.96 (0.73, 5.22)
	15 – 19	4.10** (1.54, 10.86)	2.15 (0.69, 6.70)
	> 20	2.81** (1.29, 6.10)	1.46 (0.55, 3.86)
Face-to-face dietetic sessions	No ^a	-	-
	Yes	0.84 (0.43, 1.64)	-
Telehealth dietetic sessions	No ^a	-	-
	Yes	1.59 (0.97, 2.59)	-
Phone dietetic dietitian	No ^a	-	-
	Yes	1.37 (0.58, 3.25)	-
No. of sessions mental health provider	< 10 ^a	-	-
	10 – 19	2.84** (1.19, 6.77)	3.37** (1.20, 9.46)
	20 – 29	1.47 (0.64, 3.34)	1.23 (0.45, 3.35)
	30 – 39	1.42 (0.59, 3.43)	1.23 (0.42, 3.60)
	> 40	2.43** (1.12, 5.28)	1.98 (0.77, 5.08)



Variable		Univariate regression Odds ratio, (95% CI)	Multivariable model Odds ratio, (95% CI)
Face-to-face sessions mental health provider	No ^a	-	-
	Yes	1.05 (0.46, 2.39)	-
Telehealth sessions mental health provider	No ^a	-	-
	Yes	1.30 (0.78, 2.14)	-
Phone sessions mental health provider	No ^a	-	-
	Yes	1.17 (0.54, 2.51)	-

Note. * Missing data excluded. ^ Socioeconomic status was ascribed to participants on the basis of their postcode, using quintiles derived from the Index of Relative Socioeconomic Disadvantage (IRSD) of the of the Socioeconomic Indexes for Areas (SEIFA). More specifically, the SEIFA concordance file was used to assign the IRSD. The IRSD file reports deciles which were then converted into quintiles. **Significant at $p < .05$. ^a denotes referent group.

Predictors of deterioration

Predictors of deterioration in self-rated eating disorder symptoms for those no longer in current treatment with respect to psychological and dietetic care (comparing deterioration to improved care; individuals with no change were not included in the regression) were completed and results are presented in Appendix Table 4.9.1 and Appendix Table 4.9.2. Similar findings were revealed for predictors of deterioration as had been observed for predictors of improved symptoms.

Analysis of data from survey participants with linked MBS and PBS data

Out-of-pocket costs

Linked MBS data were available for 1,959 participants. Linked PBS data were available for 1,866 participants. Both MBS and PBS linked data were available for 1,859 participants. MBS and PBS linked data were provided for a 5-year period from January 2019 until December 2023. Results are presented for all co-payments during this time period. According to the linked MBS data, 1,637 (84%) individuals who responded to our survey and provided linked MBS data saw a psychological healthcare provider (psychologist, GP, other medical practitioner, social worker, or occupational therapist) for their eating disorder and 1,461 (75%) saw a dietitian. Overall, 41,904 psychological sessions and 19,879 dietetic sessions of care were provided to the participants who consented to having their MBS data linked.

Out-of-pocket (OOP) costs or co-payments (AUD 2022-23) of MBS services were identified for participants who had linked MBS claims data. Co-payments were paid by individuals for 37,859 EDP psychological treatment services (90%) and 16,603 dietetic services (84%). The median co-payment (including only individuals who incurred an out-of-pocket cost for their EDP services) for psychological treatment services was \$33 (IQR \$20 – 100) and the mean co-payment for psychological treatment services was \$60 (SE 0.24). The range of mean OOP payments for psychological services per person was from \$0.22 to \$232ⁱ. The median co-payment (including only individuals who incurred an out-of-pocket cost for their EDP services) for dietetic services was \$29 (IQR \$19 – 79) and the mean co-payment for dietetic services was \$51 (SE 0.36). The range of mean OOP payments for dietetic services per person was from \$0.08 to \$242ⁱⁱ.

Table 4.23 reports the total co-payments (including only individuals who incurred an out-of-pocket cost for their EDP service) paid by individuals who received any psychological treatment for their eating disorder, any dietetic care for their eating disorder or for both psychological and dietetic treatment. The median total co-payment was \$985 for individuals who received any mental health treatment as part of their EDP and \$338 for individuals who received any dietetic sessions as part of

ⁱ The lower value of the mean range for psychological treatment was \$0.22. This was so low due to a small cohort of individuals who had many psychological services, yet were only charged OOP for one of these psychological services.

ⁱⁱ The lower value of the mean range for dietetic services was \$0.08. This was so low due to a small cohort of individuals who had many dietetic services, yet were only charged OOP for one of these dietetic services.

their EDP. When individuals received both psychological treatments and dietetic care, the median total co-payment cost was \$1,653.

Table 4.23. Total co-payments paid by participants with linked MBS treatment claims data as part of an EDP

	Median total co-payment (IQR)
Full sample ($n = 1,951$)	\$1,113 (390 – 2,338)
Individuals receiving any psychological services ($n = 1,634$)	\$985 (378 – 1,872)
Individuals receiving any dietetic services ($n = 1,455$)	\$338 (110 – 803)
Individuals receiving both psychological and dietetic services ($n = 1,138$)	\$1,653 (837 – 2,885)

Note. Total co-payment spans the 5 years of data (2019 – 2023).

These co-payments were then evaluated according to the perceived affordability (derived from a question in the survey). As shown in Table 4.24 the differences in total out-of-pocket costs paid over the data collection period between those who said the fees were affordable compared to those who stated the fees were unaffordable are \$58 for psychological services and \$145 for dietetic services.

Table 4.24. Co-payments by perceived affordability for participants with linked MBS claims data

	Median total co-payment (IQR)
I didn't pay anything for my psychological services ($n = 133$)	\$0 (0 – 217)
I paid a fee that was affordable for my psychological services ($n = 551$)	\$876 (304 – 1,828)
I paid a fee that was too expensive for my psychological services ($n = 1,013$)	\$934 (293 – 1,807)
Unsure of the fee I paid for my psychological services ($n = 132$)	\$760 (53 – 1,626)
I didn't pay anything for my dietetic services ($n = 177$)	\$0 (0)
I paid a fee that was affordable for my dietetic services ($n = 531$)	\$335 (110 – 748)
I paid a fee that was too expensive for my dietetic services ($n = 577$)	\$480 (160 – 1,023)
Unsure of the fee I paid for my dietetic services ($n = 123$)	\$201 (0 – 647)

Note. Total co-payment spans the 5 years of data.

The PBS linkage allowed median co-payment associated with pharmaceuticals to be determined for individuals who had accessed Eating Disorders MBS items. The median total co-payment for pharmaceuticals was \$842 (IQR = \$394 – 1,522, $n = 1,859$). Note that this value pertains to all pharmaceuticals and not just pharmaceuticals associated with eating disorder treatment.

Predictors of improvement with MBS linked data

Logistic regression for predictors of improvement in self-rated eating disorder symptoms (comparing improved to deteriorated symptoms; individuals who reported no change were not included in the regression) were conducted for the sample of participants who consented to MBS/PBS data linkage and those who were no longer in current treatment with respect to psychological and dietetic care. In these analyses, the MBS objective data was used for the following variables in the place of self-report data: provider type, number of dietetic sessions, modality of dietetic sessions (face-to-face, telehealth, phone), number of psychological treatment sessions and modality of psychological

treatment sessions (face-to-face, telehealth, phone). These logistic regression models are presented in Tables 4.25 and 4.26.

Table 4.25 provides the results of the logistic regression which aimed to determine predictors of improvement in self-rated eating disorder symptoms with respect to psychological care for those no longer in treatment (comparing improved to deteriorated symptoms; individuals who reported no change were not included in the regression) using MBS predictor variables. When modelled individually, the only variable that was significantly related to improved self-rated eating disorder symptoms was self-rated eating disorder symptoms before psychological treatment. Individuals who had better self-rated eating disorder symptoms (above five out of a maximum score of ten) when they began their treatment, had significantly lower odds of showing improvement (OR 0.03, 95% CI 0.02, 0.06). Multivariable analyses were not conducted as only one variable was significantly related to improved self-rated eating disorder symptoms in univariate analyses.


Age, gender, sexual identity, First Nations status, SES and country of birth were not significantly associated with improvement in self-rated eating disorder symptom level. Furthermore, none of the MBS items were statistically significant in the univariate model.

Table 4.25. Predictors of improvement in self-rated eating disorder symptoms for those no longer in psychological treatment and who had linked MBS claims data (psychological treatment)*

Variable		Univariate regression Odds ratio, (95% CI)
Age	< 18 years ^a	-
	18 – 20	0.32 (0.09, 1.12)
	21 – 24	0.62 (0.16, 2.37)
	25 – 29	0.32 (0.09, 1.16)
	30 – 34	1.24 (0.20, 7.64)
	35 – 39	0.41 (0.09, 1.78)
	40 – 44	0.29 (0.06, 1.39)
	45 – 50	0.61 (0.06, 6.25)
	50 – 54	0.28 (0.05, 1.51)
	55 – 59	0.18 (0.03, 1.24)
	60 – 64	Dropped (few observations /no variation)
	65 – 69	Dropped (few observations/no variation)
	70 – 74	Dropped (few observations/no variation)
Gender	Female ^a	-
	Male	Dropped (few observations/no variation)
	Non-binary	1.43 (0.19, 11.06)
	Prefer not to say	Dropped (few observations/no variation)
Sexual identity	Not heterosexual ^a	-
	Heterosexual	1.05 (0.58, 1.92)
Country of birth	Australia ^a	-
	Overseas	0.63 (0.30, 1.29)

Variable		Univariate regression Odds ratio, (95% CI)
First Nations status	Not First Nations ^a	-
	First Nations	Dropped (few observations/no variation)
SEIFA IRSD quintile [^]	Q1 (Most disadvantaged) ^a	-
	Q2	2.16 (0.76, 6.16)
	Q3	2.44 (0.86, 6.95)
	Q4	2.30 (0.91, 5.77)
	Q5 (Least disadvantaged)	2.01 (0.88, 4.60)
Self-rated eating disorder symptoms (before care)	Worse symptoms ^a	-
	Better symptoms	0.03** (0.015, 0.06)
Provider type (MBS data)	Service from either mental health or dietitian ^a	-
	Service from both mental health professional and dietitian	0.89 (0.52, 1.54)
No. of sessions dietitian (MBS data)	< 5 ^a	-
	5 – 9	1.63 (0.69, 3.85)
	10 – 14	1.12 (0.43, 2.94)
	15 – 19	1.36 (0.38, 4.84)
	> 20	1.26 (0.45, 3.53)
Face-to-face sessions dietitian (MBS data)	No ^a	-
	Yes	1.30 (0.75, 2.23)
Telehealth sessions dietitian (MBS data)	No ^a	-
	Yes	Dropped (few observations/no variation)
Phone sessions dietitian (MBS data)	No ^a	-
	Yes	1.19 (0.65, 2.17)
No. of sessions psychological provider (MBS data)	< 10 ^a	-
	10 – 19	1.50 (0.73, 3.09)
	20 – 29	2.14 (0.72, 6.37)
	30 – 39	0.55 (0.21, 1.46)
Face-to-face sessions psychological provider (MBS data)	> 40	1.07 (0.35, 3.25)
	No ^a	-
	Yes	0.65 (0.33, 1.28)
	Telehealth sessions psychological provider (MBS data)	No ^a
Phone sessions psychological provider (MBS data)	Yes	1.38 (0.79, 2.42)
	No ^a	-
Phone sessions psychological provider (MBS data)	Yes	0.58 (0.23, 1.42)
	No ^a	-

Note. * Missing data excluded. [^] Socioeconomic status was ascribed to participants on the basis of their postcode, using quintiles derived from the Index of Relative Socioeconomic Disadvantage (IRSD) of the of the Socioeconomic Indexes for Areas (SEIFA). More specifically, the SEIFA concordance file was used to assign the IRSD. The IRSD file reports deciles which were then converted into quintiles. **Significant at $p < .05$. ^a denotes



referent group. Multivariable analyses were not conducted as only one variable was significantly related to improved self-rated eating disorder symptoms in univariate analyses.

Table 4.26 provides the summary statistics for the MBS logistic regression which aimed to determine predictors of improvement in self-rated eating disorder symptoms with respect to dietetic care. When modelled separately, variables that were statistically significant included age, self-rated eating disorder symptoms at session start, provider type, number of sessions had with dietitian, face to face sessions with a dietitian, phone sessions with dietitian, and face-to-face sessions with a psychological provider.

Being between the ages of 21 and 24 years old increased the odds of having improved eating disorder symptoms by 50% compared to those less than 18 years old (OR 1.55, 95% CI 1.04, 2.33). This effect became non-significant in the multivariable model.

The second significant variable in univariate models, that also remained significant in multivariable models, was self-rated eating disorder symptoms before dietetic care was received. Individuals who had better self-rated eating disorder symptom score (above five out of 10) when they began their treatment had significantly lower odds of showing improvement (univariate model: OR 0.25, 95% CI 0.15, 0.41 and multivariable model: OR 0.22, 95% CI 0.11, 0.46).

The third variable that was significant in the univariate model was provider type. Seeing both a psychological provider and a dietitian was associated with eating disorder symptom improvement (OR 4.17, 95% CI 3.30, 5.27) compared to seeing only a dietitian or only a psychological treatment provider. This effect was no longer significant in the multivariable model (OR 0.84, 95% CI 0.42, 1.68).

The fourth variable associated with significant improvement in self-rated eating disorder symptoms due to the dietetic intervention was the number of dietetic sessions received according to MBS data. Compared with those who had fewer than five dietetic sessions, those who had more than five sessions had improved odds of eating disorder symptom improvement. The size of the odds ratio of this effect increased as the number of dietetic sessions increased. For example, individuals who had 20 or more dietetic sessions were more than three times more likely to self-report improved eating disorder symptoms compared to those who received fewer than five dietetic sessions (OR 3.48, 95% CI 1.94, 6.23). The number of dietetic sessions received remained significant in the multivariable model, with effects increasing positively and monotonically with number of sessions.

Individuals who had face-to-face dietetic sessions were six times more likely to have improved self-rated eating disorder symptoms compared to those who did not have face-to-face dietetic sessions in the univariate model (OR 6.28, 95% CI 4.92, 8.02). This effect was no longer significant in the multivariable model. Similarly, individuals who had phone sessions were more than three times more likely to have improved self-rated eating disorder symptoms compared to those who did not have phone dietetic sessions in the univariate model (OR 3.77, 95% CI 2.91, 4.89). This effect was no longer significant in the multivariable model.

Individuals who had face-to-face psychological sessions were 50% less likely to have improved self-rated eating disorder symptoms compared to those who did not have face-to-face psychological sessions in the univariate model (OR 0.50, 95% CI 0.39, 0.65). This effect was no longer significant in the multivariable model.



The results for dietetic care found that gender, sexual identity, country of birth, First Nations status and SES as measured by the SEIFA IRSD were not significantly associated with improvement in self-rated eating disorder symptoms. The MBS items that were statistically significant in the univariate model included provider type, number of sessions with a dietitian, face-to-face with a dietitian, phone with a dietitian and face-to-face with a psychological provider. None of the MBS items remained statistically significant in the multivariable model.



Table 4.26. Predictors of improvement in self-rated eating disorder symptoms for people no longer in dietetic services for linked MBS claims data*

Variable	Univariate regression Odds ratio, (95% CI)	Multivariable model Odds ratio, (95% CI)
Age		
< 18 years ^a	-	-
18 – 20	1.16 (0.77, 1.74)	0.91 (0.52, 1.60)
21 – 24	1.55** (1.04, 2.33)	1.45 (0.81, 2.60)
25 – 29	1.28 (0.84, 1.94)	1.47 (0.78, 2.75)
30 – 34	1.01 (0.63, 1.62)	0.90 (0.46, 1.77)
35 – 39	0.89 (0.54, 1.47)	0.93 (0.45, 1.93)
40 – 44	0.76 (0.43, 1.34)	0.84 (0.37, 1.93)
45 – 50	1.16 (0.56, 2.40)	1.97 (0.55, 7.02)
50 – 54	0.62 (0.31, 1.23)	1.23 (0.41, 3.73)
55 – 59	0.72 (0.31, 1.64)	0.80 (0.25, 2.53)
60 – 64	1.66 (0.52, 5.32)	1.77 (0.20, 15.81)
65 – 69	1.04 (0.20, 5.32)	Dropped (few observations/no variation)
70 – 74	0.52 (0.09, 2.92)	0.47 (0.06, 3.75)
74 – 79	Dropped (few observations/no variation)	-
> 80	Dropped (few observations/no variation)	-
Gender		
Female ^a	-	-
Male	0.60 (0.35, 1.03)	-
Non-binary	1.24 (0.61, 2.49)	-
Prefer not to say	0.61 (0.17, 2.16)	-
Sexual identity		
Not heterosexual ^a	-	-
Heterosexual	1.01 (0.79, 1.29)	-
Country of birth		
Australia ^a	-	-
Overseas	0.95 (0.68, 1.32)	-
First Nations status		
Not First Nations ^a	-	-
First Nations	0.74 (0.29, 1.89)	-

Variable		Univariate regression Odds ratio, (95% CI)	Multivariable model Odds ratio, (95% CI)
SEIFA IRSD quintile [^]	Q1 (Most disadvantaged) [^]	-	-
	Q2	0.70 (0.42, 1.17)	-
	Q3	0.83 (0.50, 1.36)	-
	Q4	0.81 (0.50, 1.30)	-
	Q5 (Least disadvantaged)	0.77 (0.49, 1.22)	-
Self-rated eating disorder symptoms (before care)	Worse symptoms [^]	-	-
	Better symptoms	0.25** (0.15, 0.41)	0.22** (0.11, 0.46)
Provider type	Service from either mental health or dietitian [^]	-	-
	Service from both mental health professional and dietitian	4.17** (3.30, 5.27)	0.84 (0.42, 1.68)
No. of sessions dietitian	< 5 [^]	-	-
	5 – 9	2.52** (1.70, 3.74)	2.70** (1.76, 4.14)
	10 – 14	2.31** (1.45, 3.69)	2.62** (1.57, 4.35)
	15 – 19	3.09** (1.54, 6.18)	3.68** (1.76, 7.70)
	> 20	3.48** (1.94, 6.23)	3.96** (2.06, 7.60)
Face-to-face sessions dietitian	No [^]	-	-
	Yes	6.28** (4.92, 8.02)	1.12 (0.66, 1.91)
Telehealth sessions dietitian	No [^]	-	-
	Yes	Omitted because of collinearity	-
Phone sessions dietitian	No [^]	-	-
	Yes	3.77** (2.91, 4.89)	0.82 (0.54, 1.24)
No. of sessions psychological provider	< 10 [^]	-	-
	10 – 19	0.92 (0.68, 1.26)	-
	20 – 29	0.86 (0.60, 1.24)	-
	30 – 39	1.21 (0.70, 1.80)	-



Variable		Univariate regression Odds ratio, (95% CI)	Multivariable model Odds ratio, (95% CI)
	> 40	0.69 (0.48, 1.00)	-
Face-to-face sessions psychological provider	No ^a	-	-
	Yes	0.50** (0.39, 0.65)	0.63 (0.34, 1.18)
Telehealth sessions psychological provider	No ^a	-	-
	Yes	0.89 (0.71, 1.11)	-
Phone sessions psychological provider	No ^a	-	-
	Yes	0.66 (0.43, 1.02)	-

Note. * Missing data excluded. ^ Socioeconomic status was ascribed to participants on the basis of their postcode, using quintiles derived from the Index of Relative Socioeconomic Disadvantage (IRSD) of the of the Socioeconomic Indexes for Areas (SEIFA). More specifically, the SEIFA concordance file was used to assign the IRSD. The IRSD file reports deciles which were then converted into quintiles. **Significant at $p < .05$. ^a denotes referent group.



Discussion


Summary and interpretation of findings

In Study 4, the individuals completing the survey provide a mostly positive perspective of psychological treatment and dietetic health services received under their EDP. Almost all participants had some psychological treatment sessions, whilst three quarters accessed dietetic services and the majority had both psychological and dietetic services (63%). Overwhelmingly, GPs provided the referrals for the EDP. Just over one quarter of the cohort reported having anorexia nervosa, and a similar proportion reported multiple diagnoses (22%). Interestingly, the third most common diagnostic group was that for which participants did not report or were not given a diagnosis (18%). This finding is worthy of further investigation, especially as one of the criteria for obtaining an EDP is having an eating disorder diagnosis¹. There are a number of reasons this may have occurred, including the individual not remembering the diagnosis, the individual not being made aware of the diagnosis, inappropriate referrals, and lack of communication between treatment providers and referral providers. The multiple diagnoses cohort were a group who reported multiple different diagnoses over the 2019 to 2023 timeframe. It is unlikely that this cohort was experiencing multiple eating disorder diagnoses at the same time as eating disorder diagnoses do not overlap¹². However, reasons for the reporting of multiple diagnoses may be due to a change in eating disorder symptoms leading to a different diagnosis, which is a common occurrence in individuals with an eating disorder¹³. Alternatively, multiple diagnoses may reflect an initial misdiagnosis that was corrected subsequently.

At the time of the survey over half of the participants were still receiving care from a psychological treatment provider and just under half were still receiving care from a dietitian. The majority of individuals had attended more than 10 psychological treatment sessions and more than five dietetic sessions. More than 80% of the participants attended both psychological treatment and dietetic sessions face-to-face and almost all participants received their psychological and dietetic sessions individually rather than in a group. Most participants paid some out-of-pocket costs for their psychological treatment and dietetic sessions. For two thirds of the participants, it was their first time using psychological treatment and/or dietetic sessions as part of an EDP.

The experience of seeing the psychological treatment and/or dietetic services provider was positive. The participants valued the relationship with the providers, felt the providers respected and listened to them, and equipped them with skills to manage their symptoms. The majority were satisfied or very satisfied with their psychological and dietetic care. However, there were some issues with the experience of seeing the psychological treatment provider, including that over a third of individuals found they had to wait too long to see the psychological treatment provider. Second, the out-of-pocket costs were deemed too expensive for psychological treatment by over half of the participants and the out-of-pocket costs were deemed too high for dietetic services by just under half of the participants. The major reasons for early cessation of psychological and dietetic services were the fee being too expensive and the sessions not being helpful.


Improved eating disorder symptoms were reported from before treatment to after the most recent session in over 80% of individuals for both psychological treatment and dietetic care. For those individuals who had improved following receipt of care under the EDP, the majority attributed the



psychological or dietetic services as entirely or partially contributing to the improvement in eating disorder symptoms. Baseline self-rated eating disorder symptoms (worse symptoms before dietetic care) and the number of dietetic sessions (higher number of sessions) were associated with symptom improvement in both the self-report and MBS objective data multivariable regression models. Baseline self-rated eating disorder symptoms (worse symptoms before psychological care) were associated with symptom improvement in both the self-report and MBS objective data multivariable regression models. The number of psychological sessions was associated with symptom improvement in the self-report multivariable regression model, however not in the MBS objective data multivariable regression model. It is possible that variation in data collection methods between the self-report data and objective MBS data may contribute to this disparity in findings. In this regard, the precise number of sessions received was available in MBS data but an approximation of the number of sessions received was recorded in self-report data (e.g., participants indicated if they received fewer than 10, 10-19, 20-30, etc psychological sessions). Furthermore, other factors that may be related to the impact of number of sessions received on symptom outcomes but were not measured in this study should also be considered as they may also contribute to the different results. For example, timeliness of session delivery, not simply the number of sessions received could play a role, as weekly session delivery results in more rapid treatment response than fortnightly delivery ¹⁴. Furthermore, for psychological and dietetic sessions no difference in self-reported improvement was found for demographic characteristics of age, gender, First Nations status, sexual identity, and country of birth, perhaps suggesting that when people receive treatment under the EDP, the treatment is perceived to be equivalently helpful to those who receive it.

MBS linked data were available for 1,959 participants (81% of the sample) and PBS linked data were available for 1,866 (77% of the sample). The MBS linked data were used as a supplementary data source to the self-report survey answers. When looking at the number of psychological and dietetic treatment sessions received, MBS data showed that individuals received less psychological treatment than they thought. For example, self-report percentage of those who had less than 10 sessions was 20% for those no longer in treatment, however the percentage of individuals who were no longer in treatment who had less than 10 sessions was 43% according to MBS data. MBS data also showed that individuals received more dietetic services than they thought. For example, self-report percentage of those who had 20 or more dietetic sessions was 14% for those no longer in treatment, however the percentage of individual who were no longer in treatment who actually had 20 or more dietetic sessions was 36%. When looking at the treatment modality and treatment format in terms of face-to-face, telehealth, phone and individual or group treatment, the self-report and MBS data were comparable.

Co-payments were also identified for the different types of services. The mean and median co-payments for dietetic services were \$51 and \$29, respectively. The mean and median co-payments for psychological services were \$60 and \$33, respectively. Study 2 found that for psychological services the median out-of-pocket costs increased over time from \$24 in 2019 to \$51 in 2022 and for dietetic services the median cost was \$25 in 2019 and \$36 in 2022. These median co-payments for psychological services under the EDP are less than the median co-payments found for psychological services as reported in the Better Access report (\$70 for clinical psychologist, \$73 for psychologist, \$72 for social worker and occupational therapist) ². Why these differences occur is unclear but may be related to the quantity of services used in eating disorder treatment (with more services available per year for eating disorder services compared to Better Access services) and perhaps the fact that



most eating disorder treatment is provided to younger populations who may have lower ability to pay higher fees. However, it is also important to note that fees for psychological services in our analysis also includes more professionals than just psychologists.

Strengths and limitations

Major strengths of this study were the sample size and sampling strategy. The total sample size was large ($n = 3,184$ with the results based on $n = 2,421$), meaning that we can be confident in the precision of results. The mail out invitation to participate was sent to over 27,000 individuals resulting in an 11.5% response rate, which was higher than the Better Access experience and outcomes of consumers recruited via Medicare survey response rate of 7.4%². However, the response rate may still impact the generalisability of our findings. A second strength is the sampling strategy, which was completed by Services Australia and allowed us to approach every individual (aged 15 years and over) who had accessed Eating Disorders MBS items for psychological treatment or dietetic services since 2019, meaning that we had full population coverage in analysing the Eating Disorders MBS items. There was good representation from all Australian states. Over 80% of the participants were from either Victoria, New South Wales or Queensland, which is comparable to the Australia wide population distribution in these three states¹⁵. Second, First Nations people account for 2% of the sample, which was similar to an eating disorder prevalence study completed in South Australia in 2017¹⁶. However, the same eating disorder prevalence study found that symptoms of eating disorders were distributed equally across all SES¹⁶, whereas our sample indicated those with low SES had higher levels of eating disorders and that the rate of eating disorders reduced across bands of increasing SES.

Limitations include that the survey relied on self-reported data, which may introduce recall bias, especially as the study is asking about Eating Disorders MBS items that have been used since 2019. To sure up this limitation, we also obtained MBS and PBS data and therefore for some questions (such as service use and costs) we were able to cross-check the self-reported data with the MBS and PBS linked data. The survey was designed to be short so participants would complete the full survey, however this meant that certain questions could not be included such as more in-depth information and follow up questions about multiple diagnoses and further information about treatment experience. Study 6 provides additional consumer information in some of these areas.

Conclusion

Study 4 explored the experience and perceptions of more than 2,000 individuals who saw either a dietitian or a psychological health provider as part of an EDP since 2019. The service users were mostly positive about their experience of receiving care, support received from the service providers, and reported overall satisfaction with care. Issues were identified around cost and affordability of treatment for both dietetic and psychological treatment providers and waiting lists and timeliness of care were raised as an issue with respect to psychological treatment. Despite these identified issues, the majority of individuals reported improved eating disorder symptoms as a result of seeing both the dietitian and psychological health provider.

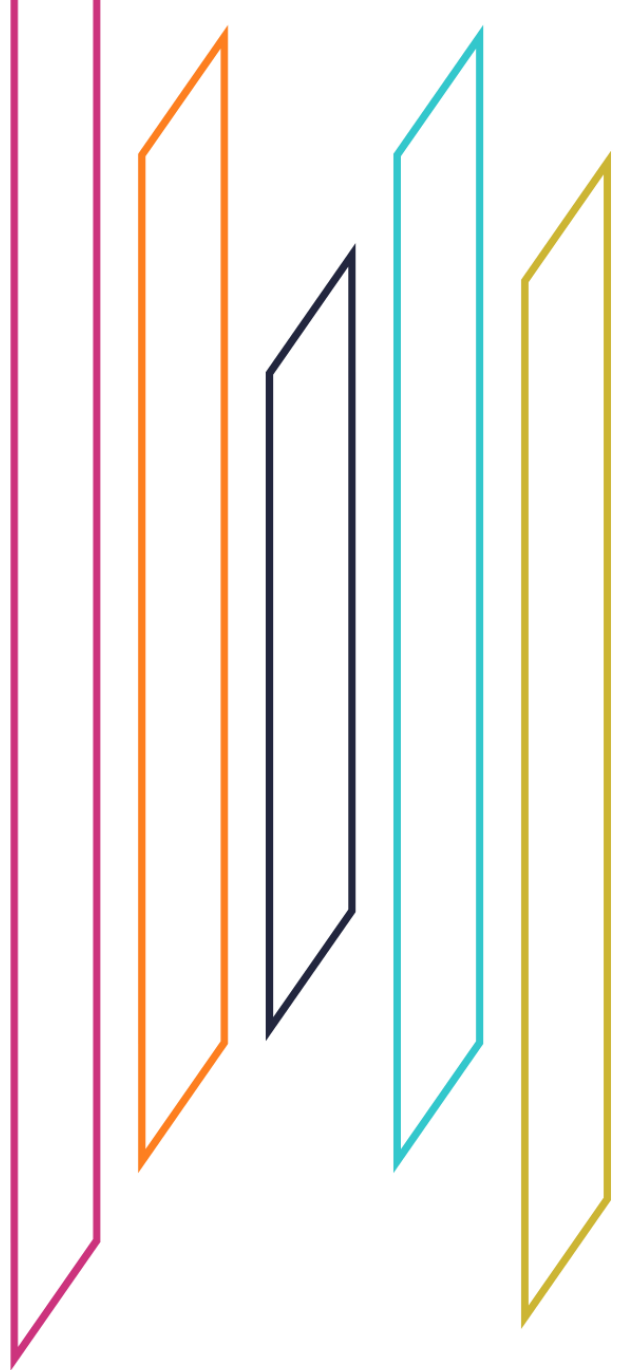
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Chapter 5.
General practice
case review
(Study 5)



Chapter 5. General practice case review (Study 5)

Evaluation of benefits of Eating Disorders MBS Items for eating disorder symptom improvement

Abstract

Background: Information about the uptake of Eating Disorder MBS items is available on Services Australia's website. However, the clinical benefit of these items in relation to patients' eating disorder symptom improvement has not been evaluated. **Aim:** To evaluate whether people who access Eating Disorders MBS item-services experience eating disorder clinical improvement and meet the individual goals of their Eating Disorder Plan (EDP). **Method:** 62 Australian registered general practitioners (GPs) were recruited and provided summary clinical file data for a total of 189 people for whom they had initiated an EDP. Of these, 93 (48.9%) met criteria for anorexia nervosa, 37 (19.5%) met criteria for other specified feeding or eating disorder (OSFED), 33 (17.4%) met criteria for binge eating disorder, and 26 (13.8%) met criteria for bulimia nervosa. Data collected included the degree to which EDP goals were met at each of the scheduled reviews (after 10, 20, and 30 psychological treatment sessions) and where available, eating disorder and psychological symptom change at each review. Data up to the third review (i.e., 30 sessions) were available for half of the patients GPs reported on. **Results:** There was a significant improvement over time with most moving towards meeting the goals set at the initiation of the EDP. This was evident for all diagnostic groups and evident for all sociodemographic practice locations. The data on other objectively measured outcomes was encouraging and supportive of eating disorder and general psychological symptom improvements (i.e., a significant reduction in scores at each of the EDP scheduled reviews). **Conclusion:** This study adds real world data on prospectively and objectively assessed outcomes for the EDP. This extends and complements the data from surveys of clinicians and people with lived experience of an eating disorder reporting retrospectively on experiences.

Highlights

- This study adds real world data on prospectively and objectively assessed outcomes of the EDP for 189 people with lived experience of an eating disorder.
- By the third review (i.e., 30 sessions), a substantial proportion of participants (47%) had fully or partly met the EDP goals set at initiation of the EDP.
- Early improvement was associated with a significantly greater likelihood of meeting goals at the third review.
- There is a need for continued care for many, particularly those with a diagnosis of anorexia nervosa.
- Despite not being mandated, there were data from objective clinical outcome measures for eating disorders, which supports the perceived utility of these tools.

Background

On November 1st, 2019, 64 items were added to the Medicare Benefits Schedule (MBS), comprising the Eating Disorder Plan (EDP)¹. These enabled unprecedented and specified access to additional

repeated treatment sessions for persons in Australia with a serious and/or complex eating disorder. The items cover up to 40 psychological treatment sessions and up to 20 dietetic sessions over a 12-month period. General practitioners (GPs) are typically the first point of contact responsible for the initiation of an EDP with someone with an eating disorder, including setting clinical goals for treatment under the EDP. This leads to referral to a mental health clinician who then typically provides the psychological treatment sessions. After their tenth, twentieth, and thirtieth set of psychological treatment sessions, the person with the eating disorder attends a review of the EDP, typically with their GP, where progress towards the EDP goals and need for continued psychological sessions are assessed. In addition, a specialist review by a psychiatrist or paediatrician is required to continue to access more than 20 sessions under the EDP. Eligibility for the EDP is summarised in Box 5.1.

Box 5.1. Eligibility for the Medicare Eating Disorder Treatment Plan

- People with a clinical diagnosis of anorexia nervosa;

OR

- People with a clinical diagnosis of bulimia nervosa, binge-eating disorder, or other specified feeding or eating disorder; AND
- An Eating Disorder Examination Questionnaire score ≥ 3 ; AND
- A condition characterised by rapid weight loss, or frequent binge eating, or inappropriate compensatory behaviour as manifested by ≥ 3 occurrences per week; AND
- ≥ 2 of the following indicators: (a) clinically underweight with a body weight less than 85% of expected weight where weight loss is directly attributable to the eating disorder, (b) current or high risk of medical complications due to eating disorder behaviours and symptoms, (c) serious comorbid medical or psychological conditions significantly impacting on medical or psychological health status with impacts on function, (d) the person has been admitted to a hospital for an eating disorder in the previous 12 months, (e) inadequate treatment response to evidence-based eating disorder treatment over the past six months despite active and consistent participation.

For more information see [Medicare Benefits Schedule](#).

The Department of Health stipulates its intentions with the EDP are to:

- (i) Support a model of best-practice evidence-based care for people with a diagnosis of anorexia nervosa and other eligible people with eating disorders; and
- (ii) For the MBS services to be provided by practitioners with the knowledge, skills, and experience in providing treatment to people with eating disorders

While information about *uptake* of these new Eating Disorders MBS items can be obtained publicly from Services Australia's website, this does not directly inform about the effectiveness of the EDP to improve outcomes for people with lived experience of an eating disorder.



Aims

The aim of this study was to use clinical outcome data collected by GPs at the EDP scheduled review time-points to evaluate the effectiveness of the EDP regarding improvement in clinical symptoms. This will contribute to the evaluation of the EDP initiative and recommendations for its future use. The primary question addressed by this research study was: *Do people who are provided an EDP as initiated by a GP meet their individual goals of treatment under the EDP?*

A secondary question was: *Do people who are provided an EDP as initiated by a GP experience eating disorder and general psychological symptom improvement whilst receiving treatment under the EDP?* This question was secondary as the collection of clinical outcomes beyond whether goals are being met is not mandated. However, we were aware that GPs sometimes use measures to assess psychological distress and eating disorder psychopathology, and we wished to capitalise on this data collection where available.

It was hypothesised that at the first EDP review (after 10 sessions) there would be a modest proportion of people recorded by GPs as having at least partly met their EDP goals, but that this proportion would be significantly larger at later EDP reviews (i.e., after 20 and 30 sessions).

Methods

Design

The study design was secondary analysis of collated medical record health outcomes data.


Ethics

The study was reviewed and approved by the Western Sydney University Human Research Ethics Committee (ID: H1534).

Participants and Recruitment

Two recruitment methods were used to access GPs. First, we emailed information about the study to GPs and other health professionals known to the research team (who then sent to GPs known to them; i.e., 'snowballing') and through general word-of-mouth, including posting information within a closed social media network of > 700 Australian GPs. Second, we paid for the study information to be emailed or faxed to GPs in the Medical Directory of Australia database of GPs who have registered to participate in health research (see <https://masterlink.mda.com.au/information/privacy>). Informed consent was sought from GPs recruited into the study. Eligible GPs were family doctors registered with Australian Health Practitioner Regulation Agency (AHPRA) who had prepared one or more EDPs. Thus, the only exclusion criterion was if the GP had not completed an EDP previously. Any or all GPs could provide data on people for whom they had initiated an EDP. GPs who participated were offered a \$AUD50 gift voucher per person they provided data on.

A waiver of consent was sought for people with lived experience of an eating disorder and approved by the Human Research Ethics Committee for this study on the basis that we met the requirements as specified under the National Statement, including that to seek consent from individual people with lived experience of an eating disorder would have been impracticable, the study was using



anonymous data under a quality assurance design framework, data collected was from GP documentation in medical records and not primarily sourced from the person (e.g., body weight and frequency of specific symptoms were determined to be primary source data and would require direct patient consent), and the anticipated benefits of the study were of national significance.

Procedures

GPs who were interested in the study accessed the full downloadable Participant Information Consent Form (PICF) via a Qualtrics survey link, or if preferred this was sent by email. GPs who provided consent (majority online) were then presented with a brief survey which asked a series of demographic questions and information from up to five individual patient records for people for whom they had provided an EDP. If they returned data from five medical records, they were invited to complete a second survey on any additional patient record(s).

To assist in verification of true respondents, GPs were asked for their AHPRA Provider Number and practice address, and this was verified by the research team.

Measures

The survey was constructed by the researchers. Questions asked about general patient information including age, gender, and GP practice postcode. Information available in the medical record on the following outcomes after the 10th, 20th and 30th sessions was requested (subject to availability):

- An account from the GP of whether the EDP review goals were met at each scheduled review. Response options included: “Fully met -no further sessions required”, “Partly met - further sessions required”, “Unmet- different treatment required”, and “Unknown (e.g., left treatment or some other reason)”.
- The global score on the Eating Disorder Examination-Questionnaire (EDE-Q) of the person with an eating disorder ². The EDE-Q is a widely used measure of eating disorder psychopathology. There are 22 Likert-type items, ranging from 0 (No days/Not at all) to 6 (Every day/Markedly) that map onto four separate subscales (Dietary Restraint, Eating Concern, Weight Concern, and Shape Concern), that are the average of their composite items. The global score is calculated as the average of the four subscales, ranging from 0 to 6, with higher scores indicative of greater severity of psychopathology. The EDE-Q global score has demonstrated high internal consistency and construct validity ². The EDE-Q is a required questionnaire at commencement of the EDP (a score of ≥ 3 forms part of the eligibility criteria for people with a diagnosis other than anorexia nervosa) and the preferred outcome measure used thereafter in the person's care.
- The person's score on the Kessler Psychological Distress Scale (K-10) ³. The K-10 includes 10 Likert-type items that measure the frequency of anxiety and depressive symptoms during the past 4 weeks, on a scale of 1 to 5. Scores range from 10 to 50, with higher scores indicating higher levels of distress. The K-10 has demonstrated high internal consistency and validity in predicting clinically significant levels of distress in general population samples ³. The K-10 is a required instrument in general mental health treatment plans initiated by GPs in Australia and the preferred outcome measure used thereafter in the person's care.

Data Analysis

Data were extracted from the Qualtrics survey platform into IBM SPSS Statistics (Version 27.0) and cleaned prior to analysis. Descriptive statistics were computed including frequencies, proportions, means, standard deviations, medians, and interquartile ranges to describe the sample in terms of demographic characteristics, diagnoses, and clinical outcomes. Subgroups were created and contrasted in tables based on an indicator of socioeconomic advantage using postcode data (socio-economic index for area (SEIFA) scores), according to calculations from the Australian Bureau of Statistics. Tests of significance were conducted in SPSS Version 27.0 using Chi-Square tests for comparing proportions, the Friedman and Mann-Whitney U Tests for non-parametric outcomes, and the Repeated Measures General Linear Model for continuous outcomes.

Results

Participants

There were 62 GPs who provided data on 189 people with lived experience of an eating disorder from every state and territory in Australia, except Tasmania, and across a broad distribution of socioeconomic status as defined by the Australian Bureau of Statistics' Socio-Economic Indexes for Areas. Table 5.1 shows the number of people with lived experience of an eating disorder from the study residing within each state in Australia.

Table 5.1. Geographic distribution of 189 participants with an eating disorder

State	<i>n</i>	Percent
Australian Capital Territory	10	5.3
New South Wales	41	21.6
Northern Territory	5	2.8
Queensland	23	12.1
South Australia	26	13.7
Victoria	50	26.3
Western Australia	34	17.9

Table 5.2 outlines the participant characteristics for the current study. Most people with lived experience of an eating disorder were females aged between 15 – 25 years. The most common diagnosis was anorexia nervosa, followed by other specified feeding and eating disorder (OSFED), binge eating disorder, and bulimia nervosa. GP practices were located across very disadvantaged to very advantaged areas with a slight skew toward more advantaged areas. There was some distribution across each socioeconomic level, indicating a need for EDPs to continue to be funded across all socioeconomic statuses. Most GP practices were in a “Very Advantaged” area, followed by “Neither Advantaged nor Disadvantaged”, “Moderately Advantaged”, and “Moderately Disadvantaged” socioeconomic area, with fewest from a “Very Disadvantaged” socioeconomic area⁴.

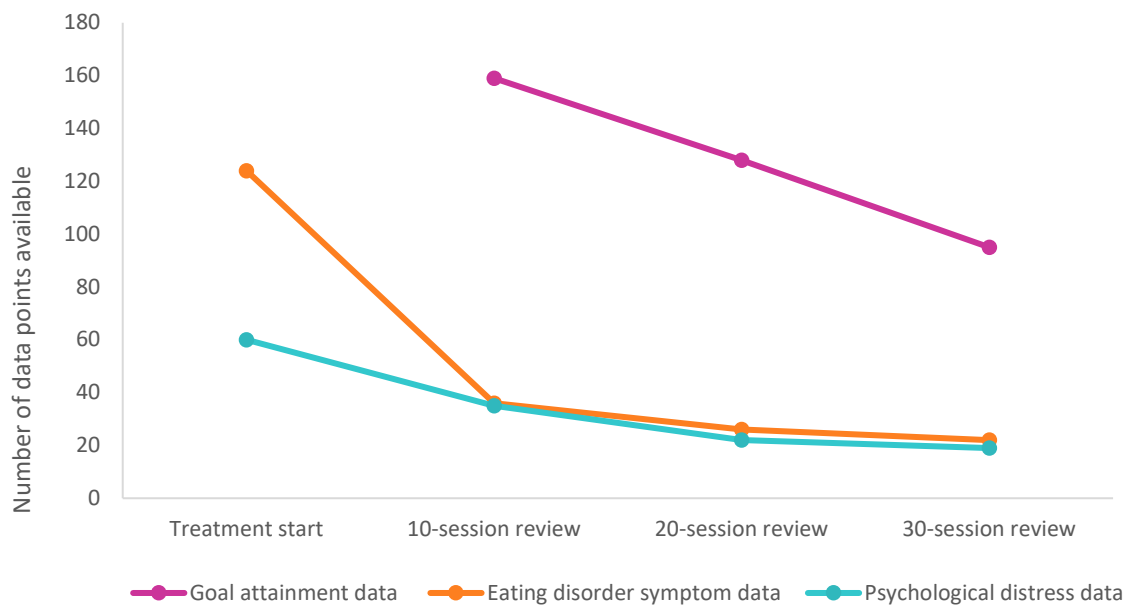
Table 5.2. Participant sociodemographic characteristics ($n = 189$)

Variable	Included in final analysis	
	<i>N</i>	%
Gender		
Female	178	93.7
Male	6	3.2
Non-binary	5	2.8
Age		
< 15 years	15	7.9
15 – 25 years	110	57.9
26 – 35 years	43	22.6
36 – 45 years	15	7.9
46 – 55 years	4	2.1
> 55 years	2	1.1
Eating Disorder Diagnosis		
Anorexia nervosa	93	48.9
OSFED	37	19.5
Binge eating disorder	33	17.4
Bulimia nervosa	26	13.8
Socio-economic Status General Practice Locale		
Very Disadvantaged	22	11.6
Moderately Disadvantaged	23	12.1
Neither Advantaged nor Disadvantaged	46	24.2
Moderately Advantaged	50	26.3
Very Advantaged	48	25.3

Note. OSFED = other specified feeding and eating disorder.

Data availability

As described in the methodology for the study, data were extracted from records subject to availability. There was variability in data provided for goal attainment, eating disorder and psychological distress. Notably, the data available on the eating disorder symptom and psychological distress measures was less than that available for evaluating goal attainment. From the 189 case files reviewed, little data existed for psychological distress and available data diminished over time (see Figure 5.1). This may be due to many people completing or stopping treatment and not attending their GP for ongoing reviews. However, it is also possible that data were unavailable due to inconsistencies in recording of progress data.



Note. Data were not recorded for goals at treatment start.

Figure 6.4. Availability of outcome data for goals and eating disorder and distress symptoms

Outcomes: Participant goals

Outcomes of goals set across eating disorder diagnoses are shown in Table 5.3. Overall, as demonstrated in Figure 5.2 and 5.3, there was a significant increase in the percentage of people meeting their goals from the first to the third review ($\chi^2 = 19.437$, $df = 4$, $p < .001$), and a significant improvement in meeting of goals between each of the three review time points (all post-hoc $p < .001$).

Table 5.3. Outcomes of Participant Goals at the Eating Disorder Treatment Plan

Diagnosis	Baseline	First review				Second review				Third review			
		n (%)											
		<i>Met</i>	<i>Part Met</i>	<i>Unmet</i>	<i>Unknown</i>	<i>Met</i>	<i>Part Met</i>	<i>Unmet</i>	<i>Unknown</i>	<i>Met</i>	<i>Part Met</i>	<i>Unmet</i>	<i>Unknown</i>
AN	Goals	8	53	22	10	13	45	10	25	6	39	4	44
	Set	(8.6)	(57.0)	(23.7)	(10.8)	(14.0)	(48.4)	(10.8)	(26.9)	(6.5)	(41.9)	(4.3)	(47.3)
BN	Goals	0	13	10	3	0	16	2	8	2	12	1	11
	Set	(0)	(50.0)	(38.5)	(11.5)	(0)	(61.5)	(7.7)	(30.8)	(7.7)	(46.2)	(3.8)	(42.3)
BED	Goals	3	14	7	9	6	12	3	12	7	8	1	17
	Set	(9.1)	(42.4)	(21.2)	(27.3)	(18.2)	(36.4)	(9.1)	(36.4)	(21.2)	(24.2)	(3.0)	(51.5)
OSFED	Goals	2	20	7	8	3	16	2	16	5	9	1	22
	Set	(5.4)	(54.1)	(18.9)	(21.6)	(8.1)	(43.2)	(5.4)	(43.2)	(13.5)	(24.3)	(2.7)	(59.5)
All	Goals	13	100	46	31	22	89	17	61	20	68	7	94
	Set	(6.8)	(52.6)	(24.2)	(15.7)	(11.6)	(46.8)	(8.9)	(32.1)	(10.5)	(35.8)	(3.7)	(49.5)

Note. AN = anorexia nervosa, BN = bulimia nervosa, BED = binge eating disorder, OSFED = other specified feeding and eating disorder.



Early response to treatment seemed to be important. For 31 people with lived experience of an eating disorder who had goals “unmet” at the first (session 10) review, only 2 (6.5%) had goals met by the third (session 30) review. This is in comparison to the 63 people who had at least partly met goals by the first review. Of this cohort, 18 (28.6%) had fully met goals, no longer requiring treatment, by the third review. With a difference in proportions of 23% (RR 4.14, 95% CI = 1.09, 15.7) this was a statistically significant effect ($\chi^2 = 3.801$, $df = 1$, $p < .03$), and indicates early improvement was associated with a significantly greater likelihood of meeting goals at the third review.

Of note, for the 95 people who were assessed at third review for whom goal status was known, only one in five had fully met their goals. This points to the need for further care beyond 30 sessions. Lastly, significantly fewer people with anorexia nervosa had met their goals at the third review compared to people with other eating disorder diagnoses ($n = 95$, $\chi^2 = 4.723$, $df = 1$, $p = .03$, 12% versus 30%). In other words, at the third review significantly fewer people with anorexia nervosa had met their goals at that review compared to people with another eating disorder.

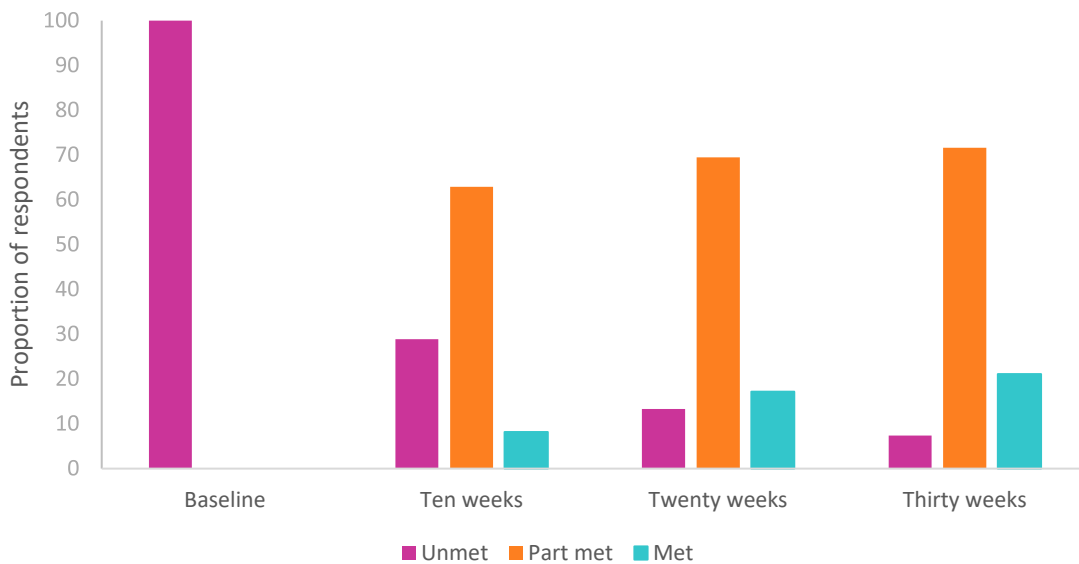
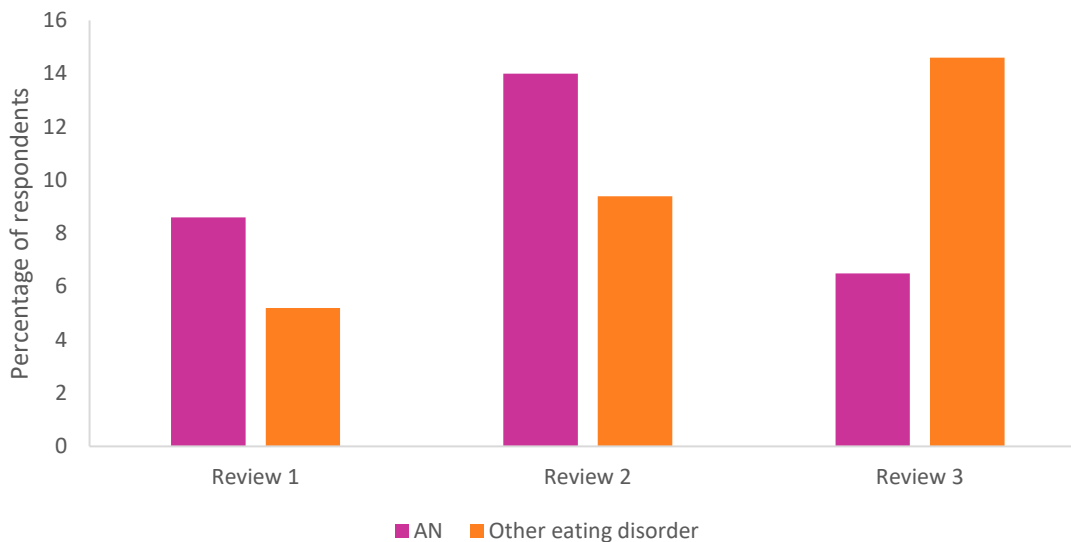


Figure 5.2. Proportion of people with lived experience of an eating disorder meeting their goals at the GP eating disorder treatment plan review



Note. AN = anorexia nervosa; other eating disorder = bulimia nervosa, binge eating disorder, and OSFED.

Figure 5.3. Percentage of goals fully met at thirty weeks by diagnostic group

It is important to note that where information on goals being met was recorded by GPs as unknown, we do not know if a person may have improved and thus not needed further care and/or review, or whether they had not improved. We would, however, expect (as we found) that the number of participants where goals were recorded as unknown would increase over time if people were meeting their goals.

Across various socioeconomic groups, there were no significant differences in whether people with lived experience of an eating disorder partly met or fully met their goals at the 30-week review (Table 5.4). Thus, a higher socioeconomic status does not suggest an advantage in people with lived experience of an eating disorder meeting their goals by the 30-session review time point ($\chi^2 = 5.647$, $df = 8$, $p = .687$).

Further supporting our hypotheses, as shown in Table 5.5, a substantial proportion ($n = 29$; 33%) of those who partly met or met their goals at the 30-session review were in the neither advantaged or disadvantaged socioeconomic group and almost a quarter ($n = 21$; 24.0%) who partly or fully met goals were in the very advantaged group. Tests of significance of the difference in goal attainment across socioeconomic groups were not completed due to the small numbers of participants within each group, which can result in misleading interpretation.

Table 5.4. Participant goals outcomes according to socioeconomic status of practice locations

	First review				Second review				Third review			
	<i>n (%)</i>											
	<i>Met</i>	<i>Part Met</i>	<i>Unmet</i>	<i>Unknown</i>	<i>Met</i>	<i>Part Met</i>	<i>Unmet</i>	<i>Unknown</i>	<i>Met</i>	<i>Part Met</i>	<i>Unmet</i>	<i>Unknown</i>
Very Disadvantaged	3 (13.6)	10 (45.5)	4 (18.2)	5 (22.7)	4 (18.2)	11 (50.0)	2 (9.1)	5 (22.7)	1 (4.5)	12 (54.5)	1 (4.5)	8 (36.4)
Moderately Disadvantaged	1 (4.5)	11 (47.8)	11 (47.8)	0 (0)	2 (8.7)	11 (47.8)	2 (8.7)	8 (34.8)	3 (13.0)	9 (39.1)	1 (4.3)	10 (43.5)
Neither Advantaged nor Disadvantaged	3 (6.5)	30 (65.2)	8 (17.4)	5 (10.9)	8 (17.4)	27 (58.7)	3 (6.5)	8 (17.4)	9 (19.6)	20 (43.5)	3 (6.5)	14 (30.4)
Moderately Advantaged	1 (2.0)	21 (42.0)	11 (22.0)	17 (34.0)	3 (6.0)	18 (36.0)	6 (12.0)	23 (46.0)	3 (6.0)	10 (20.0)	2 (4.0)	35 (70.0)
Very Advantaged	5 (10.4)	28 (58.3)	12 (25.0)	3 (6.3)	5 (10.4)	22 (45.8)	4 (8.3)	17 (35.4)	4 (8.3)	17 (35.4)	0 (0)	27 (56.3)

Note. Goals set at baseline.

Table 5.5. Trajectory of goals met from baseline to week 30 by socioeconomic status

		Very Disadvantaged	Moderately Disadvantaged	Neither Advantaged nor Disadvantaged	Moderately Advantaged	Very Advantaged	Total
Unmet	0.0	1	1	3	2	0	7
Partly Met	1.0	12	9	18	8	17	64
Met	2.0	1	3	9	3	4	20
Total		14	13	30	13	21	91

Note. 0.0 = unmet, 1.0 = partly met, 2.0 = met.

Outcomes: Eating disorder and general psychological symptoms

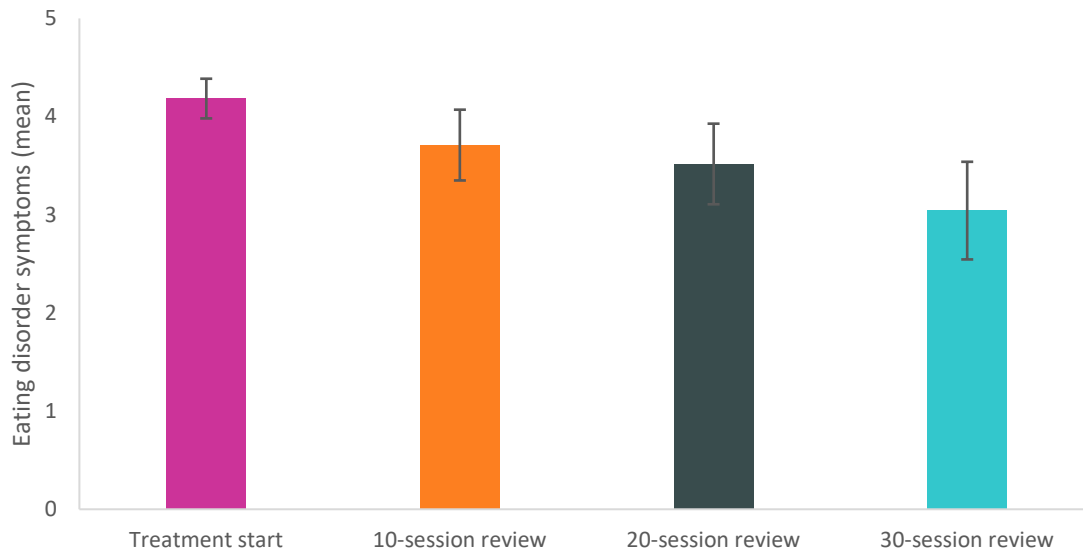
Levels of eating disorder symptoms at baseline and at each review point are shown in Table 5.6. Data are presented separately for eating disorder diagnostic groups and for the overall sample.

Table 5.6. Participant levels of eating disorder symptoms as measured by the EDE-Q over time

		Baseline	10 weeks	20 weeks	30 weeks
Anorexia nervosa	<i>N</i>	51	21	14	10
	<i>M</i>	4.31	3.87	3.79	3.17
	<i>SD</i>	1.29	1.22	1.06	1.10
Bulimia nervosa	<i>N</i>	19	5	4	4
	<i>M</i>	4.35	3.97	3.79	3.82
	<i>SD</i>	0.99	0.57	0.65	1.09
Binge eating disorder	<i>N</i>	23	5	3	4
	<i>M</i>	4.10	3.17	2.54	2.58
	<i>SD</i>	0.80	0.75	0.84	0.83
OSFED	<i>N</i>	28	5	5	4
	<i>M</i>	3.92	3.32	3.12	2.40
	<i>SD</i>	1.19	0.90	0.94	1.26
All	<i>N</i>	124	36	26	22
	<i>M</i>	4.18	3.71	3.52	3.04
	<i>SD</i>	1.14	1.07	1.01	1.21

Note. M = mean, SD = standard deviation.

A repeated measures ANOVA with a Greenhouse-Geisser correction found that the mean eating disorder symptom scores were statistically significantly different between time points ($F(1.792, 23.29) = 35.60, p < .001, \eta^2 = 0.73$). We observed a significant linear effect ($p < .001$) with a large effect size ($\eta^2 = 0.94$) evidencing decreasing eating disorder symptoms over time. Post hoc analysis with a Bonferroni adjustment revealed that eating disorder symptoms decreased significantly between every time point except baseline to first review ($p = .11$).



Note. Eating disorder symptom levels measured with the global score of the eating disorder examination questionnaire; error bars are 95% confidence intervals.

Figure 5.4 Eating Disorder Examination-Questionnaire global scores of all participants over time.

Levels of general psychological distress symptoms from baseline to 30-week review for each eating disorder diagnostic group and the sample overall are shown in Table 5.7.

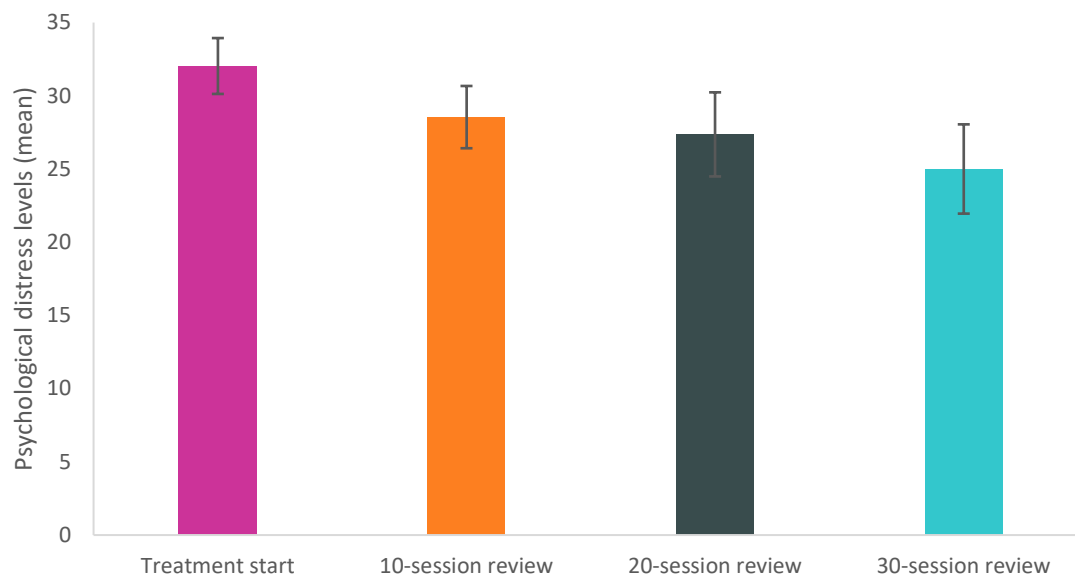
Table 5.7. Participant levels of general psychological symptoms (K-10) over time

		Baseline	10 weeks	20 weeks	30 weeks
Anorexia nervosa	<i>N</i>	24	13	8	6
	<i>M</i>	32.92	28.15	29.25	27.83
	<i>SD</i>	7.05	6.65	7.81	6.65
Bulimia nervosa	<i>N</i>	6	5	3	3
	<i>M</i>	34.50	35.20	33.00	26.33
	<i>SD</i>	6.28	3.56	2.65	6.66
Binge eating disorder	<i>N</i>	14	8	7	5
	<i>M</i>	31.29	24.87	24.43	20.80
	<i>SD</i>	8.27	5.30	5.68	3.96
OSFED	<i>N</i>	16	9	4	5
	<i>M</i>	30.44	28.67	24.50	25.00
	<i>SD</i>	7.62	4.89	3.11	7.18
All	<i>N</i>	60	35	22	19
	<i>M</i>	32.03	28.54	27.36	25.00
	<i>SD</i>	7.39	6.20	6.48	6.32

Note. OSFED = other specified feeding and eating disorder; M = mean, SD = standard deviation

A repeated measures ANOVA with a Greenhouse-Geisser correction found the mean psychological symptom scores significantly differed between time points ($F(2.14, 29.98) = 27.40, p < .001, \eta^2 = 0.97$). We observed a significant linear effect ($p < .001$) with a large effect size ($\eta^2 = 0.82$) observing that the scores consecutively decreased over time.

Post hoc analysis with a Bonferroni adjustment revealed that psychological symptom scores decreased significantly between every time point except second (20 session) to third (30 session) review ($p = .47$).



Note. Psychological distress symptom levels are measured with the Kessler psychological distress scale; error bars are 95% confidence intervals.


Figure 5.5. General psychological symptom scores of all participants over time.

Conclusions

Main findings

The aim of this study was to evaluate whether people who access Eating Disorders MBS item-services experience eating disorder symptom improvement compared to symptoms at referral. Overall, results showed eating disorder and general psychological (depression and anxiety) symptom improvements following the initiation of the EDP, as measured by the EDE-Q and K-10 between baseline and the next three follow-up appointments. A substantial proportion of people also met the EDP goals set at initiation of the EDP. This was found across all diagnostic and sociodemographic groups. Furthermore, early improvement (meeting goals or partly meeting goals after 10 sessions) was associated with a significantly greater likelihood of fully meeting goals after 30 sessions. However, for the 91 people who were assessed at third review, only one in five had fully met their goals pointing to the need for further care. Lastly, significantly fewer people with a diagnosis of anorexia nervosa had met their goals at the third review than people with a different eating disorder diagnosis, supporting the current recognition in the EDP for anorexia nervosa as the most severe of the eating disorders.

Most patients for whom data was reported by GPs had a diagnosis of anorexia nervosa, followed by OSFED, binge eating disorder, and bulimia nervosa. These data reflect the greater likelihood that people with anorexia nervosa may source treatment. This is due to several factors including the younger age at onset whereby people with lived experience of caring for someone with an eating disorder may be more actively involved in medical care of their loved ones and the greater visibility



of the physical consequences of the eating disorder, namely starvation. This is consistent with known selection bias in clinical samples (e.g., Berkson's bias⁵), whereby people with a diagnosis of anorexia nervosa are more prevalent in clinical samples due to higher acuity of illness. In the community, people with a diagnosis of anorexia nervosa represent a smaller proportion of people who are living with an eating disorder than in this study. Thus, the high representation of people with anorexia nervosa in this sample perhaps reflects the inclusion criteria of the Eating Disorders MBS items that has explicit focus on this condition and also higher awareness of anorexia nervosa than other eating disorders. As the prevalence of severe cases of other potentially eligible eating disorder diagnoses (e.g., bulimia nervosa, binge eating disorder, and OSFED with severity indicators) is currently unknown, it is difficult to comment on the proportion of individuals with these other diagnoses that *are versus should* be accessing the Eating Disorders MBS items and whether access to this initiative reflects unmet need for treatment of other eating disorders noted elsewhere (e.g., Hay¹).

It was interesting that there appeared to be an association between socioeconomic level and where outcomes were unknown. Specifically, in the group with the highest levels of socioeconomic advantage, GPs recorded the highest level of unknown outcomes and GPs in lower socioeconomic advantage locations were able to extract more outcome data for people with lived experience of an eating disorder. It is unclear whether this reflects better outcomes for the more advantaged, which was suggested by the data on meeting of goals, or the model of care in GP clinics. This contrasts the assumption that those in the least disadvantaged locations would have more missing data due to their care models, such as operating within a strict bulk billing 10-minute consultation model. It was also not surprising that there was missing outcome data for the measures of eating disorder symptoms and general psychological symptoms assessed by questionnaire. These are not a requirement at follow-up and not a requirement even at baseline for people with a diagnosis of anorexia nervosa. What was encouraging were the numbers who had completed questionnaire data which support the perceived value of recording such data.

Limitations of the data

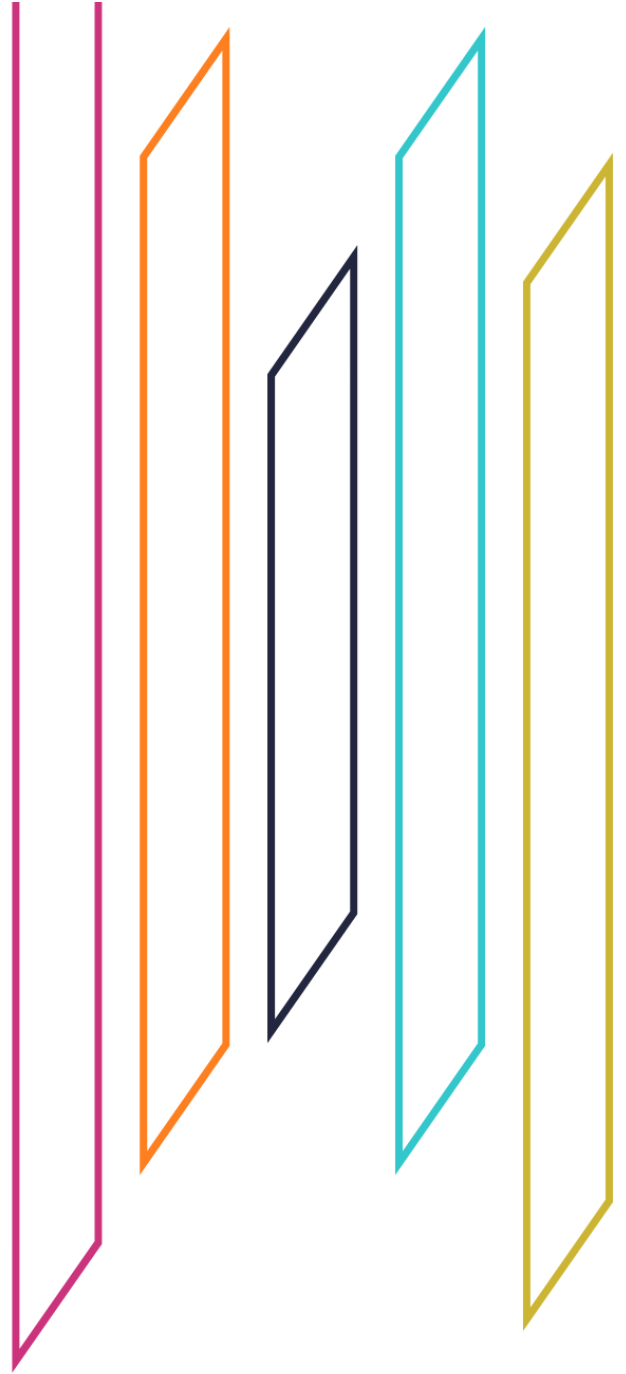
There are many limitations to the current study due to the nature of research derived from existing medical records. These include the potential lack of validated instruments or interviews to determine diagnosis, the selective nature of the GP reviews which may bias towards reporting on people with more favourable outcomes, and that it is unclear if a lack of data reflects a poorer outcome or better outcome, whereby people did not return for review as they perceived themselves to be improved. Due to the current framework around the completion of measures such as the EDE-Q, GPs may not have access to progressive scores on clinical measures as these are often completed with the patient's psychologist or psychiatrist. Nevertheless, this study adds real world data on prospectively and objectively assessed outcomes which complements the retrospective recollections and perceptions of outcomes from other survey data assessed within this evaluation.



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Chapter 6.
A community
survey on the
Eating Disorders
MBS items
(Study 6)





Chapter 6. A community survey on the Eating Disorders MBS items (Study 6)

Perspectives and experiences of people with lived experience of an eating disorder, people with lived experience of caring for someone with an eating disorder, and health professionals.

Introduction

To improve access to eating disorder treatment, following recommendations in 2018 by the independent clinician-led Medicare Benefits Schedule Review Taskforce ¹, the Australian Government added 64 new items to the Medicare Benefits Schedule (MBS) to support treatment for people experiencing an eating disorder. Comprising the Eating Disorder Treatment and Management Plan (EDP), these enabled unprecedented, specified access to additional rebated treatment sessions for persons in Australia with a serious and/or complex eating disorder. The items cover up to 40 psychological treatment sessions and up to 20 dietetic health sessions per 12-month period with the goal of supporting a model of best-practice evidence-based care for people with a diagnosis of anorexia nervosa and other eligible eating disorders (see Main Report, chapter 1 for full details).


Since their implementation in 2019, a comprehensive evaluation of the EDP has not been undertaken. The Australian Government Department of Health and Aged Care has now commissioned an independent evaluation to assess the objectives, access, utilisation, and effectiveness of the suite of Eating Disorders MBS items as well as the relationship between item use and other related MBS items. The present study is an account of the community survey data collected as part of the larger Eating Disorders MBS Evaluation project. We sought to explore perspectives of and experiences with the items from three key stakeholder groups, including people with a lived experience of an eating disorder, people with a lived experience of caring for someone with an eating disorder, and health professionals with experience using the Eating Disorders MBS items, using a mixed-methods approach. The aims of this report are to explore awareness and use of the Eating Disorders MBS items, perceptions of their helpfulness, the processes involved in using the items, and views on the requirements of the EDP.

Methods

Ethics approval was obtained from the La Trobe University Human Research Ethics Committee (Project ID: HEC23131, HEC23130). Participants were informed of the purpose and nature of the study prior to consenting to participate.

Participants

The study was advertised through researchers' personal and professional networks, the research team's social media accounts (e.g., X [Twitter], Facebook, Instagram, LinkedIn), paid social media advertising via Meta, and state and national mental health and eating disorder community networks (e.g., Eating Disorders Victoria, Butterfly Foundation, Eating Disorders Families Australia, Tandem Carers) from August to November 2023. Health professionals were further targeted through professional membership organisations (e.g., Australia & New Zealand Academy for Eating Disorders



[ANZAED], Dietitians Australia) and databases of clinicians providing eating disorder treatment (ANZAED Credentialing Program). Participants were required to be 16 years or older and identify as a person with either lived experience of an eating disorder, lived experience of caring for someone with an eating disorder, or a health professional with experience using the Eating Disorders MBS items with single or multiple roles across preparation of the eating disorder plan, providing psychological treatment or dietetic health services, or reviewing treatment progress under the plan.

Survey Instruments

Three separate surveys were developed to capture the unique experiences of people with lived experience of eating disorders, people caring for someone with an eating disorder, and health professionals with experience using the Eating Disorders MBS items. Originally developed by the study lead based on earlier pilot work and consultations with key stakeholder organisations, the surveys underwent several iterations, integrating feedback from study collaborators and a lived experience consultant. The final version of the surveys is presented in Appendix 6.1 – 6.3, including a visualisation of the pathways for each survey in Appendix 6.4 – 6.6.

The final surveys for both groups of participants with personal and caring lived experience of eating disorders comprised sections of questions relating to either treatment accessed via the EDP, treatment accessed via other means, seeking treatment under the EDP, seeking treatment via other means, and having not received any treatment at all. The latter section was included to provide a means of comparison. The health professional survey comprised questions relating to experience in either preparing EDPs, providing treatment under the EDP, or reviewing progress under EDPs.

Procedure

Potential participants were provided with a link to the online survey and presented with the Participant Information and Consent Form to provide informed consent. To maintain high data quality, participants were required to complete a Captcha and several simple arithmetic questions presented as images throughout the survey, and if they failed, they were exited from the online survey.

Participants then responded to demographic characteristics questions, including age, gender, sexuality, postcode, country of birth, and indigenous origin. People with lived experience of an eating disorder and lived experience of caring for someone with an eating disorder were also asked to provide information about their experience of the eating disorder, including any diagnosis and length of time for which they (or the person they care for) has had an eating disorder.

Those who participated as health professionals also responded to several questions relating to their profession, including how long they have been practicing in their current profession, how many years' experience they have working with people with eating disorders, the most common eating disorder diagnosis of the treatment seeking people they work with, and if they are an ANZAED Eating Disorder Credentialed Clinician. Participants next responded to questions relating to eating disorder treatment and the Eating Disorders MBS items unique to their experience with the items (i.e., role of treatment user, supporter, or treatment provider). Participants taking part as health professionals with experience with the Eating Disorders MBS items were given the opportunity to receive a \$AU20 (~\$US30) gift card in recognition of their specialist use of the EDP.

Statistical Analysis

Statistical analyses were performed using SPSS Version 27. Descriptive statistics were calculated including means and standard deviations, and frequencies and percentages for participant characteristics and survey data. Differences in participant characteristics between (e.g., people with lived experience of an eating disorder, people with lived experience of caring for someone with an eating disorder) and within cohorts (e.g., health professionals who prepare EDPs versus review EDPs) were examined via *t*-tests or ANOVA for continuous variables and chi-square tests for categorical variables. Statistical significance level was set at $p < .05$.

We examined complete versus incomplete survey data. As shown in Table 6.1, there were no significant differences across sociodemographic characteristics of participants who progressed to the end page of the survey versus those who did not, across all subgroups.

Table 6.1. Participant survey drop-out rates across subgroups.

	People with lived experience of an eating disorder	People with lived experience of caring for someone with an eating disorder	Health professionals
Completion % (<i>n</i>)*	81.6 (412)	69.1 (123)	68.4 (182)
Age [^]	$t(501) = -1.1, p = .273$	$t(175) = 1.6, p = .113$	$t(260) = 0.2, p = .813$
Gender [^]	$F(1, 497) = 0.8, p = .387$	$F(1, 174) = 0.004, p = .948$	$F(1, 260) = 2.3, p = .130$
State [^]	$F(1, 478) = 0.6, p = .448$	$F(1, 167) = 0.6, p = .436$	$F(1, 255) = 0.02, p = .901$
Rurality [^]	$F(1, 478) = 1.7, p = .199$	$F(1, 167) = 2.5, p = .119$	$F(1, 255) = 0.4, p = .521$
IRSAD [^]	$t(478) = 1.4, p = .151$	$t(167) = -1.4, p = .163$	$t(250) = 1.6, p = .116$
Country [^]	$F(1, 502) = 0.2, p = .638$	$F(1, 176) = 0.02, p = .885$	$F(1, 260) = 0.2, p = .678$

Note. * measured from the beginning of the first page of survey to the beginning of the final page of survey presented to the participant; [^] test statistic measuring differences between completers and non-completers on demographic outcome. * $p < .05$.

Results

Findings from people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder

Participant sociodemographic characteristics

A total of 505 people with lived experience of an eating disorder and 178 people with lived experience of caring for someone with an eating disorder took part in the online survey. Most participants were female-identifying, born in Australia, on average resided in an advantaged socioeconomic metropolitan area, and were of neither Aboriginal nor Torres Strait Islander origin. The most common eating disorder diagnosis across both subgroups of participants was anorexia nervosa (53.3 – 68.9%). Table 6.2 outlines the sociodemographic characteristics of people in these groups.

Table 6.2. Sociodemographic characteristics of people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder

	People with lived experience of an eating disorder	People with lived experience of caring for someone with an eating disorder
Total	505	178
Gender (<i>n</i> [%])		
Female	432 (86.6)	163 (92.6)
Male	19 (3.8)	10 (5.7)
Non-binary*	30 (6.0)	3 (1.7)
Other identified gender^	18 (3.6)	0 (0)
Age (<i>M</i> [<i>SD</i>])	28.9 (10.3)	48.9 (9.6)
Country of Birth (<i>n</i> [%])		
Australia	434 (86.1)	146 (82.0)
England	21 (4.2)	11 (6.2)
India	1 (0.2)	1 (0.6)
China	0 (0)	1 (0.6)
New Zealand	7 (1.4)	2 (1.1)
Philippines	1 (0.2)	0 (0)
Malaysia	2 (0.4)	0 (0)
Italy	0 (0)	1 (0.6)
Other	38 (7.5)	16 (9.0)
Location (<i>n</i> [%])		
Major cities	400 (83.3)	138 (81.7)
Inner regional	61 (12.7)	25 (14.8)
Outer regional	14 (2.9)	6 (3.6)
Remote	4 (0.8)	0 (0)
Very remote	1 (0.2)	0 (0)
IRSAD (<i>M</i> [<i>SD</i>])	7.6 (2.7)	7.5 (2.7)
Indigenous Status (<i>n</i> [%])		
Aboriginal	13 (2.6)	3 (1.7)
Torres Strait Islander	0 (0)	0 (0)
Both	0 (0)	0 (0)
Neither	489 (97.4)	174 (98.3)
Eating Disorder Diagnosis (<i>n</i> [%])		
Anorexia nervosa	269 (53.3)	122 (68.9)
Bulimia nervosa	53 (10.3)	8 (4.5)
Binge eating disorder	38 (7.5)	6 (3.4)
Atypical anorexia nervosa	87 (17.2)	14 (7.9)
Subthreshold bulimia nervosa	0 (0)	0 (0)
Subthreshold binge eating disorder	0 (0)	0 (0)
Purging disorder	2 (0.4)	0 (0)
Night eating syndrome	0 (0)	0 (0)

	People with lived experience of an eating disorder	People with lived experience of caring for someone with an eating disorder
OSFED	15 (3.0)	1 (0.6)
ARFID	28 (5.5)	20 (11.3)
Other	6 (1.2)	4 (2.3)
Unsure	7 (1.4)	2 (1.1)

Note. IRSAD = Index of Relative Socio-economic Advantage and Disadvantage (range 1 – 10, with 1 = the most disadvantaged and 10 = the most advantaged); OSFED = other specified feeding and eating disorder; ARFID = avoidant/restrictive food intake disorder; * self-identified as non-binary in open-text responses; ^ due to the small number of participants identifying as a gender other than female, non-binary, or male, all responses were not included in the table. For participants with lived experience of an eating disorder, gender responses in this grouping were genderqueer ($n = 2$), trans male ($n = 3$), transgender female ($n = 1$), trans non-binary ($n = 2$), no gender ($n = 2$), bigender ($n = 1$), unsure ($n = 1$), trans non-binary woman ($n = 1$), trans masc non-binary ($n = 3$), trans masc ($n = 2$).

As demonstrated in Table 6.3, people with lived experience of caring for someone with an eating disorder comprised primarily of parents/guardians of daughters aged between 14 – 25 years old.

Table 6.3. Sociodemographic characteristics related to the caregiving relationship

	<i>n</i> (%)	
Caring history (<i>n</i> [%])	The person has an eating disorder now	139 (78.5)
	The person had an eating disorder in the past	38 (21.5)
Carer relationship (<i>n</i> [%])	Parent/guardian	146 (82.0)
	Sibling	6 (3.4)
	Child	9 (5.1)
	Uncle/Aunt	1 (0.7)
	Partner/Spouse	11 (6.2)
	Friend	4 (2.2)
	Other	1 (0.6)
Gender of the person they support (<i>n</i> [%])	Female	151 (88.3)
	Male	15 (8.8)
	Non-binary*	3 (1.8)
	Transmasculine	2 (1.2)
Age (years) of the person who has an eating disorder now (<i>n</i> [%])	< 10	6 (4.3)
	10-13	12 (8.6)
	14-17	53 (38.1)
	18-25	49 (35.3)
	26-30	8 (5.8)
	31-35	4 (2.9)
	36-40	1 (0.7)
	41-45	0 (0)
	46-50	1 (0.7)
	51-55	2 (1.4)
56-60	1 (0.7)	



		<i>n</i> (%)
	61-65	0 (0)
	66-70	1 (0.7)
	> 70	1 (0.7)
Age (years) of the person	< 10	1 (2.7)
who had an eating disorder	10-13	6 (16.2)
(in the past) when they had	14-17	28 (75.7)
the eating disorder (<i>n</i> [%]) [^]	18-25	11 (29.7)
	26-30	0 (0)
	31-35	0 (0)
	36-40	0 (0)
	41-45	0 (0)
	46-50	0 (0)
	51-55	1 (2.7)
	56-60	0 (0)
	61-65	0 (0)
	66-70	0 (0)
	> 70	0 (0)

Note. * self-identified as non-binary in open-text responses; ^ respondents could select multiple options.

Uptake of treatment via the Eating Disorder Plan

Eighty-four percent (*n* = 425) of participants with lived experience of an eating disorder indicated they had received treatment for their eating disorder now or in the past, with 68.0% (*n* = 289) of those receiving treatment under the EDP and 32.0% (*n* = 136) of those who had received treatment having accessed this via other means (e.g., public health services, private health cover). A further 8.7% (*n* = 44) of the respondents with lived experience of an eating disorder were trying to seek treatment for their eating disorder symptoms at the time of taking part in the online survey and 6.5% (*n* = 33) had not sought nor received treatment at all. As shown in Figure 6.1, similar rates were reported among people with lived experience of caring for someone with an eating disorder with 91.0% (*n* = 162) of the people they support receiving treatment for their eating disorder now or in the past, 6.7% (*n* = 12) trying to seek treatment at present, and 2.2% (*n* = 4) had not sought nor received eating disorder treatment at all.

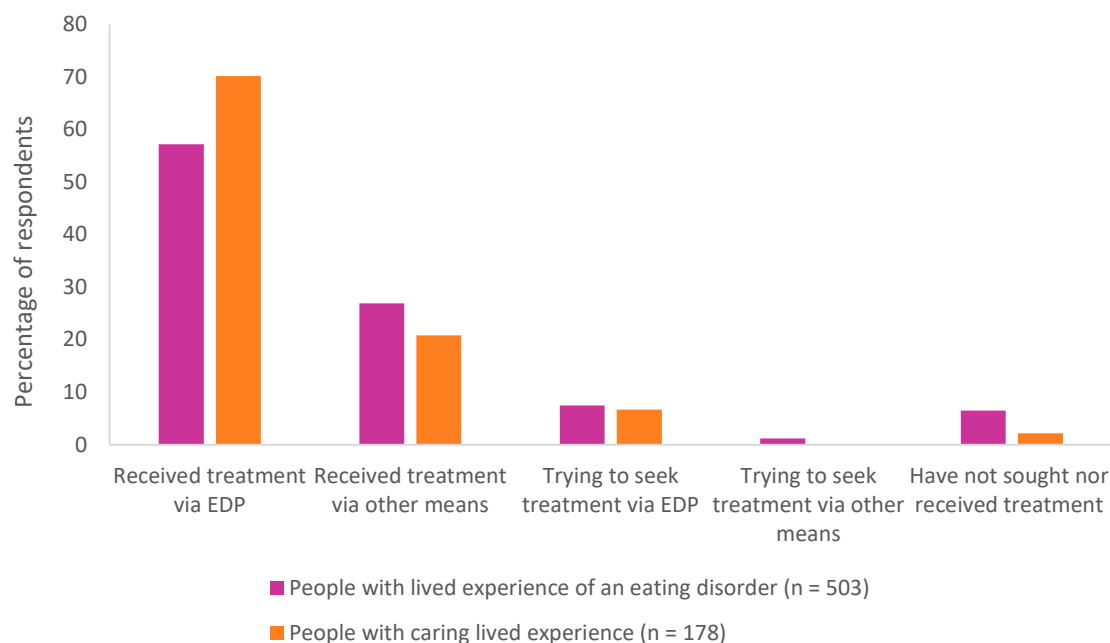


Figure 6.1. Proportion of people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder seeking or receiving eating disorder treatment

Most participants with a current or past eating disorder indicated experiencing eating disorder symptoms for several years before first trying to receive treatment. As shown in Table 6.4, participants who received treatment via the EDP commonly waited more than 10 years prior to first seeking treatment under this initiative, compared to participants who accessed treatment via other means who most commonly waited 6-10 years. A chi-square test of independence showed there was a significant relationship between length of eating disorder symptoms prior to seeking treatment across subgroups of people with lived experience of an eating disorder, $\chi^2 (1, N = 68) = 92.3, p = .027$.

Table 6.4. Duration of eating disorder symptoms prior to seeking treatment across subgroups

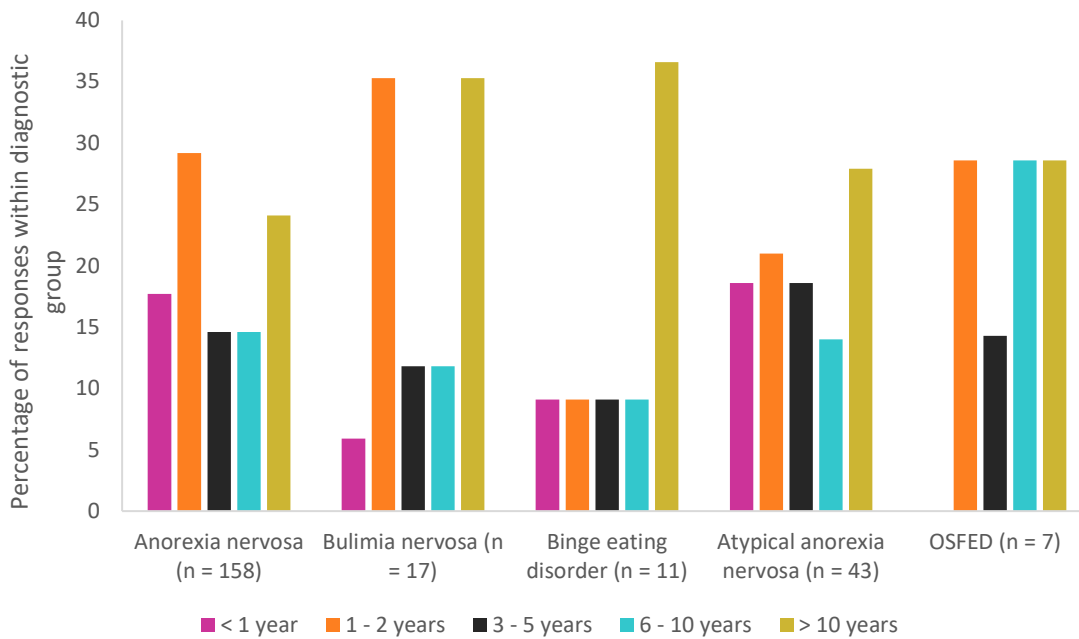
	Treatment received via EDP (n = 247)	Treatment received via other means (n = 108)	Seeking treatment via EDP (n = 37)	Seeking treatment via other means (n = 4)	Not sought or received treatment (n = 29)
1 month or less	4 (1.4)	0 (0)	1 (2.7)	0 (0)	0 (0)
2 months	1 (0.4)	1 (0.9)	0 (0)	0 (0)	1 (3.4)
3 months	6 (2.4)	3 (2.8)	0 (0)	0 (0)	0 (0)
4 months	1 (0.4)	0 (0)	0 (0)	0 (0)	0 (0)
5 months	3 (1.2)	2 (1.9)	0 (0)	0 (0)	0 (0)
6 months	9 (3.6)	14 (13.0)	0 (0)	0 (0)	0 (0)
7 months	4 (1.6)	1 (0.9)	0 (0)	0 (0)	0 (0)
8 months	2 (0.8)	2 (1.9)	1 (2.7)	0 (0)	0 (0)
9 months	0 (0)	0 (0)	1 (2.7)	0 (0)	0 (0)
10 months	7 (2.8)	0 (0)	2 (5.4)	0 (0)	0 (0)

	Treatment received via EDP (<i>n</i> = 247)	Treatment received via other means (<i>n</i> = 108)	Seeking treatment via EDP (<i>n</i> = 37)	Seeking treatment via other means (<i>n</i> = 4)	Not sought or received treatment (<i>n</i> = 29)
11 months	1 (0.4)	1 (0.9)	0 (0)	0 (0)	0 (0)
1 year	42 (17.0)	17 (15.7)	6 (16.2)	1 (25.0)	3 (10.3)
2 years	27 (10.9)	12 (11.1)	3 (8.1)	0 (0)	4 (13.8)
3 years	7 (2.8)	11 (10.2)	5 (13.5)	1 (25.0)	4 (13.8)
4 years	8 (3.2)	5 (4.6)	2 (5.4)	0 (0)	5 (17.2)
5 years	23 (9.3)	10 (9.3)	3 (8.1)	0 (0)	0 (0)
6-10 years	35 (14.2)	18 (16.7)	8 (21.6)	1 (25.0)	8 (27.6)
> 10 years	67 (27.1)	11 (10.2)	5 (13.5)	1 (25.0)	4 (13.8)

Note. *n* (%).

In further support of this, people with lived experience of an eating disorder commonly experienced eating disorder symptoms for more than one year prior to first seeking treatment via the EDP, independent of their eating disorder diagnosis (see Figure 6.2).

People who received treatment under the EDP indicated they received an average of 42.7 (*SD* = 40.9) psychological treatment sessions and 16.9 (*SD* = 18.7) dietetic health sessions. These averages are likely inflated by a small proportion of participants receiving a very large number of sessions; the median number of psychological treatment sessions received was 26 and the median number of dietetic health sessions received was 10. A small number reported receiving no psychological treatment (*n* = 7, 2.5%) or dietetic health sessions (*n* = 30, 10.8%). Similarly, people with lived experience of caring for someone with an eating disorder reported that the person they cared for received more psychological treatment sessions (*M* = 32.6, *SD* = 30.0, *Md* = 24.5) than dietetic health sessions (*M* = 13.7, *SD* = 19.6, *Md* = 6.5). Among respondents with lived experience of caring for someone with an eating disorder, a small proportion of those they cared for had received no psychological treatment (*n* = 5, 4.2%) or dietetic health sessions (*n* = 13, 11.6%) while under the EDP.



Note. Respondents with ARFID (n = 9), other (n = 1), or unsure (n = 7) diagnoses not included.

Figure 6.2. Length of eating disorder symptoms experienced by the person with an eating disorder prior to seeking treatment via the EDP

Perceptions of health professionals' awareness of the Eating Disorder Plan

Most people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder indicated that when they or the person they support first sought help, the extent to which GPs or other health professionals were informed about the availability of additional sessions for eating disorder treatment under the EDP was variable (see Figure 6.3). A chi-square test of independence showed no significant differences between the lived experience perspectives in perceptions of the level of knowledge of the GP or other health professionals from which the respondent first sought help about treatment under the EDP, $X^2(4, N = 394) = 4.4, p = .353$.

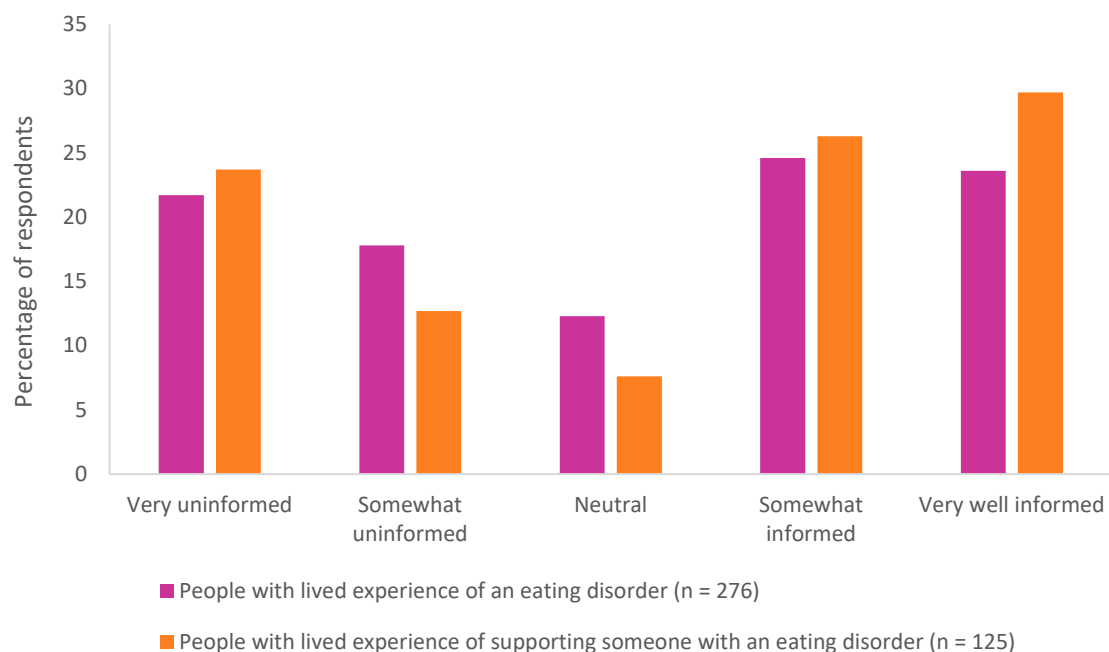


Figure 6.3. People with lived experience of an eating disorder and people with a lived experience of caring for someone with an eating disorder perspectives of GP and other health professionals' knowledge about the availability of additional sessions for eating disorder treatment under the EDP

Use of Eating Disorders MBS items

Once referral was provided by a GP or other health professional for treatment under the EDP, most people with lived experience of an eating disorder received treatment sessions as initially planned, as shown in Table 6.5. In responses from both people with lived eating disorder experience and people who care for those with an eating disorder, a lower proportion of people receive treatment as initially planned when accessing via other means, with a moderate proportion receiving no treatment at all. A chi-square test of independence showed there was a significant association between whether treatment was received as planned and means of treatment, $\chi^2(4, N = 397) = 25.0, p < .001$.

Table 6.5. Perspectives of people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder on receiving treatment as planned via the EDP and other means

		Received treatment as planned	Received fewer psychological sessions	Received fewer dietetic sessions	Received no treatment at all
		<i>n</i> yes (%)	<i>n</i> (%)	<i>n</i> (%)	<i>n</i> (%)
People with lived experience of an eating disorder	Treatment via the EDP (<i>n</i> = 276)	224 (81.2)	25 (9.1)	25 (9.1)	2 (0.7)
	Treatment via other means (<i>n</i> = 123)	56 (45.5)	27 (22.0)	6 (4.9)	34 (27.6)

People with a lived experience of caring for someone with an eating disorder	Treatment via the EDP (<i>n</i> = 119)	102 (85.7)	8 (6.7)	7 (5.9)	2 (1.7)
	Treatment via other means (<i>n</i> = 35)	17 (48.6)	12 (34.3)*		6 (17.1)

Note. * received fewer sessions (combined psychological and dietetic sessions) than planned. In the survey of treatment via other means, people who care for someone with an eating disorder were asked about treatment sessions generally, rather than separately for psychological and dietetic sessions.

Among the relatively small number of people with lived experience of an eating disorder who did not receive treatment as initially planned via the EDP or other means, many indicated this was because they could not afford the treatment (gap) fees (35.8 – 49.0%; see Table 6.6). Among people with lived experience of caring for someone with an eating disorder who received treatment via the EDP, most indicated that treatment was not received as initially planned because they or the person they care for did not like the health professional’s manner or approach. People with lived experience of caring for someone with an eating disorder who received treatment via means other than the EDP indicated the most common reason that treatment did not proceed as planned was because the sessions were unhelpful (66.6%).

Table 6.6. Perspectives of top contributing factors to not receiving treatment as planned

	People with lived experience of an eating disorder (<i>n</i> = 118)		People with lived experience of caring for someone with an eating disorder (<i>n</i> = 33)	
	Treatment via EDP (<i>n</i> = 51)	Treatment via other means (<i>n</i> = 67)	Treatment via EDP (<i>n</i> = 16)	Treatment via other means (<i>n</i> = 14-17)
	<i>n</i> (%)	<i>n</i> (%)	<i>n</i> (%)	<i>n</i> (%)
Could not afford the gap fees	25 (49.0)	24 (35.8)	6 (37.5)	7 (46.7)
Could not make the time to attend the sessions around other commitments	6 (11.8)	6 (9.0)	1 (6.3)	7 (43.8)
Could not travel to where the sessions were located	5 (9.8)	3 (4.5)	4 (25.0)	4 (26.7)
Could not access telehealth sessions due to poor internet or not having access to a device	0 (0)	1 (1.5)	0 (0)	3 (20.0)
Did not believe that they needed the recommended treatment	10 (19.6)	14 (20.9)	2 (12.5)	3 (20.0)
Could not get a review at the right time to get access to further sessions	5 (9.8)	-	2 (12.5)	5 (33.3)
Access to further treatment was not recommended at the mid-treatment review	1 (2.0)	-	0 (0)	1 (7.1)
Did not find the sessions helpful/were unhelpful	24 (47.1)	16 (23.9)	7 (43.8)	10 (66.7)

Did not like the health professional's manner or approach	20 (39.2)	23 (34.3)	9 (56.3)	7 (43.8)
Had to wait too long for sessions and felt discouraged about treatment	19 (37.3)	11 (16.4)	8 (50.0)	8 (50.0)
Chose to access treatment or support another way	5 (9.8)	10 (14.9)	6 (40.0)	9 (52.9)

Note. Respondents could select more than one option.

Once referral was provided by a GP or other health professional, most people with lived experience of an eating disorder received psychological treatment sessions, dietetic health services, and a review with a GP or other medical practitioner. As shown in Figure 6.4, access to eating disorder treatment was independent of diagnosis, however fewer than half of people with a diagnosis of bulimia nervosa or binge eating disorder received a psychiatrist or paediatrician review.

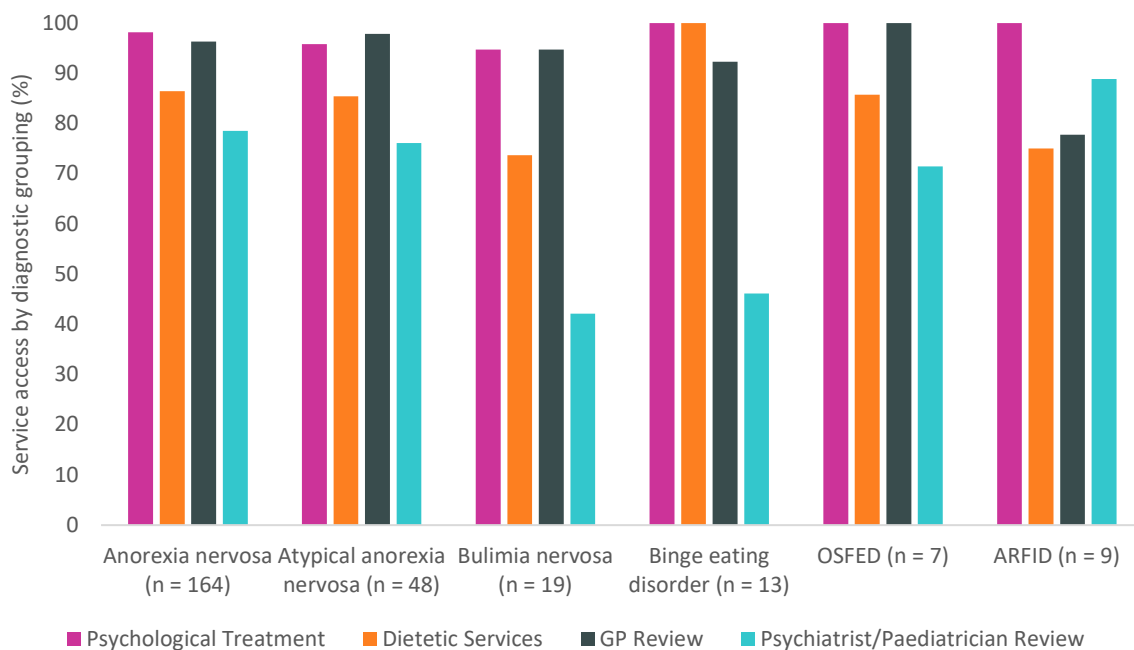


Figure 6.4. Access to EDP services according to eating disorder diagnosis

Most people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder indicated that they or the person they support waited a suitable amount of time to receive psychological treatment sessions, dietetic health services, and a psychiatrist/paediatrician review. However, as shown in Table 6.7, a moderate proportion of respondents felt they waited a little or much too long for psychological treatment sessions (35.6 – 51.8%) and dietetic health sessions (27.7 – 28.1%). Feeling that they waited a little or much too long for sessions was more common regarding the specialist review session (48.8 – 50.0%).

Table 6.7. Perspectives from people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder on wait times to receive psychological treatment sessions, dietetic health services, and a psychiatrist/paediatrician review

	A suitable amount of time	A little too long	Much too long	Not applicable
Psychological treatment sessions				
People with lived experience of an eating disorder (<i>n</i> = 270)	164 (60.7)	58 (21.5)	38 (14.1)	10 (3.7)
People with lived experience of caring for someone with an eating disorder (<i>n</i> = 114)	52 (45.6)	32 (28.1)	27 (23.7)	3 (2.6)
Dietetic health sessions				
People with lived experience of an eating disorder (<i>n</i> = 264)	157 (59.5)	43 (16.3)	30 (11.4)	34 (12.9)
People with lived experience of caring for someone with an eating disorder (<i>n</i> = 114)	60 (52.6)	18 (15.8)	14 (12.3)	22 (19.3)
Psychiatrist or paediatrician review				
People with lived experience of an eating disorder (<i>n</i> = 166)	85 (51.2)	48 (28.9)	33 (19.9)	0 (0)
People with lived experience of caring for someone with an eating disorder (<i>n</i> = 74)	37 (50.0)	20 (27.0)	17 (23.0)	0 (0)

Note. *n* (%).

As shown in Figure 6.5, when asked about the cost of treatment accessed via the EDP, people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder most frequently agreed that they or the person they support paid a fee that was too expensive.

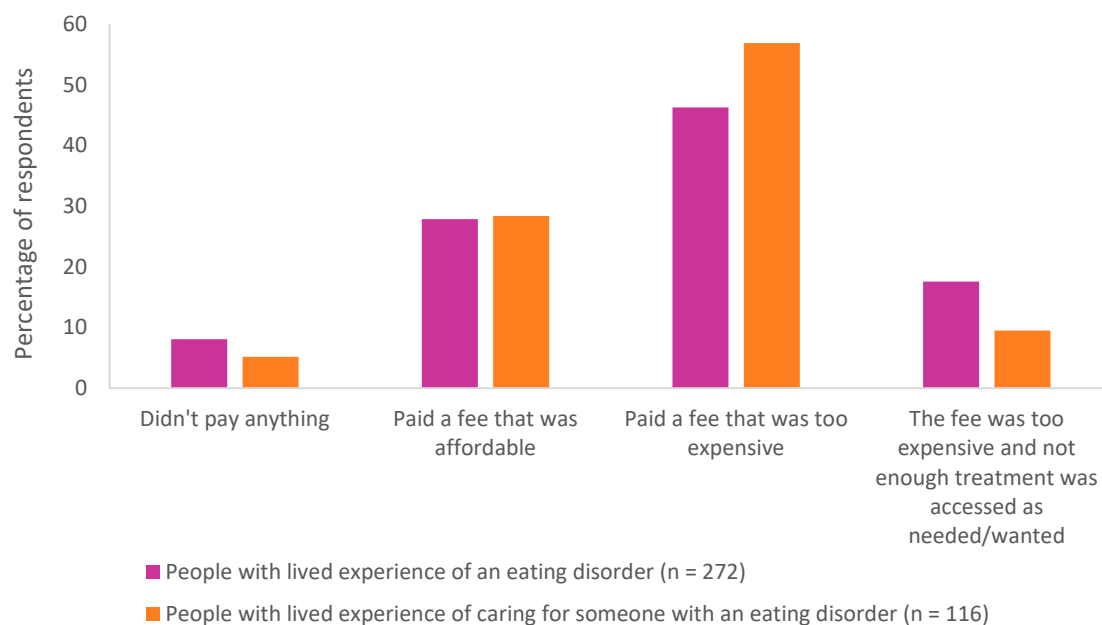


Figure 6.5. Perspectives of people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder on the cost of treatment accessed via the EDP

Regarding the importance of having access to psychological treatment sessions, dietetic health services, GP review, and psychiatrist/paediatrician review sessions, most people with lived experience of an eating disorder agreed it is important (moderately to very) for their eating disorder treatment to have access to all of these components of care. As shown in Table 6.8, similar perspectives were reported among people with lived experience of caring for someone with an eating disorder.

Among people with lived experience of an eating disorder, a series of Mann-Whitney *U* Tests found that those who received treatment under the EDP rated the importance of access to psychological treatment sessions, $z = -3.4, p < .001, d = -0.2$ and dietetic health services, $z = -2.3, p = .021, d = -0.1$ significantly higher than people who received treatment via other means. In contrast, people who received treatment by other means rated reviews by a psychiatrist or paediatrician as significantly more important to access than did people who received treatment under the EDP, $z = 2.2, p = .028, d = 0.1$. Effects were small. No difference in ratings of importance of access to GP review sessions was observed between people who received treatment via the EDP or via other means, $z = -0.7, p = .503, d = -0.03$.

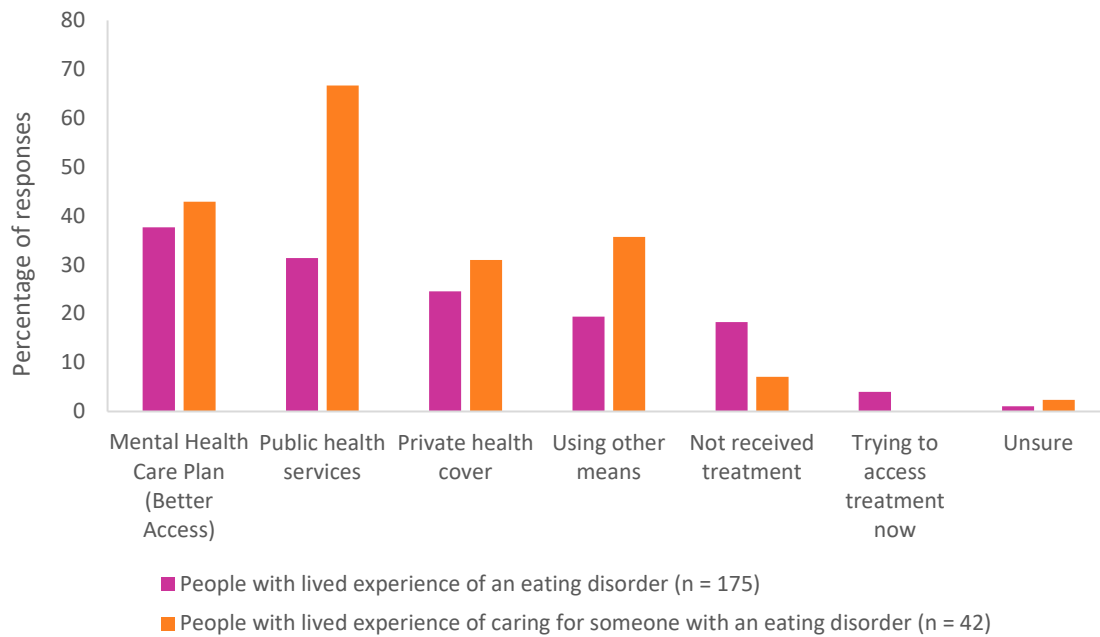
Among people with lived experience of caring for someone with an eating disorder, there were no significant differences in ratings of the importance of access to psychological treatment sessions, $z = 1.4, p = .150, d = 0.1$, dietetic health services, $z = -0.4, p = .698, d = -0.03$, GP reviews $z = 1.3, p = .220, d = 0.1$, or psychiatrist/paediatrician reviews, $z = -1.3, p = .203, d = -0.1$.

Table 6.8. Importance of access to eating disorder treatment from perspectives of people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder

	People with lived experience of an eating disorder		People with lived experience of caring for someone with an eating disorder	
	Treatment via EDP	Treatment via other means	Treatment via EDP	Treatment via other means
Access to psychological treatment sessions				
Not at all important	4 (1.8)	3 (2.5)	0 (0)	0 (0)
Marginally important	4 (1.4)	2 (1.7)	2 (1.7)	0 (0)
Somewhat important	7 (2.5)	7 (5.8)	3 (2.5)	0 (0)
Moderately important	10 (3.6)	15 (12.4)	8 (6.7)	1 (2.9)
Very important	250 (90.6)	94 (77.7)	106 (89.1)	33 (97.1)
Access to dietetic health services				
Not at all important	13 (4.7)	13 (10.9)	1 (0.8)	0 (0)
Marginally important	30 (10.9)	11 (9.2)	5 (4.2)	1 (2.9)
Somewhat important	48 (17.5)	24 (20.2)	14 (11.9)	4 (11.8)
Moderately important	41 (15.0)	26 (21.8)	12 (10.2)	6 (17.6)
Very important	142 (51.8)	45 (37.8)	86 (72.9)	23 (67.6)
Access to GP review				
Not at all important	20 (7.4)	7 (5.8)	3 (2.5)	0 (0)
Marginally important	27 (9.9)	15 (12.4)	5 (4.2)	0 (0)
Somewhat important	54 (19.9)	25 (20.7)	9 (7.6)	2 (5.9)
Moderately important	58 (21.3)	31 (25.6)	11 (9.2)	3 (8.8)
Very important	113 (41.5)	43 (25.5)	91 (76.5)	29 (85.3)
Access to psychiatrist/paediatrician review				
Not at all important	57 (21.0)	18 (15.0)	3 (2.6)	3 (8.8)
Marginally important	48 (17.6)	23 (19.2)	3 (2.6)	3 (8.8)
Somewhat important	54 (19.9)	15 (12.5)	14 (12.2)	4 (11.8)
Moderately important	40 (14.7)	15 (12.5)	14 (12.2)	3 (8.8)
Very important	73 (26.8)	49 (40.8)	81 (70.4)	21 (61.8)

Note. n (%).

Of the participants with lived eating disorder experience who had not received treatment via the EDP, most who had sought treatment had done so via the Mental Health Treatment Plan (provided through the Better Access initiative), followed by public health services. As shown in Figure 6.6, people with lived experience of caring for someone with an eating disorder indicated that most people they care for who had accessed treatment via means other than the EDP had done so via public health services.



Note. Respondents could select more than one option.

Figure 6.6. Eating disorder services received via means other than the EDP

Reasons for not accessing treatment via the EDP or other means were explored. As shown in Table 6.9, most people with lived experience of an eating disorder who had not yet been able to start eating disorder treatment through the EDP indicated this was because they did not think that their eating concerns were serious enough to require eating disorder specific treatment through the EDP.

Table 6.9. Reasons people with lived experience of an eating disorder had not yet accessed eating disorder treatment

	Trying to seek EDP (n = 38)	Trying to seek other treatment (n = 6)	Not received treatment (n = 32)
	n (%)	n (%)	n (%)
Only recently became aware of having an eating disorder	9 (23.7)	0 (0)	4 (12.5)
Did not know treatment was available for the type of problem I have	11 (28.9)	2 (33.3)	5 (15.6)
Did not know where to go to get treatment	15 (39.5)	2 (33.3)	12 (37.5)
Could not get an appointment with a doctor	3 (7.9)	1 (16.7)	0 (0)
Could not find a doctor who was knowledgeable about eating disorders	15 (39.5)	2 (33.3)	0 (0)
The doctor could not find a mental health professional or dietitian to refer me to	7 (18.4)	0 (0)	0 (0)
Could not afford to pay for treatment	21 (55.3)	3 (50.0)	15 (46.9)

	Trying to seek EDP (<i>n</i> = 38)	Trying to seek other treatment (<i>n</i> = 6)	Not received treatment (<i>n</i> = 32)
	<i>n</i> (%)	<i>n</i> (%)	<i>n</i> (%)
Waiting lists for access to treatment are too long	18 (47.2)	1 (16.7)	4 (12.5)
Did not think that their eating concerns were serious enough to require eating disorder specific treatment through the EDP	30 (78.9)	6 (100.0)	23 (71.9)
Not ready to seek treatment	15 (39.5)	5 (83.3)	18 (56.3)
Feared stigma or discrimination from seeking treatment	14 (36.8)	3 (50.0)	18 (56.3)
Had a previous negative experience in the health care system	17 (44.4)	1 (16.7)	12 (37.5)
Preferred to manage eating concerns on their own	9 (23.7)	3 (50.0)	20 (62.5)
Preferred to use social supports	6 (15.8)	2 (33.3)	3 (9.4)

Note. Respondents could select more than one option.

Access to sessions for people with lived experience of caring for someone with an eating disorder

Fifty-nine percent (*n* = 72) of people with lived experience of caring for someone with an eating disorder indicated they had attended a session with a health professional without the person with an eating disorder present to better understand their loved one's eating disorder or how to support them. As demonstrated in Table 6.10, these sessions were commonly accessed via community-based services, such as the Butterfly Foundation, Eating Disorders Families Australia, or Eating Disorders Victoria, with most of this group attending more than 5 sessions. People with lived experience of caring for someone with an eating disorder indicated that these sessions were very helpful to better understand the person's eating disorder or how to support them, and overwhelmingly endorsed the suggestion that it is highly necessary for those supporting people with eating disorders to access these sessions as part of the plan of eating disorder treatment.



Table 6.10. Proportion of people with lived experience of caring for someone with an eating disorder who attended a session to better understand their loved ones eating disorder or how to support them

		<i>n</i> (%)
Attendance at sessions	Yes	72 (59.0)
	No	24 (19.7)
	Trying to do so now	5 (4.1)
	Would have liked to but didn't know it was available	21 (17.2)
Number of sessions attended	1	3 (4.2)
	2	11 (15.5)
	3	1 (1.4)
	4	5 (7.0)
	5	5 (7.0)
	More than 5	46 (64.8)
Sources of support	Health professional via the EDP	24 (28.9)
	Health professional via the MHCP	31 (37.3)
	Health professional via other means	31 (37.3)
	Community-based services	50 (60.2)
	Other	21 (25.3)
Helpfulness of sessions	Very unhelpful	4 (5.6)
	Moderately unhelpful	3 (4.2)
	Neutral	6 (8.3)
	Moderately helpful	23 (31.9)
	Very helpful	36 (50.0)
Importance of sessions*	Completely unnecessary	1 (0.8)
	Moderately unnecessary	2 (1.6)
	Somewhat necessary	6 (4.9)
	Moderately necessary	11 (8.9)
	Highly necessary	103 (83.7)

Note. * this question was asked of all respondents, regardless of whether they had attended sessions or not.

In addition, 54.1% (*n* = 66) of people with lived experience of caring for someone with an eating disorder indicated they had attended a session to get support for issues that have arisen due to caring for a person with an eating disorder. As demonstrated in Table 6.11, these sessions were also commonly accessed via community-based services (62.1%, *n* = 41), with 31.8% (*n* = 21) of this group attending more than 10 sessions. People with lived experience of caring for someone with an eating disorder indicated that these sessions were moderately to very helpful to get personal support for issues that have arisen as a result of caring for a person with an eating disorder, and most endorsed the view that it is highly necessary (84.6%, *n* = 104) for those supporting people with eating disorders to access these sessions as part of the plan of eating disorder treatment.

Table 6.11. Proportion of people with lived experience of caring for someone with an eating disorder who attended a session to get support for issues that have arisen due to caring for a person with an eating disorder

		<i>n</i> (%)
Attendance at sessions	Yes	66 (54.1)
	No	28 (23.0)
	Trying to do so now	7 (5.7)
	Would have liked to but didn't know it was available	21 (17.2)
Number of sessions attended	1	5 (7.6)
	2	8 (12.1)
	3	6 (9.1)
	4	6 (9.1)
	5	10 (15.2)
	6	5 (7.6)
	7	1 (1.5)
	8	0 (0)
	9	0 (0)
	10	4 (6.1)
Sources of support	More than 10	21 (31.8)
	Health professional via the EDP	9 (13.6)
	Health professional via the MHCP	33 (50.0)
	Health professional via other means	27 (40.9)
	Community based services	41 (62.1)
	Internal supports through family/friends	25 (37.9)
Helpfulness of sessions	Other	16 (24.2)
	Very unhelpful	5 (7.6)
	Moderately unhelpful	2 (3.0)
	Neutral	5 (7.6)
	Moderately helpful	27 (40.9)
Importance of sessions*	Very helpful	27 (40.9)
	Completely unnecessary	1 (0.8)
	Moderately unnecessary	1 (0.8)
	Somewhat necessary	3 (2.4)
	Moderately necessary	14 (11.4)
	Highly necessary	104 (84.6)

Note. * this question was asked of all respondents, regardless of whether they had attended sessions or not.

Process of undertaking eating disorder treatment

Accessing treatment for an eating disorder requires several steps common to different treatment pathways. Typically, a GP or other health professional determines the presence of an eating disorder, that the treatment seeking person is in need of eating disorder treatment, onward referral for psychological treatment and or dietetic intervention is provided, and treatment and or intervention sessions are taken up by the treatment seeking person. Additionally, for treatment under the EDP, eligibility for the Eating Disorders MBS items is determined by a GP or other medical professional at (ideally) first contact and a written plan is prepared and shared with the person with the eating disorder and where appropriate with those caring for the person with the eating disorder.

When asked about their experience with the processes involved in undertaking treatment, most people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder agreed that it was easy to have eligibility for the EDP determined and for the doctor to write up and provide the plan under the Eating Disorders MBS items. Higher levels of difficulty in having a doctor assess for the presence of an eating disorder and refer for treatment appeared to have been experienced with treatment through other means. There was greater variability in the ease with which psychological treatment sessions and dietetic health sessions were accessed across both treatment pathways.

Table 6.12. Processes of undertaking eating disorder treatment from the perspectives of people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder

	People with lived experience of an eating disorder		People with lived experience of caring for someone with an eating disorder	
	Treatment via EDP	Treatment via other means	Treatment via EDP	Treatment via other means
	<i>n</i> (%) [*]	<i>n</i> (%) [*]	<i>n</i> (%) [*]	<i>n</i> (%) [*]
A doctor determined eligibility for the EDP / or presence of and need for treatment				
Very easy to get done	99 (39.1)	10 (10.1)	37 (38.5)	0 (0)
Easy to get done	84 (33.2)	29 (29.3)	28 (29.2)	8 (29.6)
Neutral	21 (8.3)	14 (14.1)	14 (14.6)	4 (14.8)
Difficult to get done	36 (14.2)	28 (28.3)	8 (8.3)	9 (33.3)
Very difficult to get done	13 (5.1)	18 (18.2)	9 (9.4)	6 (22.2)
A doctor wrote up and provided the EDP/referral to treatment				
Very easy to get done	88 (34.5)	15 (15.5)	37 (38.1)	0 (0)
Easy to get done	94 (36.9)	37 (38.1)	28 (28.9)	10 (37.0)
Neutral	30 (11.8)	19 (19.6)	8 (8.2)	5 (18.5)
Difficult to get done	33 (12.9)	12 (12.4)	15 (15.5)	6 (22.2)
Very difficult to get done	10 (3.9)	14 (14.4)	9 (9.3)	6 (22.2)

	People with lived experience of an eating disorder		People with lived experience of caring for someone with an eating disorder	
	Treatment via EDP	Treatment via other means	Treatment via EDP	Treatment via other means
	<i>n</i> (%) [*]	<i>n</i> (%) [*]	<i>n</i> (%) [*]	<i>n</i> (%) [*]
Accessed psychological treatment sessions				
Very easy to get done	69 (27.7)	11 (12.4)	19 (20.2)	0 (0)
Easy to get done	98 (39.4)	30 (33.7)	29 (30.9)	8 (34.8)
Neutral	32 (12.9)	14 (15.7)	10 (10.6)	4 (17.4)
Difficult to get done	34 (13.7)	18 (20.2)	25 (26.6)	3 (13.0)
Very difficult to get done	16 (6.4)	16 (18.0)	11 (11.7)	8 (34.8)
Not applicable (<i>n</i>)	6	9	4	3
Accessed dietetic health sessions				
Very easy to get done	61 (27.5)	9 (12.9)	19 (24.1)	0 (0)
Easy to get done	89 (40.1)	23 (32.9)	28 (35.4)	4 (19.0)
Neutral	33 (14.9)	15 (21.4)	13 (16.5)	8 (38.1)
Difficult to get done	32 (14.4)	13 (18.6)	14 (17.7)	3 (14.3)
Very difficult to get done	7 (3.2)	10 (14.3)	5 (6.3)	6 (28.6)
Not applicable (<i>n</i>)	33	28	17	6

Note. * percentage calculations do not include responses of not applicable.

Of the survey participants with lived experience of an eating disorder who accessed treatment under the EDP, 95.8% received a GP review session and 73.7% received a specialist psychiatrist or paediatrician review session. Of those whose plan expired (expiry occurs after 12 months), 71.3% had their EDP renewed. When asked about the ease or difficulty of accessing these sessions from the perspectives of people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder, most agreed that it was easy to access 10-, 20-, and 30-session GP reviews, but about half of people with a lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder found psychiatrist/paediatrician reviews difficult to access.

Table 6.13. Process of undertaking eating disorder review sessions from the perspectives of people with lived eating disorder experience and people with lived experience of caring for someone with an eating disorder

	People with lived experience of an eating disorder	People with lived experience of caring for someone with an eating disorder
	<i>n (%) *</i>	<i>n (%) *</i>
A review with a GP after 10 psychological treatment sessions		
Very easy to get done	76 (33.9)	27 (33.8)
Easy to get done	101 (45.1)	36 (45.0)
Neutral	21 (9.4)	8 (10.0)
Difficult to get done	22 (89.8)	6 (7.5)
Very difficult to get done	4 (1.8)	3 (3.8)
Not applicable (<i>n</i>)	28	14
A review with a GP after 20 psychological treatment sessions		
Very easy to get done	67 (34.7)	27 (37.0)
Easy to get done	83 (43.0)	26 (35.6)
Neutral	23 (11.9)	11 (15.1)
Difficult to get done	19 (9.8)	7 (9.6)
Very difficult to get done	1 (0.5)	2 (2.7)
Not applicable (<i>n</i>)	60	23
A review with a psychiatrist or paediatrician after 20 psychological treatment sessions		
Very easy to get done	22 (12.2)	12 (18.2)
Easy to get done	34 (18.9)	14 (21.2)
Neutral	29 (16.1)	11 (16.7)
Difficult to get done	55 (30.6)	20 (30.3)
Very difficult to get done	40 (22.2)	9 (13.6)
Not applicable (<i>n</i>)	75	30
A review with a GP after 30 psychological treatment sessions		
Very easy to get done	41 (26.6)	20 (33.3)
Easy to get done	73 (47.4)	16 (26.7)
Neutral	24 (15.6)	15 (25.0)
Difficult to get done	14 (9.1)	5 (8.3)
Very difficult to get done	2 (1.3)	4 (6.7)
Not applicable (<i>n</i>)	100	36
A doctor renewed the EDP after the Plan expired		
Very easy to get done	55 (30.4)	20 (29.4)
Easy to get done	65 (35.9)	21 (30.9)
Neutral	22 (12.2)	11 (16.2)
Difficult to get done	22 (12.2)	10 (14.7)



	People with lived experience of an eating disorder	People with lived experience of caring for someone with an eating disorder
	<i>n</i> (%) *	<i>n</i> (%) *
Very difficult to get done	17 (9.4)	6 (8.8)
Not applicable (<i>n</i>)	73	25

Note. * percentage calculations do not include responses of not applicable.

Outcomes of eating disorder treatment: The Eating Disorder Plan and other treatment pathways

As noted earlier, people who received treatment under the EDP indicated they received an average of 42.7 (*SD* = 40.9) psychological treatment sessions and 16.9 (*SD* = 18.7) dietetic health sessions. Indeed, the number of psychological treatment sessions received was statistically related to views that the EDP was helpful for reducing use of other health services among people with lived eating disorder experience ($r = .14, p = .023$) and among carers of people with lived eating disorder experience ($r = .35, p < .001$). The number of dietetic health sessions received was not associated with perceptions of helpfulness for reducing use of other health services among both groups.

When asked about the helpfulness of treatment via the EDP for themselves or the person they support, people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder indicated that treatment had been overall very helpful, as shown in Table 6.14. Those who received treatment via means other than the EDP reported significantly lower helpfulness for psychological treatment sessions, dietetic health services, and GP review than those who accessed treatment via the EDP. There were no significant differences in helpfulness ratings for psychiatrist/paediatrician review sessions between treatment types for either people with lived experience of an eating disorder or people with lived experience of caring for someone with an eating disorder, noting that other treatment pathways do not include specified review sessions. However, the number of psychological treatment sessions, $r_s [251] = .22, p < .001$ and dietetic health sessions, $r_s [247] = .17, p = .006$ received was linked to higher perceived helpfulness of the EDP for eating disorder recovery.

Table 6.14. Helpfulness of eating disorder treatment by treatment received

	People with lived experience of an eating disorder		People with lived experience of caring for someone with an eating disorder	
	Treatment received via EDP (<i>n</i> = 262)	Treatment received via other means (<i>n</i> = 110)	Treatment received via EDP (<i>n</i> = 106)	Treatment received via other means (<i>n</i> = 27)
	<i>n</i> (%) *	<i>n</i> (%) *	<i>n</i> (%) *	<i>n</i> (%) *
Overall, how helpful has eating disorder treatment been for you or the person you support?				
Very unhelpful	10 (3.8)	18 (16.5)	11 (10.4)	5 (17.9)
Moderately unhelpful	17 (6.5)	17 (15.6)	4 (3.8)	4 (14.3)
Neutral	32 (12.3)	24 (22.0)	8 (7.5)	4 (14.3)
Moderately helpful	88 (33.7)	29 (26.6)	24 (22.6)	9 (32.1)
Very helpful	114 (43.7)	21 (19.3)	59 (55.7)	6 (21.4)
	$\chi^2(4, n = 372) = 41.9, p < .001$		$\chi^2(4, n = 134) = 12.4, p = .014$	
Overall, how helpful were psychological treatment sessions?				
Very unhelpful	18 (7.1)	18 (17.8)	7 (6.9)	7 (30.4)
Moderately unhelpful	13 (5.1)	13 (12.9)	2 (2.0)	3 (13.0)
Neutral	19 (7.5)	10 (9.9)	8 (7.9)	0 (0.0)
Moderately helpful	43 (16.9)	32 (31.7)	28 (27.7)	4 (17.4)
Very helpful	162 (63.6)	30 (29.7)	56 (55.4)	9 (39.1)
	$\chi^2(4, n = 358) = 35.3, p < .001$		$\chi^2(4, n = 124) = 18.4, p < .001$	
Overall, how helpful were dietetic health services?				
Very unhelpful	16 (7.2)	11 (14.9)	11 (12.4)	3 (13.6)
Moderately unhelpful	19 (8.6)	13 (17.6)	9 (10.1)	7 (31.8)
Neutral	27 (12.2)	14 (18.9)	12 (13.5)	6 (27.3)
Moderately helpful	55 (24.8)	23 (31.1)	18 (20.2)	1 (4.5)
Very helpful	105 (47.3)	13 (17.6)	39 (43.8)	5 (22.7)
	$\chi^2(4, n = 296) = 22.7, p < .001$		$\chi^2(4, n = 111) = 12.4, p = .015$	
Overall, how helpful were GP review sessions?				
Very unhelpful	17 (6.8)	15 (15.9)	8 (8.0)	6 (23.1)
Moderately unhelpful	24 (9.6)	25 (26.6)	4 (4.0)	6 (23.1)
Neutral	53 (21.3)	20 (21.3)	14 (14.0)	5 (19.2)
Moderately helpful	77 (30.9)	23 (24.5)	27 (27.0)	6 (23.1)
Very helpful	78 (31.3)	11 (11.7)	47 (47.0)	3 (11.5)
	$\chi^2(4, n = 345) = 30.9, p < .001$		$\chi^2(4, n = 126) = 20.7, p < .001$	
Overall, how helpful were psychiatrist/paediatrician review sessions?				
Very unhelpful	27 (14.1)	11 (16.7)	8 (9.4)	4 (15.4)
Moderately unhelpful	30 (15.7)	12 (18.2)	8 (9.4)	7 (26.9)
Neutral	50 (26.2)	19 (28.8)	22 (25.9)	5 (19.2)
Moderately helpful	42 (22.0)	11 (16.7)	22 (25.9)	7 (26.9)
Very helpful	42 (22.0)	13 (19.7)	25 (29.4)	3 (11.5)
	$\chi^2(4, n = 258) = 1.3, p = .859$		$\chi^2(4, n = 111) = 8.1, p = .089$	



Note. * percentage calculations do not include responses of not applicable.

Ratings of the helpfulness of treatment received under the EDP were compared for people with lived experience of anorexia nervosa and people with lived experience of other diagnoses (combined). A Mann-Whitney *U* Test found a small significant difference between groups, $z = 2.6, p = .009, d = 0.2$. As shown in Figure 6.7, participants with a diagnosis of anorexia nervosa rated treatment received under the EDP as less helpful than participants with other eating disorder diagnoses.

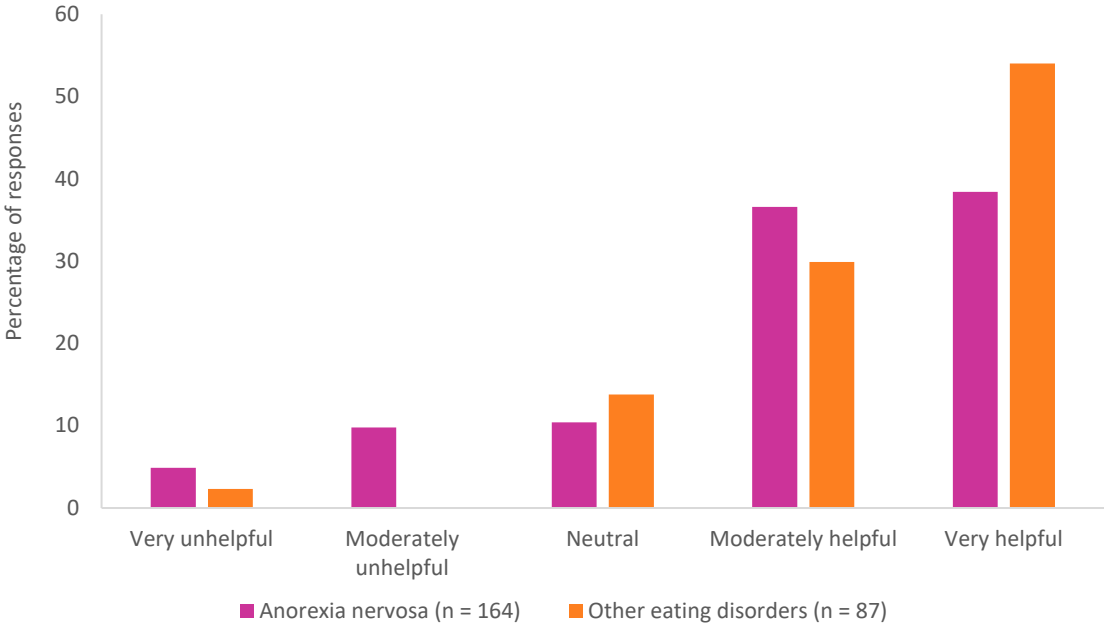


Figure 6.7. *Helpfulness of treatment received under the EDP from perspectives of people with lived experience of an eating disorder by eating disorder diagnosis.*

Helpfulness of treatment received through the EDP was explored across several markers of progress and engagement, as shown in Table 6.15. The EDP was rated particularly highly by people with lived experience of an eating disorder for helping recovery from their eating disorder, increasing motivation, and supporting therapeutic alliance. Access to providers who are knowledgeable about eating disorders, a multidisciplinary team, and number of treatment sessions matched to need were also rated highly for helpfulness.

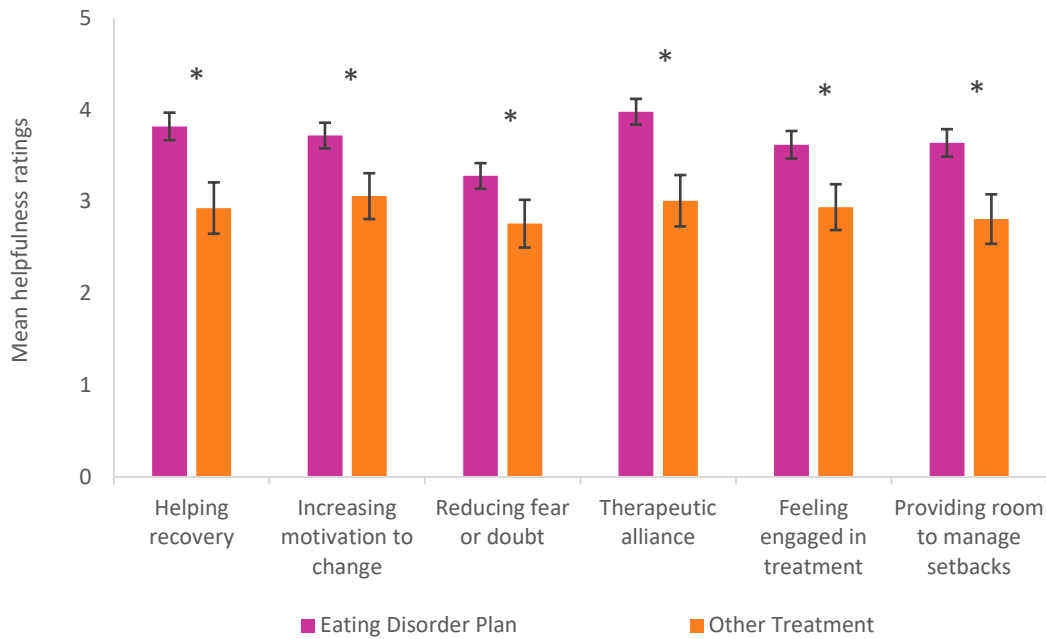
A series of Spearman’s rank-order correlations were conducted to assess the relationship between perceived helpfulness of the EDP and characteristics of treatment. There was a positive correlation between perceived helpfulness of the EDP in supporting eating disorder recovery and in providing access to the right number of sessions match to need, $r_s [257] = .50, p < .001$, in providing access to health professionals with a good understanding of eating disorders, $r_s [258] = .63, p < .001$, and in providing access to a multidisciplinary team, $r_s [253] = .58, p < .001$.

Table 6.15. Helpfulness of eating disorder treatment received via the EDP for people with lived experience of an eating disorder

	Very unhelpful	Moderately unhelpful	Neutral	Moderately helpful	Very helpful
For helping with recovery from my eating disorder (<i>n</i> = 260)	20 (7.7)	23 (8.8)	40 (15.4)	78 (30.0)	99 (38.1)
For increasing my motivation to change (<i>n</i> = 264)	17 (6.4)	17 (6.4)	55 (20.8)	110 (41.7)	65 (24.6)
For reducing my fear or doubts about treatment (<i>n</i> = 263)	27 (10.3)	31 (11.8)	84 (31.9)	83 (31.6)	38 (14.4)
For providing a good therapeutic alliance (<i>n</i> = 262)	12 (4.6)	19 (7.3)	45 (17.2)	72 (27.5)	114 (43.5)
For feeling engaged in treatment (<i>n</i> = 262)	19 (7.3)	28 (10.7)	57 (21.8)	88 (33.6)	70 (26.7)
For providing room to manage setbacks (<i>n</i> = 261)	23 (8.8)	29 (11.1)	52 (19.9)	71 (27.2)	86 (33.0)
For providing access to the right number of sessions for my level of need (<i>n</i> = 263)	19 (7.2)	23 (8.7)	39 (14.8)	92 (35.0)	90 (34.2)
For providing access to a multidisciplinary team (<i>n</i> = 259)	8 (3.1)	18 (6.9)	40 (15.4)	78 (30.1)	115 (44.4)
For providing treatment where the health professional had a good understanding of eating disorders (<i>n</i> = 262)	10 (3.8)	15 (5.7)	28 (10.6)	71 (26.9)	140 (53.0)
For reducing my financial burden (<i>n</i> = 264)	22 (8.3)	41 (15.5)	33 (12.5)	83 (31.4)	85 (32.2)
For reducing other difficulties associated with my eating disorders (<i>n</i> = 261)	31 (11.9)	35 (13.4)	70 (26.8)	68 (26.1)	57 (21.8)
For reducing my use of other health sessions (<i>n</i> = 260)	22 (8.5)	30 (11.5)	102 (39.2)	63 (24.2)	43 (16.5)
For reducing my alliance on family or other supports (<i>n</i> = 260)	23 (8.8)	27 (10.4)	97 (37.3)	64 (24.6)	49 (18.8)

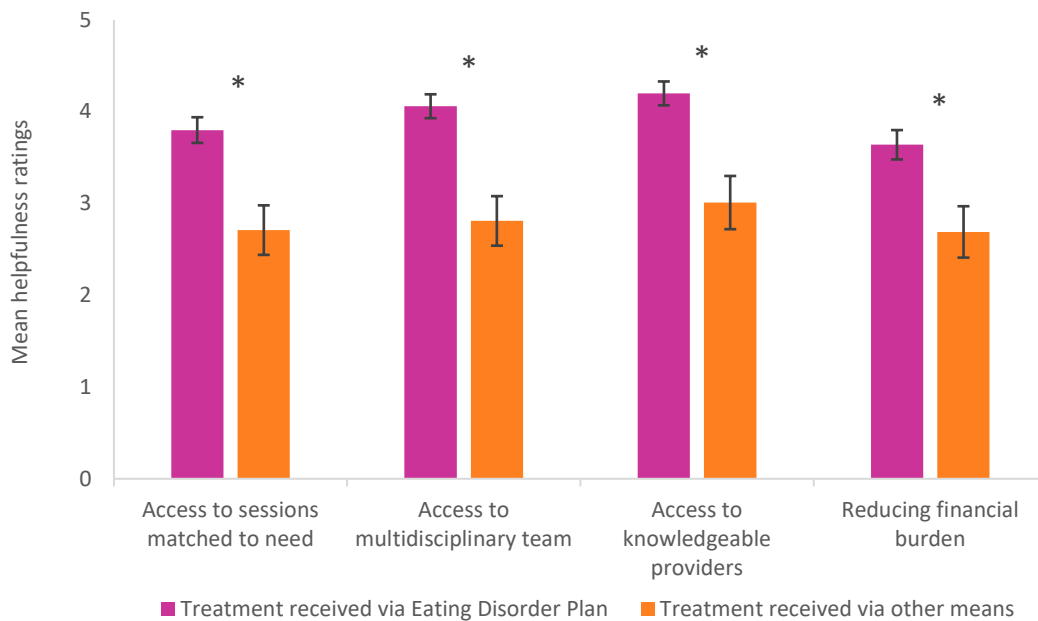
Note. *n* (%).

Comparisons of helpfulness regarding several therapeutic indicators were drawn between treatment provided by the EDP and via other means for people with lived experience of an eating disorder. As demonstrated in Figures 6.8 and 6.9, treatment received via the EDP appeared to be more helpful than treatment provided by other means across several therapeutic factors. Significant differences in helpfulness ratings of system-related factors between treatment received via the EDP and other means were found by people with lived experience of an eating disorder. Differences favoured treatment received via the EDP.



Note. Helpfulness rated from 1 = very unhelpful to 5 = very helpful; error bars are 95% confidence intervals. * statistically significant difference in helpfulness ratings between treatment pathways at $p < .001$.

Figure 6.8. Helpfulness ratings of therapeutic factors for treatment received via the Eating Disorder Plan or via other means by people with lived experience of eating disorders



Note. Helpfulness rated from 1 = very unhelpful to 5 = very helpful; error bars are 95% confidence intervals; * statistically significant difference in helpfulness ratings between treatment pathways at $p < .001$.

Figure 6.9. Helpfulness ratings of system-related factors for treatment received via the Eating Disorder Plan or via other means by people with lived experience of eating disorders

People with lived experience of caring for someone with an eating disorder perceived the EDP to be helpful (moderate to very) across several treatment outcomes. Most commonly, people with lived experience of caring for someone with an eating disorder endorsed that the EDP was very helpful for

being included meaningfully in treatment with the person they support and being meaningfully engaged in support of their loved one's recovery (see Table 6.16).

Table 6.16. Perspectives of people with lived experience of caring for someone with an eating disorder on the helpfulness of treatment via the EDP for the person they support

	Unsure	Very unhelpful	Moderately unhelpful	Neutral	Moderately helpful	Very helpful
For being included meaningfully in treatment with the person I support (<i>n</i> = 108)	1 (0.9)	8 (7.4)	8 (7.4)	15 (13.9)	23 (21.3)	53 (49.1)
For being meaningfully engaged in support my loved one's recovery (<i>n</i> = 107)	1 (0.9)	5 (4.7)	11 (10.3)	10 (9.3)	27 (25.2)	53 (49.5)
For providing rapid response to getting treatment for the eating disorder (<i>n</i> = 108)	1 (0.9)	16 (14.8)	11 (10.2)	22 (20.4)	27 (25.0)	31 (28.7)
For providing me with a greater understanding of my loved one's eating disorder (<i>n</i> = 108)	1 (0.9)	8 (7.4)	10 (9.3)	17 (15.7)	31 (28.7)	41 (38.0)
For providing appropriate communication between health professionals, myself, and the person I support (<i>n</i> = 108)	1 (0.9)	13 (12.0)	10 (9.3)	18 (16.7)	24 (22.2)	42 (38.9)
For providing me with skills to help the person I support (<i>n</i> = 107)	0 (0)	12 (11.2)	9 (8.4)	30 (28.0)	22 (20.6)	34 (31.8)
For providing me with resources to help me support my loved one (<i>n</i> = 106)	0 (0)	11 (10.4)	8 (7.5)	25 (23.6)	30 (28.3)	32 (30.2)
For helping improve my competence in supporting my loved one (<i>n</i> = 107)	1 (0.9)	10 (9.3)	10 (9.3)	25 (23.4)	26 (24.3)	35 (32.7)
For reducing the financial burden on me as a carer/support (<i>n</i> = 108)	1 (0.9)	16 (14.8)	12 (11.1)	16 (14.8)	24 (22.2)	39 (36.1)
For reducing my fear or doubts about treatment (<i>n</i> = 108)	0 (0)	12 (11.1)	10 (9.3)	30 (27.8)	25 (23.1)	31 (28.7)
For reducing the impact of providing care/support on my work/education/social/relationships (<i>n</i> = 106)	0 (0)	26 (24.5)	15 (14.2)	39 (36.8)	14 (13.2)	12 (11.3)
For reducing my use of other health services (<i>n</i> = 107)	1 (0.9)	13 (12.1)	7 (6.5)	52 (48.6)	19 (17.8)	15 (14.0)
For reducing my reliance on other supports (<i>n</i> = 106)	2 (1.9)	13 (12.3)	12 (11.3)	42 (39.6)	21 (19.8)	16 (15.1)

Note. *n* (%).

Outcomes for people with lived experience of caring for someone with an eating disorder

People with lived experience of caring for someone with an eating disorder also reported positive outcomes related to their caring role from being engaged with treatment received by the person they care for. As shown in Table 6.17, people with lived experience of caring for someone with an eating disorder reported overall high agreement (on a scale from 1 = very unhelpful to 5 = very helpful) that treatment was helpful for being included meaningfully in treatment with the person they support. For the remaining indicators, significantly higher helpfulness scores were reported from people with lived experience of caring for someone who received treatment under the EDP compared to those who received treatment via other means.

Table 6.17. Helpfulness of eating disorder treatment related to the caring role of people with lived experience caring for someone with an eating disorder

	Mean	SD	Mann Whitney U summary statistics	
			z	p
For being included meaningfully in treatment with the person I support				
Treatment via the EDP (n = 107)	4.0	1.3	-1.1	.256
Treatment via other means (n = 28)	3.6	1.5		
For providing greater understanding of the eating disorder of the person I care for				
Treatment via the EDP (n = 107)	3.8	1.3	-3.0	.002
Treatment via other means (n = 27)	3.0	1.3		
For providing appropriate communication among all parties				
Treatment via the EDP (n = 106)	3.6	1.4	-2.8	.005
Treatment via other means (n = 27)	2.7	1.5		
For improving my competence to support the person I care for				
Treatment via the EDP (n = 107)	3.6	1.4	-3.7	< .001
Treatment via other means (n = 28)	2.4	1.4		
For reducing the impact on my work/ education/ social				
Treatment via the EDP (n = 106)	2.8	1.3	-2.6	.011
Treatment via other means (n = 27)	2.1	1.3		

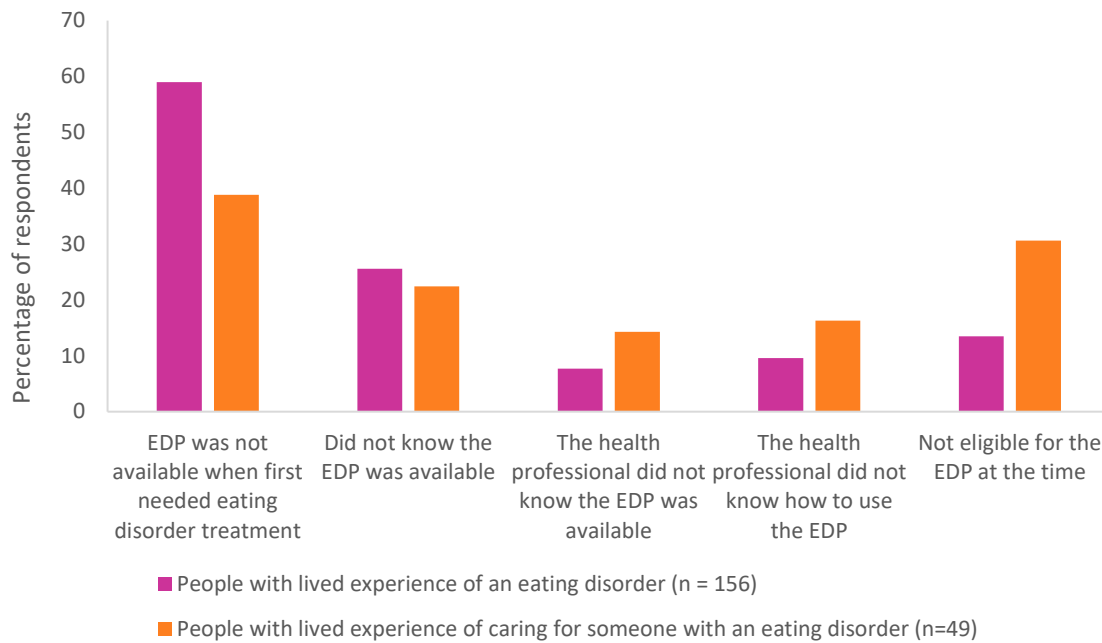
Note. Mean helpfulness rating (1 = very unhelpful to 5 = very helpful)

Perceptions of eating disorder treatment through the Eating Disorder Plan and Mental Health Treatment Plan

Sixty-seven percent (n = 192) of people with lived experience of an eating disorder indicated they had received treatment for their eating disorder with a Mental Health Treatment Plan (MHTP) via Better Access before accessing treatment via an EDP. Similarly, about half of people with lived experience of caring for someone with an eating disorder (n = 62, 50.4%) reported that those they support had treatment through a MHTP prior to receiving treatment through an EDP. The MHTP provides up to 10 psychological treatment sessions per year with a mental health professional and is



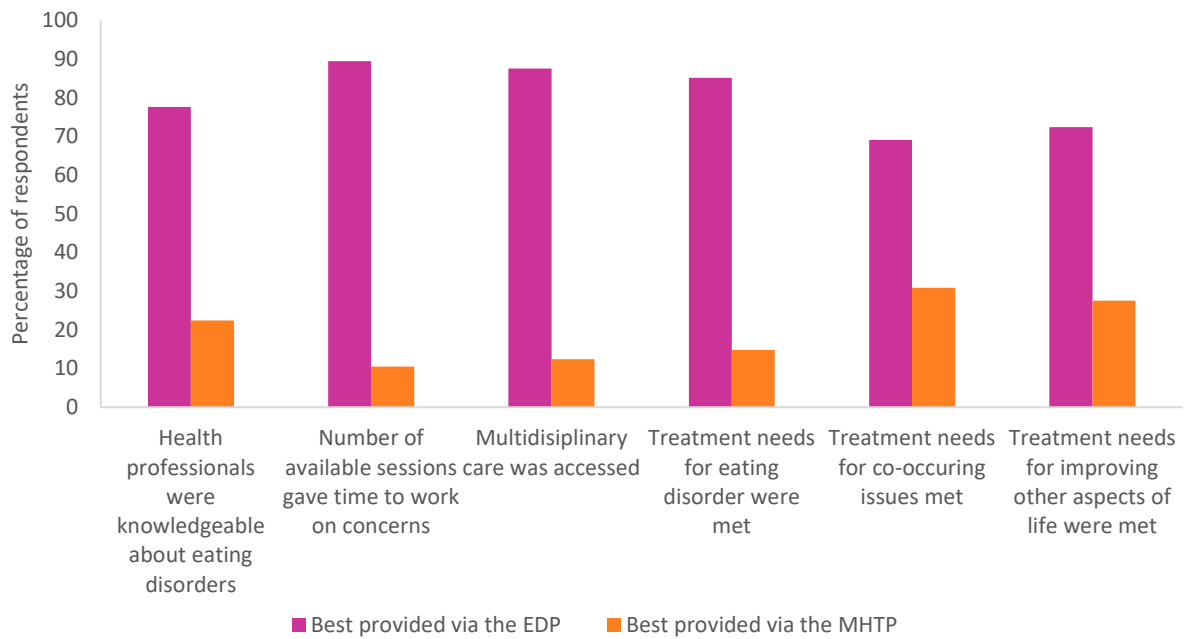
available to eligible people with any mental health disorder. As shown in Figure 6.10, the most common reason that treatment was accessed through the MHTP prior to the EDP was because the EDP was not available when first needing eating disorder treatment. Importantly, a substantial proportion of respondents indicated that treatment was not received through the EDP due to lack of awareness of the initiative or how to use it, either by people with lived experience of an eating disorder or of caring for someone with an eating disorder or on the part of health professionals.



Note. Respondents could select more than one option.

Figure 6.10. Reasons for first accessing eating disorder treatment via the Mental Health Treatment Plan (Better Access) prior to the EDP

When asked about the quality of care received via the EDP compared to care received via the MHTP, people with lived experience of an eating disorder indicated that the various aspects of treatment were best provided through the EDP (Figure 6.11). The EDP was particularly favoured for having a suitable number of sessions available to work through concerns and having access to multidisciplinary care.



Note. EDP refers to the Eating Disorder Plan; MHTP refers to the Mental Health Treatment Plan. Neutral responses (i.e., a score of 50/100) were not selected.

Figure 6.11. Perspectives from people with lived experience of an eating disorder on the quality of care provided via the EDP versus the MHTP (n = 149)

Similar perceptions were reported by people with lived experience of caring for someone with an eating disorder as demonstrated in Figure 6.12, whereby the quality of care was best provided via the EDP than the MHTP. As for people with lived experience of an eating disorder, this was particularly the case for the number of available sessions providing time to work through concerns.

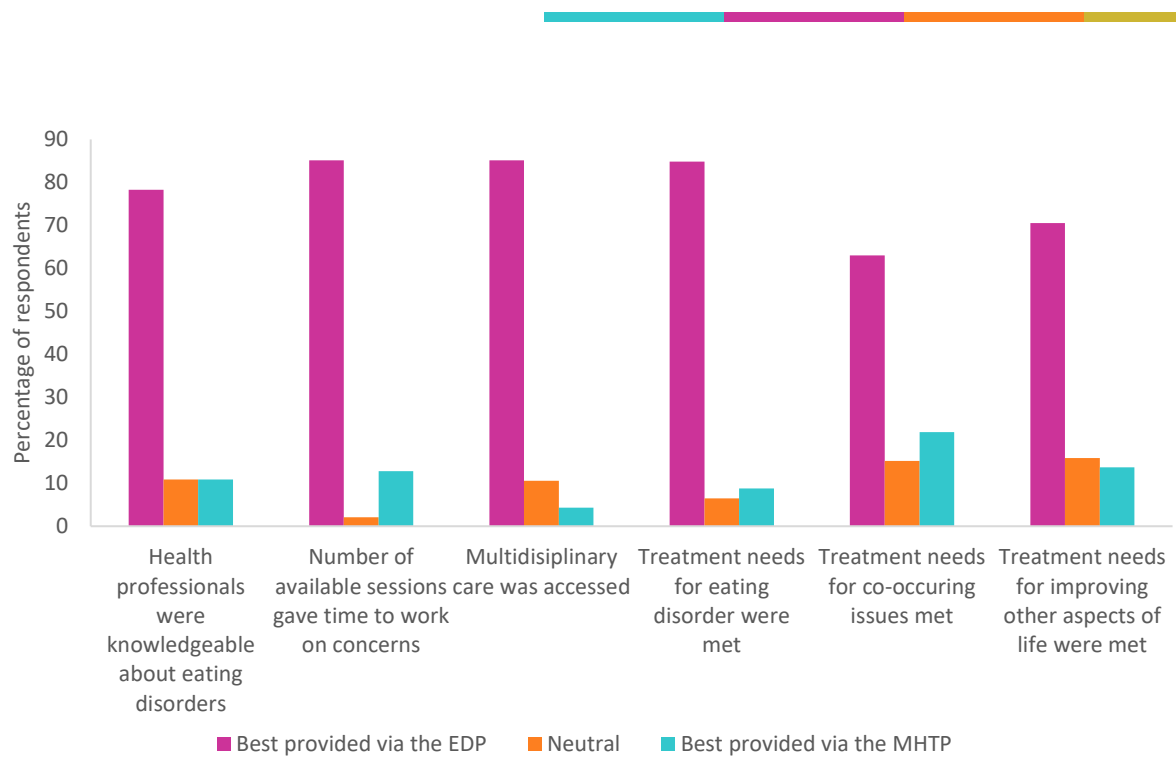


Figure 6.12. Perspectives of people with lived experience of caring for someone with an eating disorder on the quality of care provided via the EDP versus the MHTP (n = 46)

Findings from health professionals

Participant sociodemographic characteristics

A total of 266 health professionals took part in the online survey, comprising 99 dietitians, 82 non-dietetic allied health professionals (occupational therapists [OTs], social workers, psychologists, clinical psychologists), 78 general practitioners (GP) or other medical practitioners, and seven psychiatrists and paediatricians. Participants were primarily female-identifying, born in Australia, resided in advantaged socioeconomic metropolitan areas, and of neither Aboriginal nor Torres Strait Islander origin. Table 6.18 outlines the sociodemographic characteristics of health professionals at a total and subgroup level.

Table 6.18. Sociodemographic characteristics of health professionals in the study

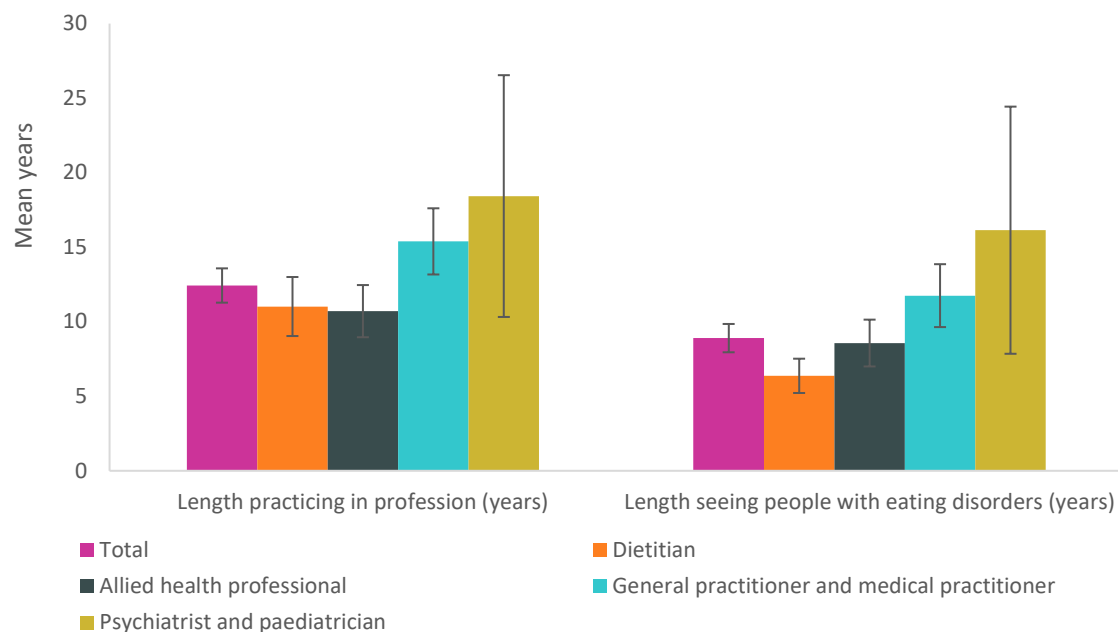
Variable	Total	Dietitian	Allied health professional	GP & medical practitioner	Psychiatrist & paediatrician
Total (n [%])	266	99 (37.2)	82 (30.8)	78 (29.3)	7 (2.6)
Gender (n [%])					
Female	236 (90.1)	88 (91.7)	74 (90.2)	69 (89.6)	5 (71.4)
Male	22 (8.4)	5 (5.3)	7 (8.5)	8 (10.4)	2 (28.6)
Non-binary*	2 (0.8)	2 (2.1)	0 (0)	0 (0)	0 (0)
Genderqueer	1 (0.4)	1 (1.0)	0 (0)	0 (0)	0 (0)

Variable	Total	Dietitian	Allied health professional	GP & medical practitioner	Psychiatrist & paediatrician
Prefer not to say	1 (0.4)	0 (0)	1 (1.2)	0 (0)	0 (0)
Age (<i>M</i> [<i>SD</i>])	40.1 (10.4)	36.2 (10.0)	39.6 (9.2)	44.6 (9.8)	52.0 (7.8)
State (<i>n</i> [%])					
NSW	74 (28.8)	25 (26.3)	25 (31.3)	21 (28.0)	3 (42.9)
VIC	80 (31.1)	29 (30.5)	22 (27.5)	28 (37.3)	1 (14.3)
QLD	52 (20.2)	27 (28.4)	13 (16.3)	11 (14.7)	1 (14.3)
SA	17 (6.6)	5 (5.3)	5 (6.3)	7 (9.3)	0 (0)
WA	15 (5.8)	3 (3.2)	8 (10.0)	3 (4.0)	1 (14.3)
TAS	10 (3.9)	3 (3.2)	2 (2.5)	5 (6.7)	0 (0)
NT	4 (1.6)	1 (1.1)	2 (2.5)	0 (0)	1 (14.3)
ACT	5 (1.9)	2 (2.1)	3 (3.8)	0 (0)	0 (0)
IRSAD (<i>M</i> [<i>SD</i>])	7.9 (2.3)	7.4 (2.4)	8.6 (1.8)	7.5 (2.5)	9.7 (0.8)
Rurality (<i>n</i> [%])					
Major city	198 (77.0)	70 (73.7)	70 (87.5)	52 (69.3)	6 (85.7)
Inner regional	39 (15.2)	17 (17.9)	7 (8.8)	15 (20.0)	0 (0)
Outer regional	19 (7.4)	8 (8.4)	2 (2.5)	8 (10.7)	1 (14.3)
Remote	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)
Very remote	1 (0.4)	0 (0)	1 (1.3)	0 (0)	0 (0)
Country of Birth (<i>n</i> [%])					
Australia	206 (78.6)	84 (87.5)	68 (84.0)	50 (64.1)	4 (57.1)
England	18 (6.9)	2 (2.1)	6 (7.4)	10 (12.8)	0 (0)
India	5 (1.9)	2 (2.1)	1 (1.2)	2 (2.6)	0 (0)
China	2 (0.8)	1 (1.0)	0 (0)	1 (1.3)	0 (0)
New Zealand	5 (1.9)	2 (2.1)	0 (0)	3 (3.8)	0 (0)
Philippines	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)
Malaysia	3 (1.1)	0 (0)	0 (0)	3 (3.8)	0 (0)
Italy	0 (0)	0 (0)	0 (0)	0 (0)	0 (0)
Other	23 (8.8)	5 (5.2)	6 (7.4)	9 (11.5)	3 (42.9)
Indigenous Status (<i>n</i> [%])					
Aboriginal	3 (1.1)	2 (2.1)	0 (0)	1 (1.3)	0 (0)
Torres Strait Islander	6 (2.4)	3 (3.1)	2 (2.4)	1 (1.3)	0 (0)

Variable	Total	Dietitian	Allied health professional	GP & medical practitioner	Psychiatrist & paediatrician
Both	2 (0.8)	0 (0)	1 (1.2)	1 (1.3)	0 (0)
Neither	253 (95.8)	92 (94.8)	79 (96.3)	75 (96.2)	7 (100.0)

Note. IRSAD = Index of Relative Socio-economic Advantage and Disadvantage (range 1 – 10, with 1 = the most disadvantaged and 10 = the most advantaged); *self-identified as non-binary in open-text responses.

Among the total sample, health professionals had been practicing within their profession for an average of 12.4 years ($SD = 9.4$), with an average of 8.9 ($SD = 7.8$) of those years working with people with eating disorders (see Figure 6.13). A one-way ANOVA revealed there was a statistically significant difference in years practicing in their profession between health professional groups, $F(3,253) = 5.4, p = .001$, with post hoc comparison using the Tukey HSD test indicating that the mean score for GPs ($M = 15.4, SD = 9.8$) was significantly higher than dietitians ($M = 11.0, SD = 9.7$) and allied health professionals ($M = 10.7, SD = 7.7$). Similarly, a one-way ANOVA revealed there was a statistically significant difference in years seeing people with eating disorders between health professional groups, $F(3,256) = 9.8, p < .001$, with Tukey HSD test post hoc comparison indicating that the mean score for GPs ($M = 11.8, SD = 9.3$) and psychiatrists and paediatricians ($M = 16.1, SD = 9.0$) was significantly higher than dietitians ($M = 6.4, SD = 5.6$) and allied health professionals ($M = 8.6, SD = 7.1$).



Note. Allied health professional refers here to non-dietitian allied health professionals; error bars are 95% confidence intervals.

Figure 6.13. Health professionals' experience within the field

Across all health professional groups, the most common eating disorder diagnosis of people with eating disorders seen within clinical practice was anorexia nervosa, followed by binge eating disorder, and atypical anorexia nervosa. An outline of the more frequent eating disorder diagnoses seen within clinical practice at a total and subgroup level is displayed in Table 6.19. Note that these

diagnoses include all clinical work with people with eating disorders, through the EDP and other means of treatment provision.

Table 6.19. Most frequent eating disorder diagnoses seen within clinical practice

	Total	Dietitian	Allied health professional	General practitioner and medical practitioner	Psychiatrist and paediatrician
	<i>n</i> (%)	<i>n</i> (%)	<i>n</i> (%)	<i>n</i> (%)	<i>n</i> (%)
Anorexia nervosa	225 (85.2)	88 (89.8)	70 (86.4)	60 (76.9)	7 (100.0)
Bulimia nervosa	167 (63.3)	64 (65.3)	64 (79.0)	33 (42.3)	6 (85.7)
BED	216 (81.8)	87 (88.8)	67 (82.7)	58 (82.7)	4 (57.1)
Atypical anorexia nervosa	177 (67.0)	69 (70.4)	63 (77.8)	39 (50.0)	6 (85.7)
Subthreshold bulimia nervosa	94 (35.6)	34 (34.7)	43 (53.1)	15 (19.2)	2 (28.6)
Subthreshold BED	107 (40.5)	42 (42.9)	38 (46.9)	25 (32.1)	2 (28.6)
Purging disorder	34 (12.9)	14 (14.3)	14 (17.3)	6 (7.7)	0 (0)
Night eating syndrome	26 (9.8)	13 (13.3)	6 (7.4)	6 (7.7)	1 (14.3)
ARFID	131 (49.6)	67 (68.4)	33 (40.7)	26 (33.3)	5 (71.4)
Pica	10 (3.8)	7 (7.1)	0 (0)	3 (3.8)	0 (0)
Rumination disorder	12 (4.5)	6 (6.1)	2 (2.5)	4 (5.1)	0 (0)
UFED	62 (23.5)	28 (28.6)	19 (23.5)	14 (17.9)	1 (14.3)

Note. BED = binge eating disorder; ARFID = avoidant/restrictive food intake disorder, UFED = unspecified feeding or eating disorder. Percentages do not add to 100 as multiple responses could be selected.

Data regarding the provision of treatment using the Eating Disorders MBS items by health professionals is detailed in Table 6.20. Preparation of plans was most commonly done by GPs. Psychological treatment services were most commonly done by psychologists with a lower proportion of mental health endorsed occupational therapists, accredited mental health social workers, and GPs providing psychological treatment services.

Table 6.20. Role of health professionals in Eating Disorders MBS item delivery

Provider (<i>n</i>)	Prepare EDPs <i>n</i>	Provide psychological treatment services <i>n</i>	Provide dietetic health services <i>n</i>	Review EDPs <i>n</i>
Dietitian (92)	-	-	92	-
General Practitioner (44)	40	-	-	32
General Practitioner (MH) ^a (33)	30	8	-	23
Occupational Therapist ^b (3)	-	3	-	-
Other Medical Practitioner (1)	1	-	-	0

Other Medical Practitioner ^a (0)	0	0	-	0
Paediatrician (1)	1	0	-	1
Psychiatrist (6)	1	1	-	5
Psychologist – Clinical (34)	-	34	-	-
Psychologist (31)	-	31	-	-
Social Worker ^c (6)	-	6	-	-

Note. ^a registered to provide focused psychological strategies (GP, medical practitioner); ^b mental health endorsed; ^c accredited mental health social worker.

Professional development and confidence, knowledge, and skill of health professionals

Most health professionals (95.6%) had completed eating disorder specific professional development training since the introduction of the EDP in 2019. Across all health professionals, many had completed 'The Essentials' eLearning (introductory training), a foundational online learning program for health professionals that is designed to meet the core competencies for the identification of and response to eating disorders². See Table 6.21 for a description of the professional development training undertaken by health professionals at a total and subsample level.

Table 6.21. Professional development training undertaken by health professionals

	Total (n = 153)	Dietitian (n = 60)	Allied health professional (n = 52)	GP and medical practitioner (n = 38)	Psychiatrist and paediatrician (n = 3)
Introduction to Eating Disorders for Health Professionals (mental health and dietetic)	44 (28.8)	33 (55.0)	10 (19.2)	7 (18.4)	0 (0)
Introduction to Eating Disorders for Health Professionals (mental health only)	21 (13.7)	0 (0)	18 (34.6)	2 (5.3)	1 (33.3)
Introduction to Eating Disorders for Health Professionals (dietetics only)	40 (26.1)	38 (63.3)	2 (3.8)	0 (0)	0 (0)
'The Essentials' eLearning (introductory training)	64 (41.8)	28 (46.7)	22 (42.3)	14 (36.8)	0 (0)
Eating Disorder Core Skills eLearning for Mental Health Professionals	25 (16.3)	6 (10.0)	14 (26.9)	4 (10.5)	1 (33.3)

Eating Disorder Core Skills eLearning for GPs	24 (15.7)	0 (0)	2 (3.8)	22 (57.9)	0 (0)
Evidence-based Treatment Model (mental health)	53 (34.6)	9 (15.0)	41 (78.8)	3 (7.9)	0 (0)
Evidence-informed Dietetic Practice for Eating Disorders (dietetics)	48 (31.4)	47 (78.3)	1 (1.9)	0 (0)	0 (0)
Other	30 (19.6)	11 (18.3)	7 (13.5)	10 (26.3)	2 (66.7)

Note. n yes (%)

Of the health professionals eligible to apply to become an ANZAED Credentialed Eating Disorder Clinician, 65.1% were credentialed at the time of completing the survey. As shown in Figure 6.10, there was no difference in the length of time credentialed ($M = 8.3, SD = 6.9$ years) and non-credentialed ($M = 8.9, SD = 8.1$ years) health professionals had been working with people with eating disorders ($U = 5120.0, p = .95$). However, perceptions of confidence, $t(171) = -6.9, p < .001, d = -1.1$, knowledge, $t(169) = -6.6, p < .001, d = -1.1$, and skill, $t(170) = -5.3, p < .001, d = -0.9$, in providing safe and effective eating disorder care were significantly higher among those who were credentialed than those not credentialed (see Figure 6.14). Effect sizes were large.

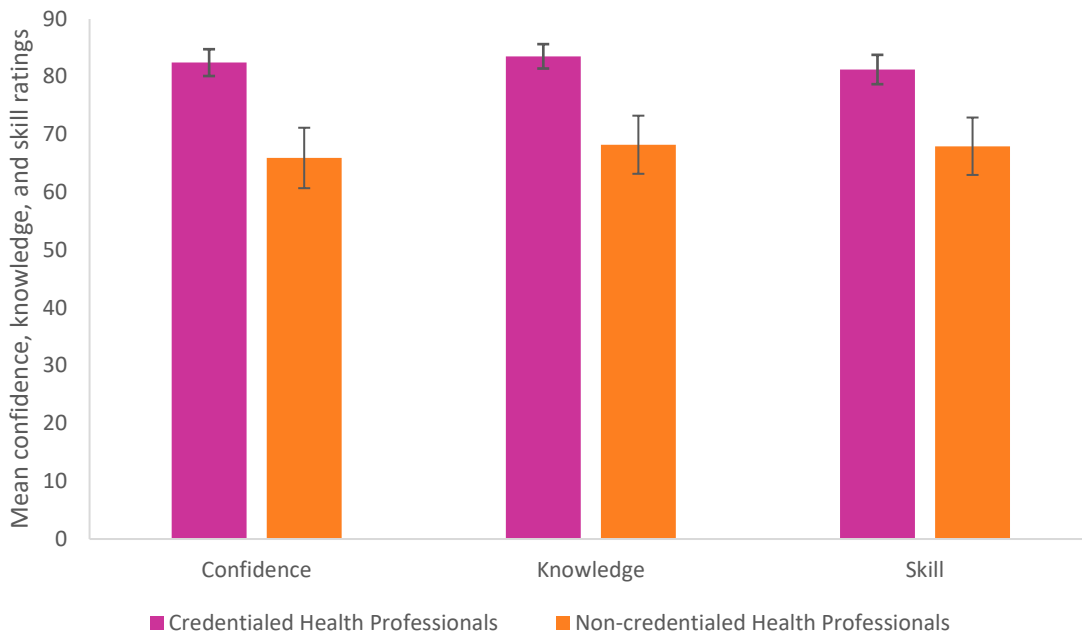


Figure 6.14. Mean self-ratings of confidence, knowledge, and skill by credentialed and non-credentialed health professionals

When asked about their ability to provide safe and effective eating disorder care, all health professional subgroups rated themselves as moderately confident, knowledgeable, and skillful (scale from 0-100). As shown in Table 6.22, overall lower scores were reported for health professionals who prepare EDPs relative to other groups. The level of confidence, knowledge, and skill in providing safe and effective eating disorder care was positively correlated with years practicing in profession

and years seeing people with eating disorders for several health professional subgroups. No significant correlations were observed between confidence, knowledge and skill and years practicing in profession and seeing people with eating disorders for health professionals who review EDPs.

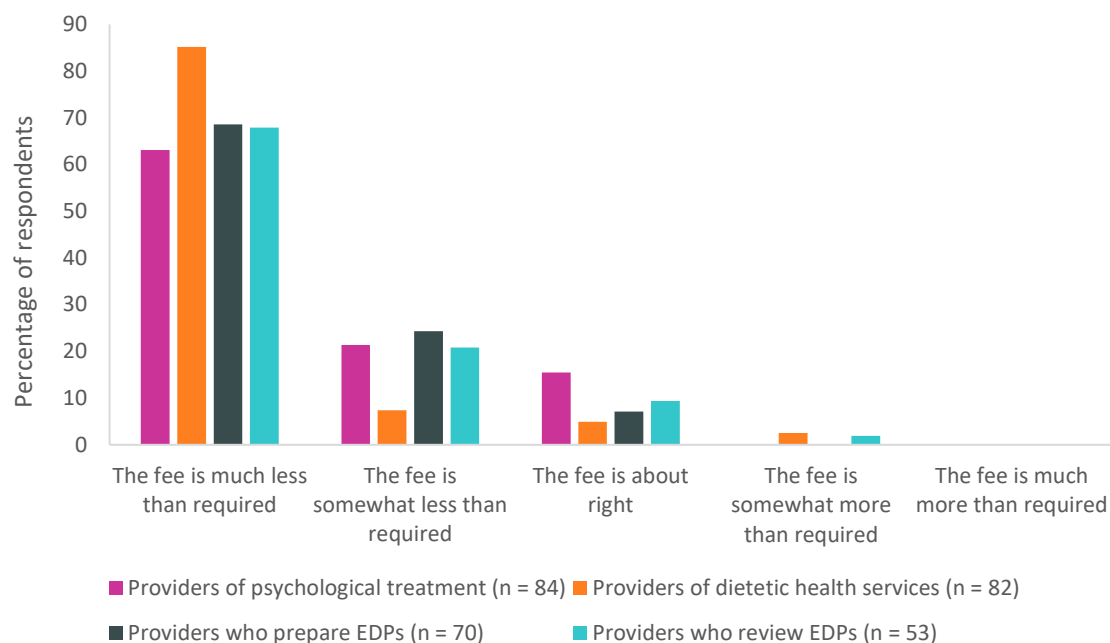
Table 6.22. Mean level of confidence, knowledge, and skill, and correlations between these variables and years of practice among health professionals

		<i>M (SD)</i>	Years practising in profession	Years seeing people with eating disorders
Health professionals who prepare EDPs	Confidence	63.6 (21.7)	.27*	.24*
	Knowledge	68.0 (17.9)	.16	.12
	Skill	66.9 (19.4)	.22	.18
Health professionals who provide psychological treatment sessions	Confidence	78.0 (15.7)	.25*	.28*
	Knowledge	79.9 (15.5)	.22	.25*
	Skill	77.8 (16.3)	.33**	.31**
Health professionals who provide dietetic health services	Confidence	78.5 (15.5)	.27*	.46**
	Knowledge	79.1 (15.2)	.28*	.45**
	Skill	77.8 (16.1)	.32**	.47**
Health professionals who review EDPs	Confidence	76.1 (18.7)	.02	-.04
	Knowledge	75.7 (18.3)	-.05	-.12
	Skill	73.8 (20.4)	.05	.02

Note. * $p < .05$, ** $p < .001$.

Remuneration and caseloads for the provision of services under the Eating Disorder Plan

Health professionals who provide EDPs indicated it takes an average of 53.6 minutes ($SD = 17.9$) to consult with people seeking support to gather the required information, and a further 33.3 minutes ($SD = 18.8$) to write the EDP. For health professionals who provide psychological treatment sessions under the EDP, most allied health clinicians (e.g., psychologists, clinical psychologists, social workers, occupational therapists) reported providing treatment in sessions of 50-minutes (89.2%) and most GPs reported providing treatment in sessions of at least 40-minutes (62.5%). Dietetic health services are delivered in sessions of at least 20 minutes duration, with most participants indicating this is too short for the provision of eating disorder assessment (97.6%) and ongoing nutrition intervention (96.3%). Most health professionals who provide psychological treatment sessions suggested that the session length was appropriate for delivering treatment (76.8%) but not for provision of eating disorder assessment (83.8%). Health professionals who review EDPs indicated it takes an average of 41.7 minutes ($SD = 16.6$) to conduct a review, with psychiatrists and paediatricians noting a longer session time of 62.5 minutes ($SD = 17.5$) than GPs and other medical practitioners at 39.2 minutes ($SD = 14.9$). However, as demonstrated in Figure 6.15, most health professionals across all subgroups indicated that the Schedule fee received is much less than required to provide appropriate remuneration for the required tasks and associated time.



Note. EDPs = Eating Disorder Plans.

Figure 6.15. Extent the Schedule fee for the provision of services under the EDP provides appropriate remuneration

As shown in Table 6.23, health professionals who prepare EDPs indicated that providing an opinion on diagnosis and providing education about eating disorders were the largest contributor to the perception that the Schedule fee for preparing the EDP is inappropriate. The tasks perceived to make a large contribution to the Schedule fee being inappropriate for mental health clinicians were initial consultation/assessment for 75.7% of respondents, communication with multidisciplinary team for 60.6% of respondents, and ongoing consultation sessions with the person with an eating disorder for delivery of psychological treatment sessions for 78.8% of respondents.

Table 6.23. Contributors to the Schedule fee for preparing EDPs being perceived as providing inappropriate remuneration

	No contribution	Moderate contribution	Large contribution
	n (%)	n (%)	n (%)
Providing an opinion on diagnosis	0 (0)	30 (46.2)	35 (53.8)
Providing treatment options and recommendations for the following 12 months	2 (3.1)	31 (47.7)	32 (49.2)
Providing a copy of the plan to the person with the eating disorder (or their support person)	31 (47.7)	24 (36.9)	10 (15.4)
Providing education about eating disorders	0 (0)	14 (21.5)	51 (78.5)

Note. n = 65.

For dietitians, initial consultation/assessment was the largest contributor to the Schedule fee being inappropriate for the required tasks for 96.0% of respondents, followed by follow-up and reports after initial consultation for 73.0% of respondents, and ongoing consultation sessions with the person with an eating disorder for delivery of dietetic health sessions for 89.4% of respondents.

When asked about their level of engagement in eating disorder treatment and if they wished to increase or decrease their caseload, most health professionals indicated no change to their level of engagement. Notably, dietitians reported slightly higher preference to increase their caseload, as shown in Table 6.24. When asked about their level of engagement in working with people with eating disorders, most GPs and medical practitioners indicated they do limited work with eating disorder (41.5%), 37.8% indicated they do a moderate amount of work in eating disorders, and 20.7% indicated they do a lot of work in eating disorders, but most (59.8%) prefer no change in their involvement in eating disorder care.

Table 6.24. Level of engagement in eating disorder care across health professionals

	Dietitians ^a	Allied health professionals ^b	Medical practitioners ^c
	<i>n</i> (%)	<i>n</i> (%)	<i>n</i> (%)
Prefer to decrease caseload by a lot	2 (2.4)	1 (1.2)	4 (4.9)
Prefer to decrease caseload by a little	7 (8.3)	19 (22.6)	12 (14.6)
No change to caseload	44 (52.4)	48 (57.1)	53 (64.6)
Prefer to increase caseload by a little	25 (29.8)	13 (15.5)	12 (14.6)
Prefer to increase caseload by a lot	6 (7.1)	3 (3.6)	1 (1.2)

Note. ^a *n* = 84, ^b *n* = 84, ^c *n* = 82.

When asked about their availability for new eating disorder cases, a small proportion of mental health professionals had immediate availability, whereas over half of dietitians has immediate availability (Table 6.25). Of those who had a wait list for new referrals (psychological treatment providers 59.3%; dietetic health service providers 30.3%), wait list times varied with about 80% of psychological treatment providers having a wait list of up to 3 months (less than 1 month 8.3%; 1 month 20.8%; 2 months 25.0%; 3 months 25.0%; > 3 months 20.9%) and about 80% of dietetic service providers having a wait list of up to 2 months (less than one month 30.4%; 1 month 30.4%; 2 months 21.7%; 3 months 4.3%; > 3 months 13.0%).

Table 6.25. Current availability of health professionals who provide eating disorder treatment for new eating disorder cases

	Dietitians ^a	Allied health professionals ^b
	<i>n</i> (%)	<i>n</i> (%)
Have immediate availability	43 (56.6)	18 (22.2)
Have a wait list	23 (30.3)	48 (59.3)
Have stopped taking on new cases	10 (13.2)	15 (18.5)

Note. ^a *n* = 76, ^b *n* = 81.

Processes involved in the Eating Disorder Plan

Preparing the Eating Disorder Plan

Health professionals who prepare EDPs (e.g., GPs, other medical practitioners, psychiatrists, paediatricians) indicated they prepare an average of 1 plan or fewer per month. Of the plans prepared, on average 95.1% ($SD = 13.9$) include referral for psychological treatment services and 85.8% ($SD = 20.9$) include referral for dietetic treatment services. When writing an EDP, there is an initial expectation that the person with an eating disorder will access more than 20 psychological treatment sessions in 72.3% of cases on average ($SD = 29.0$).

When preparing the EDP, health professionals indicated that several of the required steps are of varying degrees of difficulty. As shown in Table 6.26, most health professionals indicated determining eligibility for the EDP to be neither easy nor difficult (neutral) but determining eligibility for additional criteria for those with bulimia nervosa, binge eating disorder, or other specified feeding and eating disorder to be difficult. Additionally, most health professionals endorsed that finding an appropriate provider with availability to conduct a timely 20-session review is very difficult.

Table 6.26. Health professional perspectives on the ease and difficulty of preparing an EDP

	Very easy	Easy	Neutral	Difficult	Very difficult
Determine eligibility for the Plan – diagnose the eating disorder ($n = 70$)	5 (7.1)	18 (25.7)	29 (41.4)	17 (24.3)	1 (1.4)
Determine eligibility for the Plan – additional criteria for people with bulimia nervosa, binge eating disorder, or other specified feeding or eating disorder ($n = 70$)	2 (2.9)	16 (22.9)	18 (25.7)	27 (38.6)	7 (10.0)
Determine initial treatment recommendations/goals for psychological treatment sessions ($n = 70$)	6 (8.6)	37 (38.6)	25 (35.7)	10 (14.3)	2 (2.9)
Determine initial treatment recommendations/goals for dietetic services ($n = 70$)	6 (8.6)	27 (38.6)	26 (37.1)	10 (14.3)	1 (1.4)
Select an appropriate provider for psychological treatment sessions ($n = 70$)	2 (2.9)	17 (24.3)	17 (24.3)	27 (38.6)	7 (10.0)
Find an appropriate provider with availability to provide psychological treatment sessions in a timely manner ($n = 70$)	1 (1.4)	4 (5.7)	3 (4.3)	21 (30.0)	41 (58.6)



	Very easy	Easy	Neutral	Difficult	Very difficult
Find an appropriate provider with availability to provide dietetic services in a timely manner (<i>n</i> = 70)	4 (5.7)	8 (11.4)	12 (17.1)	25 (36.7)	21 (30.0)
Select an appropriate provider for dietetic services (<i>n</i> = 70)	2 (2.9)	19 (27.1)	24 (34.3)	14 (20.0)	11 (15.7)
Select an appropriate provider to conduct the 20-session review to access more than 20 psychological treatment sessions (<i>n</i> = 69)	2 (2.9)	4 (5.8)	6 (8.7)	20 (29.0)	37 (53.6)
Find an appropriate provider with availability to conduct a timely 20-session review (<i>n</i> = 69)	1 (1.4)	3 (4.3)	1 (1.4)	10 (14.5)	54 (78.3)

Note. *n* (%).

When asked about their overall awareness of the EDP, health professionals who prepare EDPs felt moderately informed about how to use the EDP and associated Medicare items. As shown in Table 6.27, similar perceptions about the health professionals to whom they wish to refer people for treatment or review sessions were reported. Considering these perceptions, health professionals who prepare plans indicated they provide some support to other health professionals to use the EDP and associated Medicare items to assist people accessing treatment.

Table 6.27. Health professionals’ self-awareness of the process of preparing EDPs and perceptions about awareness of other health professionals involved in providing services through the EDP

	Not at all informed	Slightly informed	Moderately informed	Highly informed	Very highly informed	N/A
How well informed do you feel about how to use the Eating Disorder Plan and associated Medicare items? (<i>n</i> = 67)	2 (3.0)	13 (19.4)	26 (38.8)	16 (23.9)	10 (14.9)	0 (0)
To what extent have mental health professionals who you wish to refer people for psychological treatment been informed about how to use the EDP and associated Medicare items? (<i>n</i> = 66)	2 (3.0)	9 (13.6)	27 (40.9)	19 (28.8)	7 (10.6)	2 (3.0)
To what extent have dietitians who you wish to refer people for dietetic health sessions been informed about how to use the EDP and associated Medicare items? (<i>n</i> = 65)	1 (1.5)	8 (12.3)	19 (29.2)	27 (41.5)	10 (15.4)	0 (0)

To what extent have psychiatrists or paediatricians who you wish to refer people for the 20-session review been informed about how to use the EDP and associated Medicare items? (n = 66)	6 (9.1)	10 (15.2)	23 (34.8)	16 (24.2)	4 (6.1)	7 (10.6)
	No support	Very little support	Some support	Moderate support	A lot of support	N/A
What level of support have you had to provide to other health professionals to use the Plan and associated Medicare items to assist people accessing treatment? (n = 65)	6 (9.2)	19 (29.2)	21 (32.3)	13 (20.0)	4 (6.2)	2 (3.1)

Note. n (%).

Provision of psychological treatment and dietetic health services under the Eating Disorder Plan

Psychological treatment and dietetic health services under the EDP can be provided by mental health clinicians, including psychologists, clinical psychologists, occupational therapists, social workers, and GPs and other medical practitioners (registered to provide focused psychological strategies). Dietetic health services under the EDP can be provided by dietitians. The mental health clinicians and dietitians who took part in the present study were highly engaged in working with people with eating disorders as shown in Table 6.28. Furthermore, these health professionals reported that over the last 12 months, on average, 69.7% ($SD = 24.3$) of people seeking eating disorder psychological treatment and 66.0% ($SD = 29.1$) of people seeking eating disorder dietetic intervention have been accessing services under the EDP.

Table 6.28. Mental health clinician and dietitian perspectives on the proportion of people seeking eating disorders support

		Mental Health Professionals (n = 85-86)	Dietitians (n = 84)
Proportion of people seen in practice with an eating disorder over the past year	Few (0-19%)	5 (5.8)	6 (7.1)
	Some (20-39%)	16 (18.6)	20 (23.8)
	Moderate (40-59%)	15 (17.4)	9 (10.7)
	Many (60-79%)	16 (18.6)	17 (20.2)
	Almost all (80-100%)	34 (39.5)	32 (38.1)
Proportion of people seen in practice with an eating disorder	Few (0-19%)	4 (4.7)	1 (1.2)
	Some (20-39%)	13 (15.3)	5 (6.0)

receiving care for their eating disorder, as opposed to other issues over the past year	Moderate (40-59%)	9 (10.6)	4 (4.8)
	Many (60-79%)	15 (17.6)	15 (17.9)
	Almost all (80-100%)	44 (51.8)	59 (70.2)

Note. *n* (%).

Health professionals indicated the treatment models used in provision of psychological treatment. The most common treatment models used by mental health clinicians in providing psychological treatment are shown in Table 6.29. Cognitive behaviour therapy – enhanced was used by almost all psychological treatment providers and both family based treatment for eating disorders and dialectical behaviour therapy were used by about half of psychological treatment providers.

Table 6.29. Eating disorder treatment models frequently used by mental health clinicians through the EDP (*n* = 81)

Treatment model	<i>n</i> (%)
Family based treatment (FBT) for eating disorders	44 (54.3)
Cognitive behaviour therapy - enhanced (CBT-E)	73 (90.1)
Cognitive behaviour therapy - guided self-help (CBT-GSH)	12 (14.8)
Specialist supportive clinical management (SSCM)	36 (44.4)
Maudsley model of anorexia treatment in adults (MANTRA)	19 (23.5)
Interpersonal psychotherapy (IPT)	27 (33.3)
Dialectical behaviour therapy (DBT)	44 (54.3)
Acceptance and commitment therapy	43 (53.1)
Adolescent focused therapy for eating disorders	14 (17.3)
Focal psychodynamic therapy for eating disorders	6 (7.4)
Schema therapy	32 (39.5)
Other	10 (12.3)

Note. Respondents could select more than one option.

Dietetic services providers indicated the dietetic-specific practices used when working with people with eating disorders. The most common dietetic-specific practices used by dietitians in providing dietetic services are shown in Table 6.30, with all components of practice used by most providers.

Table 6.30. Eating disorder practices used dietitians through the EDP (*n* = 76)

Dietetic-specific eating disorder practices	<i>n</i> (%)
Nutrition assessment (e.g., history, anthropometric measurements, review medical/physical findings, assessment of eating disorder beliefs/behaviours)	75 (98.7)
Nutrition diagnosis (e.g., taking into account intake, clinical findings)	72 (94.7)
Nutrition education	75 (98.7)
Nutrition intervention	75 (98.7)
Monitoring and evaluation	75 (98.7)
Other	17 (22.4)

Note. Respondents could select more than one option.

Health professionals who provide psychological treatment under the EDP indicated the ease or difficulty with which review requirements under the plan could be completed. A little under half perceived it to be easy for the people they support to obtain timely 10-, 20-, and 30-session reviews with a GP or other medical practitioner. However, overwhelmingly, mental health professionals indicated it is very difficult to obtain a timely 20-session review with a psychiatrist or paediatrician with appropriate knowledge, skills, and experience in eating disorders.

Table 6.31. Health professionals awareness of the process of providing treatment under the EDP (*n* = 81)

	Very easy	Somewhat easy	Neutral	Somewhat difficult	Very difficult	Not applicable
How easy or difficult has it been to obtain a timely 10-session review by a GP or other medical practitioner	6 (7.4)	33 (40.7)	11 (13.6)	23 (28.4)	7 (8.6)	1 (1.2)
How easy or difficult has it been to obtain a timely 20-session review by a GP or other medical practitioner?	6 (7.4)	31 (38.3)	10 (12.3)	21 (25.9)	13 (16.0)	0 (0)
How easy or difficult has it been to obtain a timely 30-session review by a GP or other medical practitioner?	5 (6.2)	33 (40.7)	11 (13.6)	25 (30.9)	7 (8.6)	0 (0)
How easy or difficult has it been to access a psychiatrist or paediatrician with appropriate knowledge, skills, and experience in eating disorders for a 20-session review?	2 (2.5)	3 (3.7)	1 (1.2)	19 (23.5)	55 (67.9)	1 (1.2)
How easy or difficult has it been to obtain a timely 20-session review by a psychiatrist or paediatrician?	1 (1.2)	2 (2.5)	2 (2.5)	22 (27.2)	53 (65.4)	1 (1.2)

Note. *n* (%).

When asked about their overall awareness of the EDP, health professionals who provide psychological treatment and who provide dietetic intervention under the EDP felt highly informed about how to use the EDP and associated Medicare items. There was a significant association between ANZAED credentialed status and degree of feeling informed about the EDP across mental health clinicians, $\chi^2 [12, n = 80] = 36.2, p < .001$, but not dietitians, $\chi^2 [6, n = 76] = 10.7, p = .098$ where credentialed clinicians felt more highly informed. There was no association between years practicing in profession and degree of feeling informed about the Eating Disorder Plan across mental health clinicians, $r[78] = .2, p = .068$. As shown in Table 6.32, mental health clinicians and dietitians perceived referring doctors and psychiatrists and paediatricians to be generally slightly or

moderately informed about how to use the EDP and most reported having to provide at least some support to other health professionals in using the EDP.

Table 6.32. Mental health clinicians and dietitians' awareness of the process of using the EDP

	<i>n</i> (%)	<i>n</i> (%)	<i>n</i> (%)	<i>n</i> (%)	<i>n</i> (%)
	Not at all aware	Slightly aware	Moderately aware	Highly aware	Very highly aware
To what extent have referring doctors been aware of the availability of the Eating Disorder Plan?					
Mental health professionals	5 (6.2)	21 (25.9)	38 (46.9)	15 (18.5)	2 (2.5)
Dietitians	1 (1.3)	38 (50.7)	32 (42.7)	2 (2.7)	2 (2.7)
	Not at all informed	Slightly informed	Moderately informed	Highly informed	Very highly informed
How do you feel about how to use the Eating Disorder Plan and associated Medicare items?					
Mental health professionals	1 (1.3)	9 (11.1)	22 (27.5)	33 (41.3)	15 (18.8)
Dietitians	0 (0)	5 (6.6)	30 (39.5)	32 (42.1)	9 (11.8)
How well informed do you feel referring doctors are about how to use the Eating Disorder Plan and associated Medicare Items?					
Mental health professionals	8 (10.0)	41 (51.2)	28 (35.0)	2 (2.5)	1 (1.3)
Dietitians	5 (6.6)	41 (51.2)	31 (40.8)	1 (1.3)	1 (1.3)
How well informed do you feel psychiatrists and paediatricians are about how to use the Eating Disorder Plan and associated Medicare Items?					
Mental health professionals ^a	6 (7.4)	29 (35.8)	29 (35.8)	9 (11.1)	6 (7.4)
Dietitians ^b	4 (5.4)	20 (27.0)	26 (35.1)	7 (9.5)	4 (5.4)
	No support	Very little support	Some support	Moderate support	A lot of support
What level of support have you had to provide to other health professionals to use the Plan and associated Medicare items to assist people accessing treatment?					
Mental Health Professionals	2 (2.5)	10 (12.3)	25 (30.9)	23 (28.4)	21 (25.9)
Dietitians	3 (3.9)	8 (10.5)	22 (28.9)	23 (30.3)	20 (26.3)

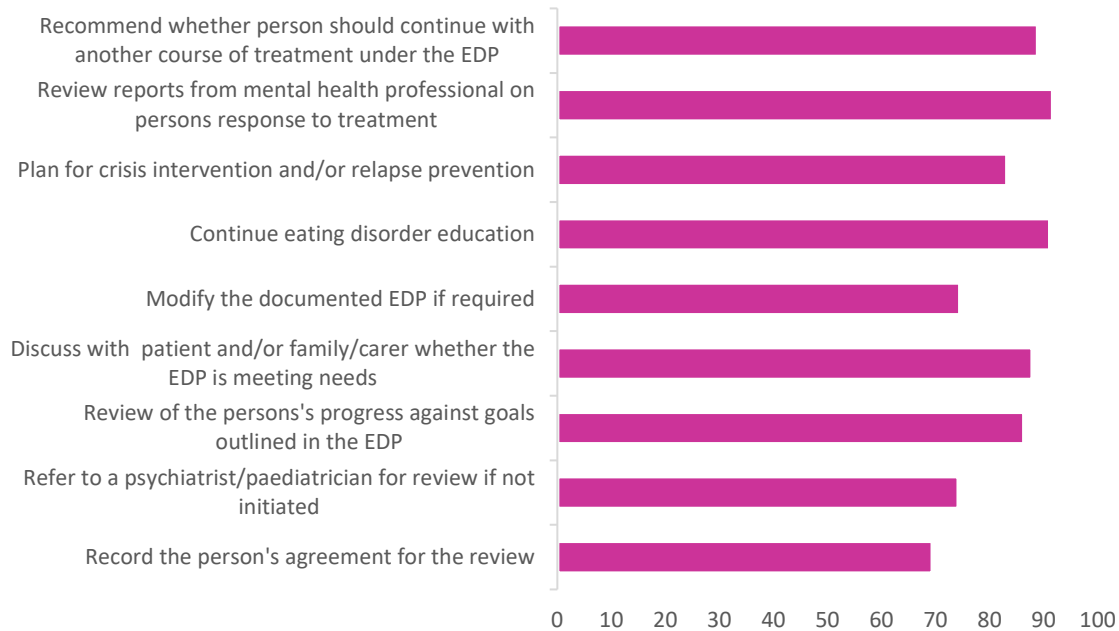
Note. ^a *n* = 2 responded Not applicable (2.5%), ^b *n* = 13 responded Not applicable (17.6%).

Reviewing the Eating Disorder Plan

Several tasks are required to be conducted during the 10-, 20-, and 30-session GP review and the 20-session psychiatrist or paediatrician review under the EDP. As shown in Figure 6.16, health professionals indicated the most commonly conducted task was reviewing reports from mental health clinicians and dietitians on the response to treatment of the person with the eating disorder, followed by continuing eating disorder education. Modifying the EDP documentation if required was conducted 75% of the time. In addition, health professionals who conduct reviews indicated how



frequently access to the next course of treatment is not recommended at reviews. For most respondents (85.7% of GPs and 83.3% of psychiatrists/paediatricians), access to the next course of treatment was not recommended only rarely (less than 20% of the time). A low proportion of respondents (12.2% of GPs and 16.7% of psychiatrists/paediatricians) did not recommend access to further treatment sometimes (20-39% of the time).

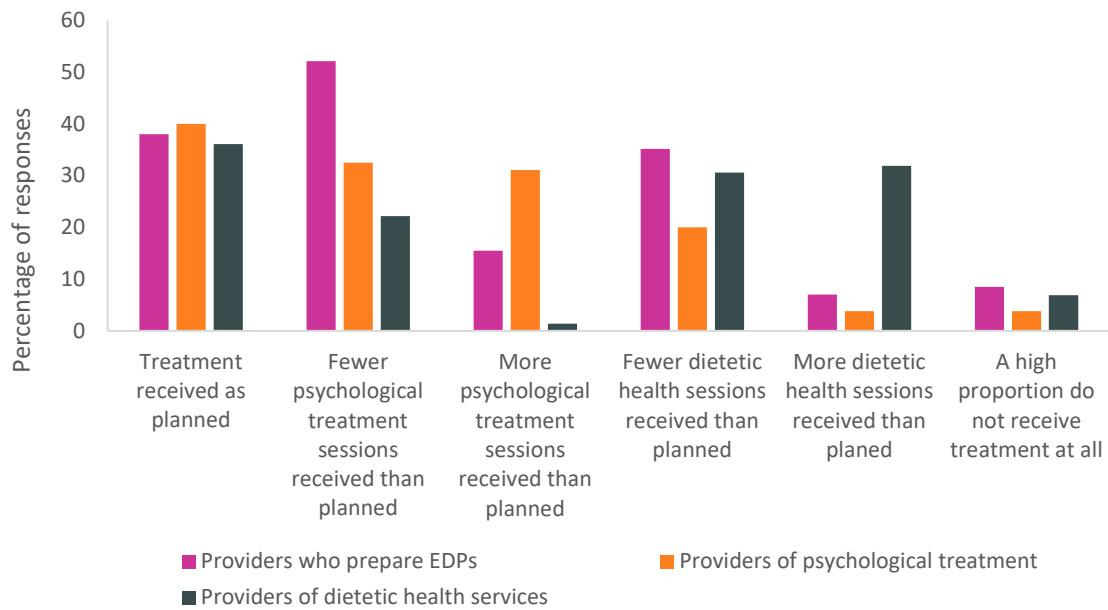


Note. EDP = Eating Disorder Plan.

Figure 6.16. Extent to which tasks associated with reviewing EDPs are completed at every review session

Health professional perspectives of the barriers of using the Eating Disorder Plan

While health professionals who prepare EDPs noted an initial expectation that the person with the eating disorder will access more than 20 psychological treatment sessions, this did not appear to translate into actual treatment sessions received. For example, health professionals who prepare EDPs reported that on average, about half of people (52.1%) using EDPs to support treatment instead receive fewer psychological treatment sessions than planned (Figure 6.17). Responses from health professionals who provide psychological treatment and dietetic sessions indicated that following the preparation of an EDP by a medical practitioner, fewer than half of people (36.1 – 40.0%) receive treatment sessions as initially expected. Discrepancies between dietitians and mental health professionals were evident in perceptions of the proportion of treatment seeking people who go on to receive more or fewer sessions than initially planned.



Note. Respondents could select more than one option.

Figure 6.17. Perceptions from health professionals as to whether people accessing the EDP receive treatment sessions as planned

Health professionals indicated several reasons why people accessing eating disorder treatment via the EDP do not receive treatment as initially planned. As shown in Table 6.33, long waitlists to access sessions and unaffordable treatment (gap) fees appeared to be the most prominent contributor to treatment not being received as planned as understood by health professionals.

Table 6.33. Health professional perspectives to contributing factors to people accessing eating disorder treatment via the EDP receiving fewer sessions than planned

	Contributes <i>n</i> (%)	Does not contribute <i>n</i> (%)	Unsure <i>n</i> (%)
The treatment (gap) fee is unaffordable/too expensive			
Providers who prepare EDPs	38 (80.9)	3 (6.4)	6 (12.8)
Providers of psychological treatment	32 (94.1)	1 (2.9)	1 (2.9)
Providers of dietetic health services	34 (91.9)	2 (5.4)	1 (2.7)
The waitlist to access sessions is too long			
Providers who prepare EDPs	38 (82.6)	4 (8.7)	4 (8.7)
Providers of psychological treatment	23 (67.6)	5 (14.7)	6 (17.6)
Providers of dietetic health services	18 (48.6)	14 (37.8)	5 (13.5)
The provider disagrees with the treatment plan indicated in the referral			

	Contributes <i>n</i> (%)	Does not contribute <i>n</i> (%)	Unsure <i>n</i> (%)
Providers who prepare EDPs	4 (9.5)	32 (76.2)	6 (14.3)
Providers of psychological treatment	3 (8.8)	18 (52.9)	13 (38.2)
Providers of dietetic health services	5 (13.5)	19 (51.4)	13 (35.1)
Further treatment is not recommended at the 10, 20, or 30 session GP review			
Providers who prepare EDPs	-	-	-
Providers of psychological treatment	7 (20.6)	21 (61.8)	7 (17.6)
Providers of dietetic health services	3 (8.1)	16 (43.2)	18 (48.6)
The 20-session Psychiatrist/Paediatrician reviews cannot be obtained at the right time to access further sessions			
Providers who prepare EDPs	34 (73.9)	8 (17.4)	4 (9.7)
Providers of psychological treatment	28 (82.4)	5 (14.7)	1 (2.9)
Providers of dietetic health services	14 (37.8)	4 (10.8)	19 (51.4)
Further treatment is not recommended at the 20-session Psychiatrist/Paediatrician review			
Providers who prepare EDPs	4 (9.3)	33 (76.7)	6 (14.0)
Providers of psychological treatment	6 (17.6)	20 (58.8)	8 (23.5)
Providers of dietetic health services	4 (10.8)	8 (21.6)	25 (67.6)
They find sessions to be unhelpful			
Providers who prepare EDPs	20 (47.6)	14 (33.3)	8 (19.0)
Providers of psychological treatment	13 (38.2)	12 (35.3)	9 (26.5)
Providers of dietetic health services	12 (32.4)	15 (40.5)	10 (27.0)
They find sessions to be very challenging			
Providers who prepare EDPs	26 (57.8)	12 (26.7)	7 (15.6)
Providers of psychological treatment	23 (67.5)	9 (26.5)	2 (5.9)
Providers of dietetic health services	22 (59.5)	7 (18.9)	8 (21.6)
Treatment or support is accessed in another way			
Providers who prepare EDPs	17 (39.5)	14 (32.6)	12 (27.9)
Providers of psychological treatment	13 (38.2)	8 (23.5)	13 (38.2)
Providers of dietetic health services	12 (32.4)	7 (18.9)	18 (48.6)
They do not engage with the referred services			
Providers who prepare EDPs	34 (77.3)	6 (13.6)	4 (9.1)
Providers of psychological treatment	26 (76.5)	6 (17.6)	2 (5.9)



	Contributes <i>n</i> (%)	Does not contribute <i>n</i> (%)	Unsure <i>n</i> (%)
Providers of dietetic health services	26 (72.2)	3 (8.3)	7 (19.4)

Note. Participants who indicated that treatment typically proceeds as planned were not asked to indicate why treatment does not proceed as planned.

As noted earlier, many people with lived experience of an eating disorder do not receive treatment for their eating disorder via the EDP. Mental health professionals indicated that the most common reason an EDP is not accessed is because a MHTP is used instead. Dietitians indicated that an EDP is commonly not accessed for provision of dietetic health services because referring doctors are not aware of the EDP.

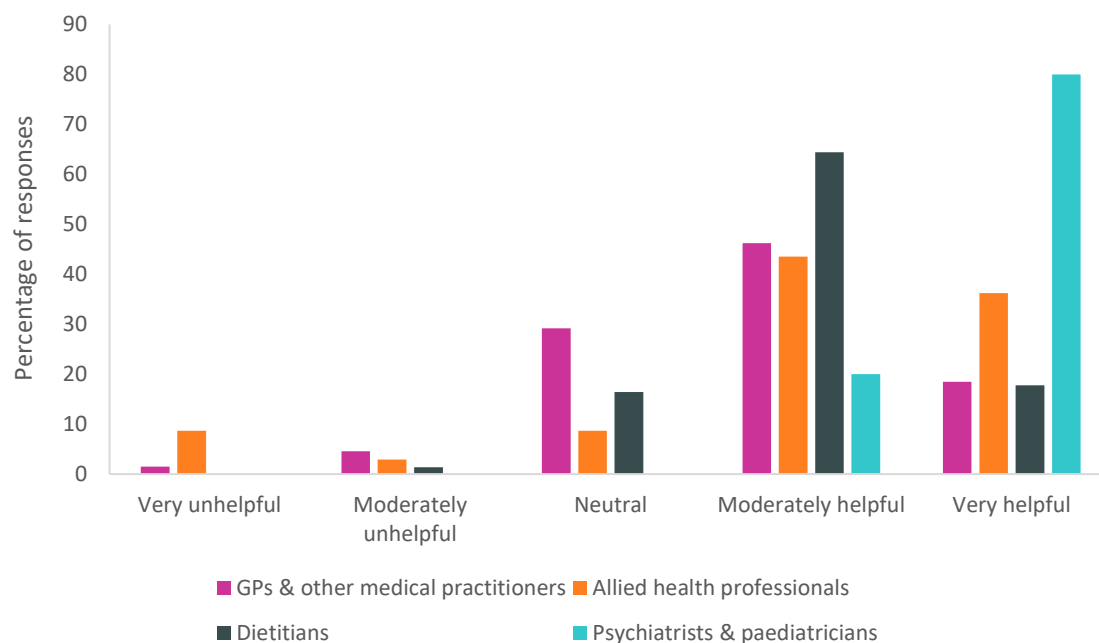
Table 6.34. Mental health clinician and dietitian perspectives on reasons treatment is not accessed via the EDP

	Mental Health Professionals (<i>n</i> = 85) <i>n</i> (%)	Dietitians (<i>n</i> = 83) <i>n</i> (%)
Not applicable, all are using the EDP	11 (12.9)	6 (7.2)
They are ineligible	47 (55.3)	50 (60.2)
They use the mental health care plan instead	54 (63.5)	11 (13.3)
They access public services	7 (8.2)	19 (22.9)
They use private health cover instead	14 (16.5)	23 (27.7)
They have financial constraints	12 (14.4)	27 (32.5)
They cannot access services due to long waiting lists	15 (17.6)	7 (8.4)
They are not aware of the Plan	23 (27.1)	40 (48.2)
Referring doctors are not aware of the Plan	25 (29.4)	53 (63.9)
Other	13 (15.3)	19 (22.9)

Note. Respondents could select more than one option.

Health professional perspectives of the helpfulness of the Eating Disorder Plan

Helpfulness of the EDP was explored across several domains. Regarding the helpfulness of the EDP for facilitating eating disorder recovery, most health professionals perceived it to be either moderately or very helpful. As shown in Figure 6.18, a higher proportion of psychiatrists and paediatricians viewed the EDP as being very helpful in facilitating eating disorder recovery, relative to GPs and other medical practitioners, dietitians, and allied health professionals who more frequently endorsed the EDP as being moderately helpful for facilitating recovery.



Note. Allied health professionals refers to mental health allied health professionals.

Figure 6.18. Health professional perspectives on the helpfulness of the EDP for facilitating eating disorder recovery

Across all health professionals, the EDP was viewed as very helpful for increasing access to eating disorder treatment for those in need but less so for reducing fear or doubts about treatment (see Table 6.35).

Table 6.35. Health professional perspectives on the helpfulness of the EDP for people with eating disorders

	Very unhelpful	Moderately unhelpful	Neutral	Moderately helpful	Very helpful
For increasing access to eating disorder treatment for those in need (<i>n</i> = 213)	7 (3.3)	4 (1.9)	9 (4.2)	73 (34.3)	120 (56.3)
For increasing motivation (<i>n</i> = 213)	8 (3.8)	11 (5.2)	72 (33.8)	84 (39.4)	38 (17.8)
For increasing engagement (<i>n</i> = 212)	6 (2.8)	8 (3.8)	67 (31.6)	91 (42.9)	40 (18.9)
For facilitating good therapeutic alliance (<i>n</i> = 212)	5 (2.4)	9 (4.2)	74 (34.9)	83 (39.2)	41 (19.3)
For reducing fear or doubts about the treatment (<i>n</i> = 212)	8 (3.8)	20 (9.4)	101 (47.6)	61 (28.8)	22 (10.4)

Note. *n* (%).

As shown in Figure 6.19, perceptions of the EDP in supporting coordinated, well-functioning multidisciplinary treatment were varied. Most psychiatrists and paediatricians agreed that the EDP very much supports coordinated, well-functioning multidisciplinary treatment, however responses from allied (mental) health professionals and dietitians reported lower levels of endorsement of the EDP as supporting coordination of multidisciplinary treatment.

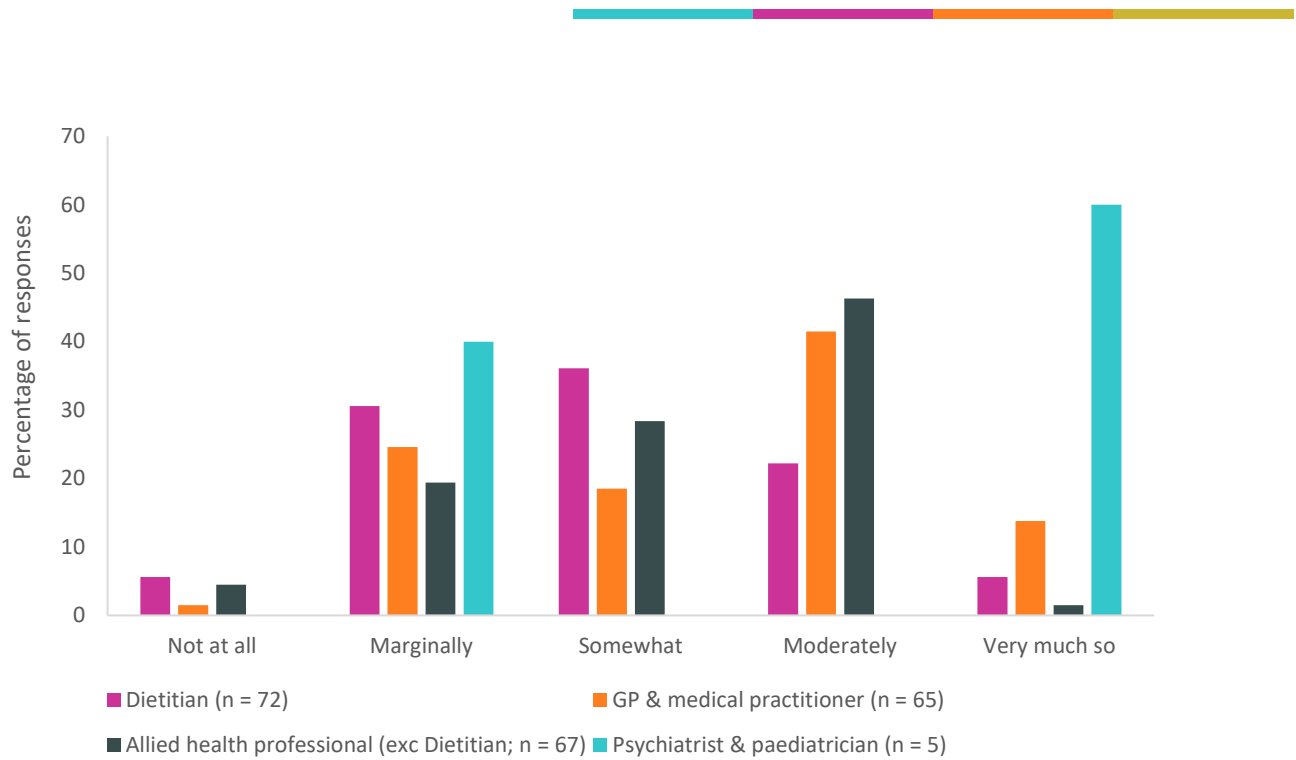


Figure 6.19. Health professional perspectives on the extent to which the EDP supports coordinated, well-functioning multidisciplinary treatment

Similarly, when asked about the extent to which the EDP facilitates communication between health professionals involved in the provision of the Plan, psychiatrists and paediatricians agreed that the EDP very much supports communications, whereas allied (mental) health professionals and dietitians reported lower levels of endorsement.

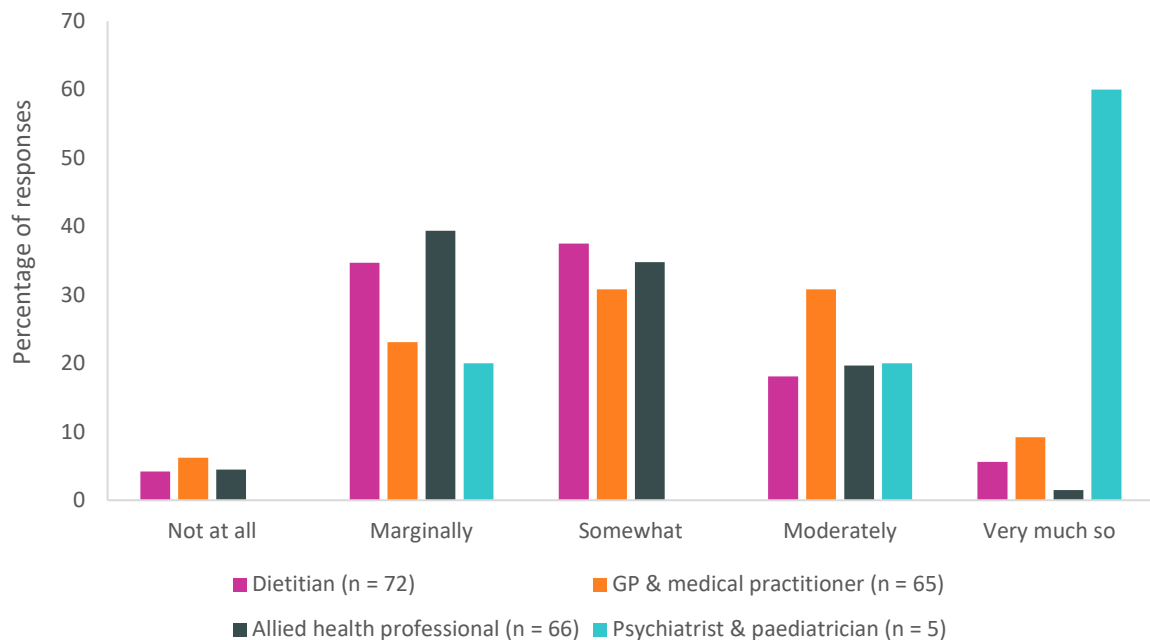


Figure 6.20. Health professional perspectives on the extent to which the EDP facilitates communication between health professionals involved in the provision of the EDP

When asked about their perspectives on the newly available MBS items for mental health case conferencing available for people accessing treatment under an EDP (introduced July 2023), more than a quarter of health professionals indicated that they were unaware that these items existed. As shown in Figure 6.21, of those who were aware of the items, variability in the perception of the extent to which the availability of the items improved the ability of health professionals to provide well-functioning multi-disciplinary treatment for people with eating disorders accessing treatment under the EDP was evident. Similar perceptions were indicated for the items' ability to improve health professionals' communication with other health professionals involved in multidisciplinary treatment under the EDP.

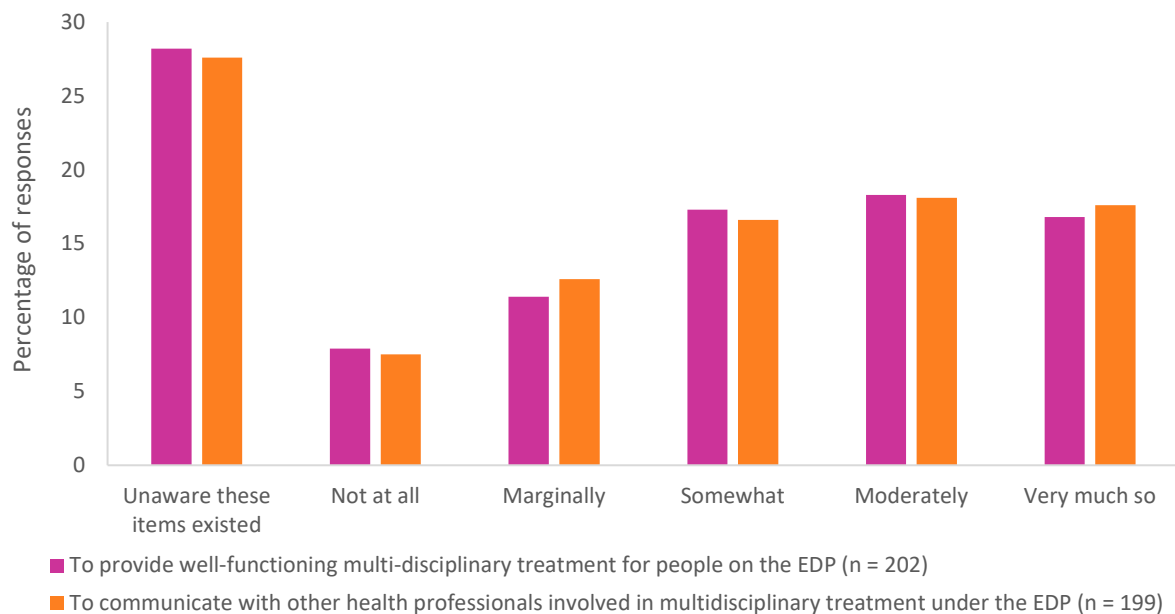


Figure 6.21. Health professional perspectives on the newly available mental health case conferencing items

Overall perceptions of the Eating Disorder Plan

All survey respondents were asked to provide their views on requirements within the EDP. Topics that were explored were the eligibility criteria, the requirement for health services under the EDP to be delivered by health professionals with the knowledge, skills, and experience in providing treatment to people with eating disorders, and the importance of using evidence-based treatment or evidence-informed intervention.

Regarding eligibility criteria for the EDP and whether each criterion impacts access to these services for people who need treatment, health professionals, people with lived experience of an eating disorder, and people with lived experience of caring for someone with an eating disorder agreed that several of the criterion are too restrictive and prevent access to those who need it. For example, as shown in Table 6.36, the requirement of a diagnosis of anorexia nervosa (as a standalone criterion), for the person to be admitted to a hospital for an eating disorder in the previous 12 months, and the need to meet several criteria concurrently for people with diagnoses other than anorexia nervosa to be eligible for the EDP were viewed as too restrictive, preventing access to the EDP for people who need it.

Table 6.36. Perceptions of the eligibility criteria for the EDP among health professionals, people with lived experience of an eating disorder, and people with lived experience of caring for someone with an eating disorder

	Total	Health professionals	People with lived experience of an eating disorder	People with lived experience of caring for someone with an eating disorder
	<i>n</i> (%)	<i>n</i> (%)	<i>n</i> (%)	<i>n</i> (%)
Diagnosis of anorexia nervosa				
Too restrictive and prevents access to those who need it	438 (56.3)	103 (51.8)	270 (63.7)	55 (40.1)
Provide appropriate access matched to need	225 (29.6)	84 (42.2)	96 (22.6)	45 (32.8)
Too open and allows more people access than needed it	13 (1.7)	4 (2.0)	7 (1.7)	2 (1.5)
Unsure	94 (12.4)	8 (4.0)	51 (12.0)	35 (25.5)
Criteria A: A high score on the Eating Disorder Examination-Questionnaire (standard pencil-and-paper questionnaire about eating disorder symptoms)				
Too restrictive and prevents access to those who need it	220 (31.0)	69 (36.7)	105 (26.5)	46 (36.5)
Provide appropriate access matched to need	378 (53.2)	108 (57.4)	232 (58.6)	38 (30.2)
Too open and allows more people access than needed it	13 (1.8)	4 (2.1)	9 (2.3)	0 (0)
Unsure	99 (13.9)	7 (3.7)	50 (12.6)	42 (33.3)
Criteria B: Rapid weight loss or frequent (at least 3 times per week) binge eating or inappropriate compensatory behaviours				
Too restrictive and prevents access to those who need it	324 (45.8)	87 (46.8)	190 (48.2)	47 (36.7)
Provide appropriate access matched to need	305 (43.1)	87 (46.8)	172 (43.7)	46 (35.9)
Too open and allows more people access than needed it	11 (1.6)	5 (2.7)	4 (1.0)	2 (1.6)
Unsure	68 (9.6)	7 (3.8)	28 (7.1)	33 (25.8)
Criteria C: Clinically underweight with body weight less than 85% of expected weight where weight loss is directly attributable to the eating disorder				
Too restrictive and prevents access to those who need it	499 (70.6)	135 (72.6)	304 (77.0)	60 (47.6)
Provide appropriate access matched to need	132 (18.7)	41 (22.0)	56 (14.2)	35 (27.8)
Too open and allows more people access than needed it	13 (1.8)	2 (1.1)	8 (2.0)	3 (2.4)
Unsure	63 (8.9)	8 (4.3)	27 (6.8)	28 (22.2)
Criteria D: Current or high risk of medical complications due to eating disorder behaviours and symptoms				

	Total	Health professionals	People with lived experience of an eating disorder	People with lived experience of caring for someone with an eating disorder
Too restrictive and prevents access to those who need it	271 (38.4)	65 (34.9)	163 (41.4)	43 (34.1)
Provide appropriate access matched to need	366 (51.8)	106 (57.0)	204 (51.8)	56 (44.4)
Too open and allows more people access than needed it	9 (1.3)	3 (1.6)	4 (1.0)	2 (1.6)
Unsure	60 (8.5)	12 (6.5)	23 (5.8)	25 (19.8)
Criteria E: Presence of other serious comorbid medical or psychological conditions significantly impacting on medical or psychological health status with impacts on function				
Too restrictive and prevents access to those who need it	174 (24.5)	43 (22.9)	95 (24.1)	36 (28.3)
Provide appropriate access matched to need	433 (61.0)	134 (71.3)	242 (61.3)	57 (44.9)
Too open and allows more people access than needed it	24 (3.4)	3 (1.6)	18 (4.6)	3 (2.4)
Unsure	79 (11.1)	8 (4.3)	40 (10.1)	31 (24.4)
Criteria F: The person has been admitted to a hospital for an eating disorder in the previous 12 months				
Too restrictive and prevents access to those who need it	383 (53.9)	97 (51.6)	235 (59.5)	51 (40.2)
Provide appropriate access matched to need	244 (34.4)	79 (42.0)	123 (31.1)	42 (33.1)
Too open and allows more people access than needed it	9 (1.3)	2 (1.1)	4 (1.0)	3 (2.4)
Unsure	74 (10.4)	10 (5.3)	33 (8.4)	31 (24.4)
Criteria G: Inadequate treatment response to evidence-based eating disorder treatment over the past six months despite active and consistent participation				
Too restrictive and prevents access to those who need it	271 (38.5)	76 (39.9)	154 (39.3)	42 (33.9)
Provide appropriate access matched to need	314 (44.6)	94 (50.0)	180 (45.9)	40 (32.3)
Too open and allows more people access than needed it	9 (1.3)	2 (1.1)	5 (1.5)	2 (1.6)
Unsure	110 (15.6)	17 (9.0)	53 (13.5)	40 (32.3)
The need to meet both A and B above and at least 2 of the criteria presented in C to G to be eligible for the EDP				
Too restrictive and prevents access to those who need it	460 (65.3)	130 (70.3)	262 (66.5)	68 (54.4)
Provide appropriate access matched to need	135 (19.2)	42 (22.7)	75 (19.0)	18 (14.4)
Too open and allows more people access than needed it	14 (2.0)	2 (1.1)	8 (2.0)	4 (3.2)
Unsure	95 (13.5)	11 (5.9)	49 (12.4)	35 (28.0)

Health professionals, people with lived experience of an eating disorder, and people with lived experience of caring for someone with an eating disorder endorsed that it is important for health services to be delivered by health professionals with knowledge, skills, and experience in providing treatment to people with eating disorders. Across respondents, a higher proportion perceived that it was very important for mental health professionals and dietitians providing psychological treatment and dietetic services, respectively to have the appropriate knowledge, skill, and experience, relative to the lower proportion who perceived that it was important for health professionals preparing the plan and providing review sessions to have these attributes (Table 6.37). Regarding the latter, people with lived experience of caring for someone with an eating disorder tended to endorse the importance of health professionals preparing the plan and providing review sessions holding appropriate knowledge, skill, and experience at higher rates than other groups of respondents.

Table 6.37. Perceptions by health professionals, people with lived experience of an eating disorder, and people with lived experience of caring for someone with an eating disorder of the importance of health services provided through the EDP being delivered by health professionals with the knowledge, skills, and experience in providing treatment

	Total	Health professionals	People with lived experience of an eating disorder	People with lived experience of caring for someone with an eating disorder
Preparing the Plan – General practitioners, psychiatrists, or paediatricians				
Not at all important	4 (0.6)	1 (0.5)	3 (0.8)	0 (0)
Marginally important	10 (1.4)	2 (1.1)	5 (1.3)	3 (2.3)
Somewhat important	65 (9.3)	23 (12.5)	33 (8.6)	9 (6.9)
Moderately important	147 (21.0)	45 (24.5)	86 (22.3)	16 (12.2)
Very important	474 (67.7)	113 (61.4)	258 (67.0)	103 (78.6)
Providing psychological treatment sessions – Mental health professional				
Not at all important	1 (0.1)	0 (0)	1 (0.3)	0 (0)
Marginally important	3 (0.4)	1 (0.5)	2 (0.5)	0 (0)
Somewhat important	13 (1.9)	4 (2.2)	7 (1.8)	2 (1.5)
Moderately important	56 (8.0)	16 (8.7)	34 (8.8)	6 (4.6)
Very important	626 (89.6)	163 (88.6)	341 (88.6)	122 (93.8)
Providing dietetic health sessions – dietitians				
Not at all important	7 (1.0)	0 (0)	6 (1.6)	1 (0.8)
Marginally important	12 (1.7)	0 (0)	10 (2.6)	2 (1.6)
Somewhat important	36 (5.2)	4 (2.2)	24 (6.3)	8 (6.2)
Moderately important	79 (11.4)	21 (11.5)	50 (13.1)	8 (6.2)
Very important	561 (80.7)	158 (86.3)	293 (76.5)	110 (85.3)
Providing review sessions – General practitioners, psychiatrists, or paediatricians				
Not at all important	5 (0.7)	0 (0)	5 (1.3)	0 (0)
Marginally important	13 (1.9)	2 (1.1)	8 (2.1)	3 (2.3)
Somewhat important	57 (8.2)	16 (8.7)	32 (8.3)	9 (6.9)
Moderately important	172 (24.6)	50 (27.2)	108 (28.1)	14 (10.8)
Very important	452 (64.7)	116 (63.0)	232 (60.3)	104 (80.0)

Note. n (%).

Across health professionals, people with lived experience of an eating disorder, and people with lived experience of caring for someone with an eating disorder, the importance of using evidence-based treatment or evidence-informed dietetic intervention and having health professionals who are trained in evidence-based practice was of high importance.

Table 6.38. Perceptions of health professionals, people with lived experience of an eating disorder, and people with lived experience of caring for someone with an eating disorder of the importance of health professionals delivering EDP services providing and being trained in evidence-based practice

	Total	Health professionals	People with lived experience of an eating disorder	People with lived experience of caring for someone with an eating disorder
Psychological treatment services are evidence based				
Not at all important	9 (1.3)	0 (0)	7 (1.8)	2 (1.6)
Marginally important	14 (2.0)	2 (1.1)	10 (2.6)	2 (1.6)
Somewhat important	56 (8.1)	9 (4.9)	32 (8.4)	15 (11.6)
Moderately important	144 (20.7)	39 (21.4)	90 (23.5)	15 (11.6)
Very important	471 (67.9)	132 (72.5)	244 (63.7)	95 (73.6)
Dietetic health services are evidence-informed				
Not at all important	7 (1.0)	2 (1.1)	5 (1.3)	0 (0)
Marginally important	13 (1.9)	0 (0)	10 (2.6)	3 (2.3)
Somewhat important	48 (6.9)	6 (3.3)	30 (7.9)	12 (9.4)
Moderately important	146 (21.1)	37 (20.4)	84 (22.0)	25 (19.5)
Very important	477 (69.0)	136 (75.1)	253 (66.2)	88 (68.8)
Mental health professionals are trained in evidence-based specific eating disorder treatment				
Not at all important	6 (0.9)	0 (0)	6 (1.6)	0 (0)
Marginally important	8 (1.2)	0 (0)	7 (1.8)	1 (0.8)
Somewhat important	39 (5.7)	7 (3.9)	23 (6.0)	9 (7.0)
Moderately important	117 (17.0)	28 (15.5)	64 (16.8)	25 (19.5)
Very important	520 (75.4)	146 (80.7)	281 (73.8)	93 (72.7)
Dietitians are trained in evidence-informed dietetic practice for eating disorders				
Not at all important	5 (0.7)	1 (0.5)	4 (1.0)	0 (0)
Marginally important	10 (1.4)	2 (1.1)	7 (1.8)	1 (0.8)
Somewhat important	38 (5.5)	4 (2.2)	24 (6.3)	10 (7.9)
Moderately important	109 (15.8)	26 (14.3)	60 (15.7)	23 (18.1)
Very important	529 (76.6)	149 (81.9)	287 (75.1)	93 (73.2)
GPs, psychiatrists, and paediatricians who conduct reviews are trained in eating disorder-specific practice				
Not at all important	2 (0.3)	0 (0)	2 (0.5)	0 (0)
Marginally important	12 (1.7)	4 (2.2)	5 (1.3)	3 (2.3)
Somewhat important	69 (10.0)	22 (12.2)	37 (9.7)	10 (7.8)
Moderately important	141 (20.4)	36 (20.0)	81 (21.2)	24 (18.8)
Very important	466 (67.5)	118 (65.6)	257 (67.3)	91 (71.1)

Note. n (%).




Discussion

The present study sought to explore the perspectives and experiences of using the Eating Disorders Medicare Benefits Schedule items from people with lived experience of an eating disorder, people with lived experience of caring for someone with an eating disorder, and health professionals who provide services using the items. We explored the awareness and use of the Eating Disorders MBS items, including the perceptions of their helpfulness, the processes involved in using the items, and views on the requirements of the EDP.

Overall, we found agreement among people with lived eating disorder experience, people with lived experience of caring for someone with an eating disorder, and health professionals that the Eating Disorders MBS items contributed to positive outcomes and facilitated recovery from eating disorders. Importantly, the EDP was also perceived to provide significant benefits and improvements over other eating disorder treatment options in Australia. However, several limitations to their use exist, demonstrating the need for refinement to maximise the potential future benefits of the EDP. For example, people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder noted that the out-of-pocket cost of treatment access via the EDP was too expensive, wait times to access treatment were long, and showed an overall low degree of awareness of the availability of services offered through the EDP. Similarly, health professionals indicated a perceived lack of awareness on the part of other service providers in using the EDP. These perceptions by people with lived experience of eating disorders of some of the difficulties associated with the EDP are consistent with barriers to eating disorder treatment that have been observed elsewhere ³. In addition, views on some of the requirements and processes of the EDP suggest that the processes as they are currently implemented limit the positive outcomes that may result from this initiative. These include lower perceived ease by GPs in determining eligibility for the EDP for people with eating disorders not characterised by underweight, lack of availability of specialists to conduct the 20-session review, and low endorsement of review sessions as being helpful for their intended purpose of reviewing progress and canvassing new approaches to eating disorder treatment if necessary.

This study benefits from incorporating the unique perspectives of health professionals and people with lived experience of caring for someone with an eating disorder, who are often overlooked in eating disorder research ⁴. Indeed, the impacts on people with lived experience of caring for someone with an eating disorder can include the negative outcomes caused by the demands of providing care, direct and indirect financial impacts, resource burden, and emotional impacts ^{5,6}. Within the context of the broader evaluation project, this was the only study to explore lived experience and health professional perspectives in a manner that allowed direct comparisons across the stakeholder groups. Comparing perspectives provided in-depth understanding of the ways in which the items are used and outcomes from their use. Furthermore, this study explored eating disorder treatment and management pathways beyond the EDP, such as the Better Access initiative, which permitted comparisons between treatment pathways to be explored. This comparison provided good understanding of the ways in which the EDP was seen to provide improvements over other treatment pathways.

The study also had limitations. It is noted that participants were recruited via convenience sampling through personal and professional networks, social media, community networks, and professional



membership organisations. As a result, this limits the generalisability of our findings to predominately female-identifying people, who were born in Australia, live in a major city, and of neither Aboriginal nor Torres Strait Islander origin. Furthermore, it may be the case that the health professionals recruited as part of this study were more invested within the eating disorder field than the average health professional. For example, findings provided by GPs and other medical practitioners indicated that overall they were informed on use of the EDP and associated MBS items, however this did not sit in line with the perspectives of health professionals who provide treatment and people with lived experience of an eating disorder who noted that this group were often unaware of the Eating Disorders MBS items.

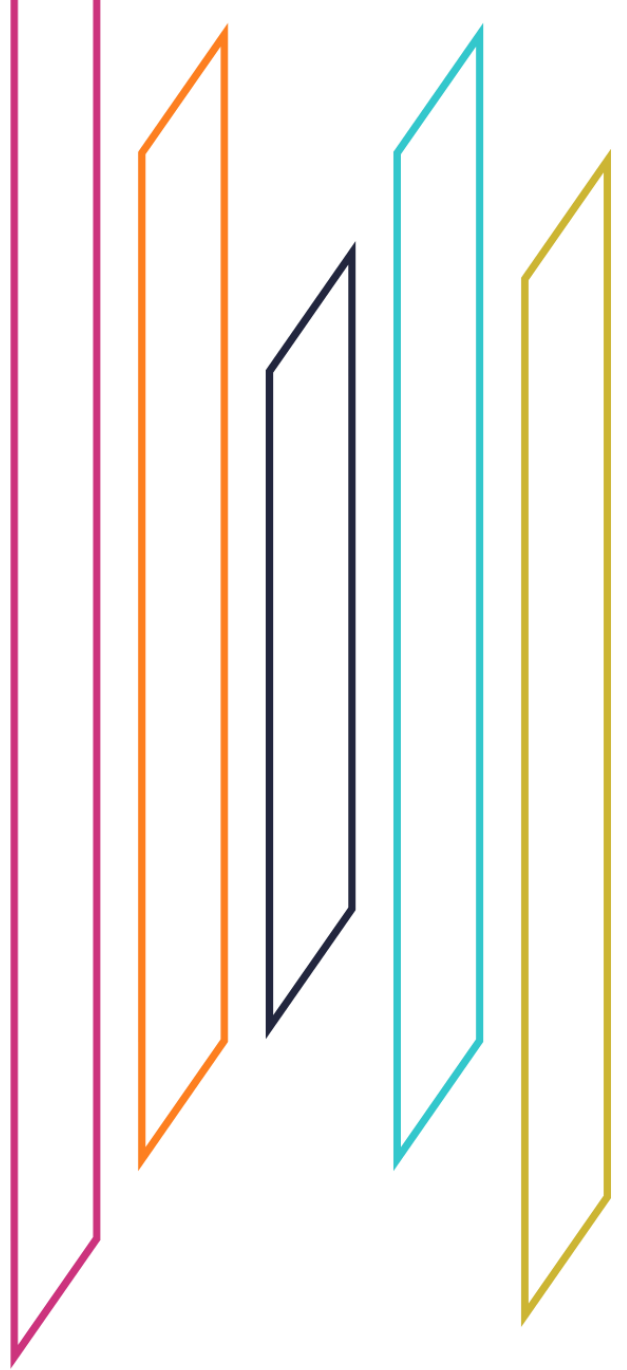
In summary, the present study is an account of the community survey data collected as part of the larger Eating Disorders MBS Evaluation project that explored the perspectives and experiences of the Eating Disorders MBS items from people with lived experience of an eating disorder, people with lived experience of caring for someone with an eating disorder, and health professionals with experience using the items. While it was noted that the EDP provides significant benefits for the delivery of eating disorder treatment within Australia, several limitations to utilisation were also noted. This study provides a unique frame of reference to the larger evaluation project through the recruitment of health professionals and people with lived experience of caring for someone with an eating disorder, and by exploring the EDP's relationship to other eating disorder treatment and management pathways in Australia.



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Chapter 7.
A qualitative
inquiry into the
Eating Disorders
MBS items
(Study 7)





Chapter 7. A qualitative inquiry into the Eating Disorders MBS items (Study 7)

Perspectives and experiences of people with lived experience of eating disorders, people with lived experience of caring for someone with an eating disorder, and health professionals.

Introduction

In November 2019, the Australian Government introduced new eating disorder treatment items to the Medicare Benefits Schedule (MBS) with the vision of enhancing treatment outcomes for individuals with eating disorders through expanded treatment offerings, more pathways for care, and extended number of sessions available per year. To date, the efficacy of this approach and whether the items are functioning as intended with health professionals, people with lived experience of eating disorder symptoms, and people caring for someone with an eating disorder remains unclear and needs empirical evaluation.

This technical report is an account of a qualitative study, part of the larger project evaluating the Eating Disorders MBS items that sought to explore perspectives and experiences of using these new items from key stakeholder groups via in-depth semi structured interviews. The targeted key stakeholder groups include health professionals (i.e., general practitioners [GP], paediatricians, psychiatrists, psychologists, dietitians, occupational therapists, and social workers), those caring for people who experience eating disorder symptoms, and people with lived or living experience of an eating disorder.

Aims of the study

This qualitative study was contextualised within the larger evaluation project that addresses five key objectives:

1. Examine the utilisation of the Eating Disorders MBS items
2. Examine the relationship between the Eating Disorders MBS items and other related MBS items
3. Consider whether the Eating Disorders MBS items have improved access to treatment services
4. Determine if the Eating Disorders MBS items improve patient outcomes
5. Develop recommendations to inform ongoing success of the Eating Disorders MBS Items

Seven key evaluation questions (KEQ) were identified, and this study collects detailed information that aimed to contribute to answering KEQ1 (utilisation), KEQ2 (effectiveness), KEQ3 (relation to other initiatives), KEQ4 (clinician questions), KEQ5 (carer questions), KEQ6 (consumer questions), KEQ7 (policy implications). Therefore, the research question was:

What are the perspectives and experiences of health professionals (i.e., general practitioners, paediatricians, psychiatrists, psychologists, dietitians, occupational therapists, and social workers), carers of individuals who experience eating disorder symptoms, and people with lived experience of an eating disorder who are using or engaging with the new Eating Disorders MBS items.



Methods

A phenomenological research design supported by constructivist grounded theory has been used to construct a narrative about the specific phenomenon of using or engaging with the Eating Disorders MBS items. This combination of research designs will ensure an acknowledgement of the existence of multiple perspectives of a specific phenomenon. Phenomenology will assist researchers in understanding the subjective experiences and their meaning while gaining insight into participants' actions and motivations¹. Constructivist grounded theory explores participants' experiences and perspectives to construct an interpretive narrative of these experiences and their interpretations²⁻⁴. In line with the research design chosen for this study, rich data collection in the form of in-depth interviews was implemented.


Sampling and participants

Determining an appropriate sample size in qualitative research is difficult and has long been the topic of debates⁵. Sample size has been widely guided by the concept of data saturation⁶. Data saturation occurs when no new information, issue, or insight is generated and data becomes repetitive⁷. Recent evidence shows that data saturation can be reached after completing between 9 and 17 interviews, particularly in studies where the population is mostly homogenous and the research questions and objective are well defined⁷. Other authors support similar numbers of participants (e.g., 6 to 16 participants)⁸

In this study, the research questions and objectives were clearly defined. In addition, the parameters of the work of health professionals within the Eating Disorders MBS items are clearly defined including the people they can work with based on specific eligibility criteria, the therapies they can offer, and the implementation of the Eating Disorder Plan (e.g., number of sessions, review points, duration of treatment). GPs, paediatricians, and psychiatrists have different roles, and dietitians have more flexibility in the interventions they can use than mental health clinicians (i.e., psychologists, social workers, and occupational therapists). Based on this information and evidence from the literature, the sample size for health professionals was set at 20 participants per discipline group.

To be eligible for the Eating Disorder Plan under the Eating Disorders MBS items, a person needs to meet specific criteria. They must be diagnosed either with 1) anorexia nervosa or 2) with bulimia nervosa, binge eating disorder (BED) or other specified feeding or eating disorders (OSFED). People who fall in the second category must meet further criteria: have a score of ≥ 3 on the Eating Disorder Examination-Questionnaire (EDE-Q) and their condition must be characterised by rapid weight loss, frequent binge eating, or inappropriate compensatory behaviours that occurs 3 or more times per week. These people must also present two of the following characteristics: underweight with a body weight less than 85% of their expected weight where the weight loss is directly attributable to the eating disorder, current or high risk of medical complications because of the eating disorder behaviours and symptoms, significant functional impairment resulting from serious comorbid medical or psychological conditions, admission to a hospital for an eating disorder in the previous 12 months, poor/no treatment response to evidence-based eating disorder treatment over the past 6 months despite active and consistent participation⁹.

Based on these specific eligibility criteria, the types of eating disorders and their clinical presentations can be vastly different and may be influenced by several factors (e.g., age, gender, age



at onset, duration of illness). Consequently, this diversity in experiences is also assumed in their family/person caring for them. To enable the research team to capture this diversity, the intended sample size was 50 people with lived experience of caring for individuals who experience eating disorder symptoms and 50 people with lived experience of an eating disorder.

Recruitment

Participants were recruited in multiple ways. First, they were invited to provide their contact details at the end of a survey completed in Study 6 of the larger project. Participants were asked the following question:


We are interested in further understanding your own experiences of using these new Eating Disorders MBS items and the impacts, barriers, and enablers to these item's uptake. To do this, we would like to invite you to participate in a confidential online interview scheduled via zoom at time convenient for you. The interview will take approximately 45 minutes.

Would you be interested in participating in an interview or finding out more about this study?

Participants who agreed were invited to add their name and preferred contact detail or email address. The 150 participants who provided their details were emailed and two more reminder emails were sent between 3 September 2023 and 17 November 2023. After this date, Study 6's survey was closed. These 150 people represented any of the participant group, including health professionals, people with lived experience of an eating disorder, and people with a lived experience of caring for someone with an eating disorder.

Furthermore, several organisations were contacted and invited to disseminate information about the study. They were provided with a recruitment flyer to post and distribute across their networks via their mailing list and social media platforms. These organisations included: the Butterfly Foundation, Eating Disorders Queensland; Eating Disorders Victoria (EDV), National Eating Disorders Collaboration (NEDC), Eating Disorders Families Australia (EDFA), Carer Gateway, Tandem, Satellite Foundation, and Carers NSW. Databases of clinicians providing eating disorder treatment (ANZAED Credentialing Program, Butterfly Foundation referral database, InsideOut Institute Treatment Services database) were used to identify eating disorders clinicians. Lead researchers of the Australian Eating Disorder Research and Translation Centre were contacted individually and provided with detailed information about this study. Eating disorder clinics and private practices were also contacted. Multiple posts were made on social media platforms like LinkedIn, X, and Facebook groups. Professional associations were also contacted and disseminated information about the study. In addition, all participants were invited to share the information about the study across their networks and social media platforms. Recruitment was also facilitated through researchers' professional networks. All participants were invited, at the end of their interview and via further email communication, to share the information about this study to people they knew who potentially met or who could meet the inclusion criteria.

The Australian Medical Publishing Company (AMPCo) was also involved in facilitating the recruitment of psychiatrists, GPs, and paediatricians. To do this, AMPCo sent an email, including two reminders, to the list of medical doctors they have access to. This email had a direct link to the principal researcher's email address to indicate interest in participating in the study.



People interested in participating in the study were invited to contact the principal researcher who verified that they met the inclusion criteria. All participants who met these criteria were sent a plain language statement that further explained the study. Health professionals and people with a lived experience of caring for someone with an eating disorder were asked to return a signed consent form. People with lived experience of an eating disorder were asked to provide consent at the start of their interview.


Once participants either returned their signed consent form or confirmed their interest in participating in the study after having read the plain language statement, a date and time that suited participants for an interview was determined.

Data collection methods

Five interview guides were developed for this study. Interview guides were informed by the KEQ and the overall aim of the study. They were tailored to the experiences of GPs, health professionals (psychologists, social workers, occupational therapists, dietitians, psychiatrists, and paediatricians), people with lived experience of an eating disorder, and people with a lived experience of caring for someone with an eating disorder. Interviewing guides were reviewed by a person with lived experience of an eating disorder before data collection commenced.

The interviewing guide, provided in Appendix 7.1 – 7.5, began with a series of demographic questions to describe the participants. Questions about age, relationship with the person with an eating disorder (for those caring for someone with an eating disorder), and discipline, highest qualification, type of employment, workplace setting, and number of people with eating disorders seen per month (for health professionals) were asked. The guides also included questions about the implementation of the Eating Disorder Plan from beginning to end, asking participants about the different steps and their experiences throughout the implementation of the plan. While health professionals described how they initiated and implemented the plan and discussed the reviews needed across the entire plan, people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder were asked about their experience of being taken through the plan, receiving the treatment, and the support provided during the implementation of the plan. For health professionals, questions also focussed on the types of interventions, the confidence in implementing the plan, the eating disorder training received, and skills needed for the best implementation possible, the collaborations between different stakeholders, and whether some parts of the plan are easier to implement or go through than others. All participants were asked to reflect on their experiences and share what they felt worked well and what could be improved.

All interviews were conducted via Zoom video conferencing enabling recording and transcription functionality. Interviews lasted between 30 and 60 minutes. The interviews were recorded and transcribed for data analysis purposes. Participants were remunerated for their participation. Health professionals received a \$AUD200 voucher in appreciation of their time. This amount of money aligns with remuneration of health professionals. Incentive is important for this group who are notably difficult to recruit. People with lived experience of an eating disorder and those caring for them received a \$AUD100 voucher.



The difference in remuneration between health professionals and people with lived experience in no way represents a lack of understanding, appreciation, or recognition of the values of their contribution to this study. The difference in remuneration was based on alignment with the hourly rate of health professionals, a cohort renowned to be difficult to recruit.

Interview transcripts produced by the transcription functionality in Zoom were verified by researchers before being sent to participants for member checking. Participants had two weeks to return their transcript. Once they were returned, names were replaced by pseudonyms, and identifying information was removed.

Data analysis methods

Data were analysed using inductive reflexive thematic analysis⁸ and the open, organic approach to data analysis proposed by Charmaz³ within a constructivist grounded theory framework which influenced the overall analytic approach.


Reflexive thematic analysis was guided by the six-phase guide developed by Braun and Clarke⁸. The first phase involved the researchers becoming immersed within the content of transcripts⁸. Researchers reviewed and read the transcripts multiple times to become immersed in and search for meanings within the data. The second phase consisted of completing an in-depth review of the data and identifying segments, or parts of transcripts, that were meaningful or related to the research questions⁸. Codes that captured explicit and implicit meanings were identified. This phase of coding requires the researchers to reflect on their interpretation of the data⁸. In phase three, the researchers examined codes and identified patterns of similar meaning. This resulted in clusters of codes that share core ideas, meaning, or concepts. Researchers further reflected on these clusters and identified preliminary themes. The fourth phase focused on developing and reviewing the themes which requires merging, separating, and discarding preliminary themes generated in phase three⁸. The fifth phase involved continual refining, defining, and naming themes. This step of the analysis ensures that each theme is different while building on other themes to construct an interpretative narrative⁸. In phase six, researchers finalised the narrative that was constructed from the transcripts.

Results

Participants

Data analysis was completed and, importantly, data saturation has been achieved across participant groups. Data saturation is a cornerstone in qualitative research and is used to judge the strength and rigour with which a qualitative study was conducted⁷. In this study, both data saturation and inductive thematic saturation were reached¹⁰. This means that first, for new data collected, preliminary analyses conducted on these data observed that data was repetitive and supported what was expressed in earlier data collected. Second, it means that no new codes or themes emerged from data analysis following preliminary work. Instead, we found increasing instances of the same codes and themes, also called informed redundancy¹⁰.

Recruitment was more challenging with some groups. For example, occupational therapists and social workers, who can deliver psychological treatments included in and covered by the Eating



Disorder Plan, have identified two important barriers to maintain their role as eating disorder clinicians. First, GPs and psychologists seem to be unaware that occupational therapists and social workers are included in the list of health professionals identified in the Eating Disorders MBS items and have the competence to deliver psychological treatments. Second, the rebate for occupational therapists, dietitians, and social workers is significantly lower than the rebate for psychologists for the same contribution to the Eating Disorder Plan. As a result, some clinicians in these professions may turn away from delivering the Eating Disorder Plan and move into public or private mental health and eating disorders services and the National Disability Insurance Scheme (NDIS).

GPs, psychiatrists, and paediatricians have very heavy workloads and are also difficult to recruit. The targeted recruitment led by AMPCo increased the number of GPs slightly but did not result in participation from psychiatrists and paediatricians. Neither did emails sent to these health professionals via different registries such as ANZAED Credentialing Program, Butterfly Foundation referral database, InsideOut Institute Treatment Services database, and large eating disorder services and organisations.

People with lived experience of an eating disorder and people who care for them

A total of 42 people with lived experience of an eating disorder and 10 people with lived experience of caring for someone with an eating disorder participated in the study. Their average ages were 32.6 and 45.1 years, respectively, and were predominantly females. Of the 42 participants with lived experience of an eating disorder, 71.4% reported a diagnosis of anorexia nervosa. More specifically, 59.5% reported a diagnosis of anorexia nervosa, 4.8% a diagnosis of atypical anorexia, and 7.1% a mixed diagnosis of anorexia nervosa with either bulimia nervosa, BED, or body dysmorphic disorder. The average illness duration across the sample was 9.7 years. The average treatment duration was 8.8 years. Just over half (52.4%) completed bachelor's degree. They were mostly employed (54.8%) in full-time positions (35.7%). All people with lived experience of caring for someone with an eating disorder were female and predominantly mothers (90.0%), working in a part-time role (60.0%). A total of 90.0% of participants noted that the person they cared for had a diagnosis of anorexia nervosa (10.0% noted symptoms similar to ARFID [avoidant/restrictive food intake disorder] in the early stages of the illness). The person they cared for had an average illness and treatment duration of 4.0 and 3.5 years, respectively. All states and territories were represented except the Northern Territory and most participants lived in metropolitan areas (people with lived experience of an eating disorder = 85.7%, people with a lived experience of caring for someone with an eating disorder = 90%). For more detailed demographic information about people with lived experience of an eating disorder and people with lived experience of caring for someone with an eating disorder, please refer to Table 7.1.

Table 7.1. Characteristics of people living with eating disorder and people with lived experience of caring for someone with an eating disorder

Characteristics	People living with an eating disorder (<i>n</i> = 42)	People with a lived experience of caring for someone with an eating disorder (<i>n</i> = 10)
Age, mean (range)	32.6 years (16 – 70)	45.1 years (22 – 55)
Gender		
Female	37	10
Male	2	0
Non-binary	2	0
Queer	1	0
Highest qualification*		
Secondary education	4	1
Certificate/diploma	9	0
Bachelor's degree	22	6
Postgraduate/PhD	6	3
Employment status		
Employed	23	8
Unemployed	2	0
Self-employed	4	2
Student	4	0
Retired	2	0
Other**	7	0
Type of work		
Full-time	15	4
Part-time	9	6
Casual	9	0
Full-time study	1	0
Retired/unemployed	4	0
Other***	5	0
Diagnosis		
Anorexia nervosa	25	9
Atypical anorexia nervosa	2	0
Bulimia nervosa	3	0
Binge eating disorder	4	0
Mixed diagnosis	4	0
EDNOS	1	0
OSFED	1	0
Eating disorders broadly	2	0
Other	0	1
Illness duration, mean (range)	9.7 years (0.5 – 38)	4.0 years (0.5 – 10)
Treatment duration, mean (range)	8.8 years (0.2 – 37)	3.5 years (0.5 – 10)
Eating disorder treatment duration		

Characteristics	People living with an eating disorder (<i>n</i> = 42)	People with a lived experience of caring for someone with an eating disorder (<i>n</i> = 10)
Nil	5	0
< 1 year	4	2
1-5 years	12	6
6- 10 years	11	2
> 10 years	10	0
Home location*		
Victoria	12 (11 metro, 1 regional)	3 (2 metro, 1 regional)
New South Wales	16 (12 metro, 4 regional)	3 (3 metro, 0 regional)
Queensland	5 (4 metro, 1 regional)	0 (0 metro, 0 regional)
Western Australia	3 (3 metro, 0 regional)	2 (2 metro, 0 regional)
Australian Capital Territory	1 (1 metro, 0 regional)	0 (0 metro, 0 regional)
South Australia	4 (4 metro, 0 regional)	2 (2 metro, 0 regional)
Tasmania	1 (1 metro, 0 regional)	0 (0 metro, 0 regional)
Relationship with the person with eating disorder		
Sister	N/A	1
Mother	N/A	9

Note. * 1 not reported, ** studying and working, *** mixed work arrangement. EDNOS = eating disorder not otherwise specified, OSFED = other specified feeding or eating disorder.


Health professionals

Fifty health professionals were interviewed; of which 12 were GPs and 38 were allied health professionals (dietitians *n* = 17; psychologists *n* = 18; social workers *n* = 2; and occupational therapist *n* = 1). Health professionals' ages ranged from 24 to 63 years and they were predominantly female. Most participants worked in a private practice in a part-time role and were based in Victoria. Work experience in the field of eating disorders varied among the health professionals, ranging from 3 to 35 years, as was the number of people living with an eating disorder seen per month (1 – 80). Table 7.2 presents further information about health professionals.



Table 7.2. Characteristics of health professionals

	GP	Psychiatrist	Pediatrician	Dietitian	OT	Psychologist	SW
Sample, <i>n</i>	12	0	0	17	1	18	2
Age, mean (range)	39.6 years (30 – 62)	-	-	36.1 years (25 – 63)	37 years	39.7 years (24 – 55)	45.5 years (32 – 59)
Gender							
Male, <i>n</i>	1	-	-	2	0	1	0
Female, <i>n</i>	11	-	-	15	1	17	2
Highest qualification							
Grad Diploma/Bachelor, <i>n</i>	0	-	-	8	0	1	1
Masters/postgrad, <i>n</i>	2	-	-	9	1	10	1
Fellowship, <i>n</i>	9	-	-	0	0	0	0
PhD, <i>n</i>	1	-	-	0	0	7	0
Type of work							
Full time, <i>n</i>	5	-	-	7	1	110	2
Part time, <i>n</i>	7	-	-	10	0	7	0
% FTE in clinical work							
100, <i>n</i>	8	-	-	4	0	11	1
< 100, <i>n</i>	4	-	-	13	1	7	1
Work experience in eating disorder field, mean (range)	6.1 years (3 – 15)	-	-	9.1 years (3 – 35)	9 years	10.2 years (1 – 25)	8.25 years (1.5 – 15)
Workplace setting							
Private practice, <i>n</i>	10	-	-	11	0	16	1
Community clinic, <i>n</i>	2	-	-	0	0	0	1
Mixed, <i>n</i>		-	-	4	1	2	0
Others, <i>n</i>		-	-	2***	0	0	0
Workplace location							
Victoria, <i>n</i>	6	-	-	8	1	8	0



	GP	Psychiatrist	Pediatrician	Dietitian	OT	Psychologist	SW
New South Wales, <i>n</i>	2	-	-	5	0	6	1
Tasmania, <i>n</i>	2	-	-	0	0	0	0
Queensland, <i>n</i>	1	-	-	3		1	1
South Australia, <i>n</i>	1	-	-	0	0	0	0
Western Australia, <i>n</i>	0	-	-	1	0	3	0
Number of patients seen per month, mean (range)	7 (2 – 20)			37 (5 – 80)	15	29 (1 – 80)	9 (7 – 10)

Note. GP = general practitioner, OT = occupational therapist, SW = social worker, ***statewide service development agency/research.

Thematic analysis

Four themes emerged from data analysis. These themes are: Implementing the Eating Disorder Plan from start to finish; The ups and downs of the Eating Disorder Plan; Who does what, when, and with whom; and The Eating Disorder Plan, a vision for the future.

Implementing the Eating Disorder Plan from start to finish

This theme contributed to explaining the entire Eating Disorder Plan process from the perspective of the participants, and considered specificities related to their roles (health professionals) and lived experience (persons with an eating disorder and people caring for someone with an eating disorder).

Across all health professionals, getting the diagnosis right and the plan completed appropriately was essential to commence treatment. GPs determined eating disorder diagnoses in various ways. Some took a thorough intake and medical history, which should preferably be completed with the input of family members, and others asked the person to complete the EDE-Q and used the responses to compare to the Diagnostic and Statistical Manual of Mental Disorders, 5th Edition (DMS-5) criteria ¹¹. GPs agreed that time required to diagnose an eating disorder and complete an Eating Disorder Plan was significant and often exceeded what the Medicare rebate covered, as illustrated by a comment made by this GP:


"...even though it's embedded in our practice, software and auto populated, there's an awful lot of detail that needs to go in there and discussion that needs to be had. And that's why I find it takes definitely over 40 min and probably closer to an hour".

In addition, GPs reported that many people with an eating disorder may also present other mental and physical health issues. For them, it was then essential to determine whether the person is safe to stay in the community. The importance of determining if a person is safe was summed up in this quote:

"...it's not a quick process. So I find that it does take a lot of time to really establish the diagnosis. And you know, Eating Disorder Plan is secondary to just my assessment of the person's safety. So I've had many patients with eating disorders who also have suicidal ideations, so I need to keep them safe."
(GP)

From the perspective of mental health clinicians and dietitians, there were two potential scenarios. Either an individual was presenting to them with an Eating Disorder Plan from their GP, or they were already seeing an individual (most commonly through another Medicare plan) and suspected a potential eating disorder diagnosis. In both cases, mental health clinicians and dietitians reported using their initial sessions (or more) to determine if the person they were seeing had an eating disorder. This either confirmed the diagnosis provided by the GP or determined whether the client needed to see a GP to obtain an Eating Disorder Plan. Some used eating disorder specific measures like the EDE-Q to determine the presence of an eating disorder.

For the mental health clinicians and dietitians, a significant proportion of their work was spent either supporting the person with the eating disorder navigating the system to get an Eating Disorder Plan and liaising with and supporting GPs in completing the Eating Disorder Plan correctly. This took a significant amount of time that far exceeded the Medicare rebate. Occupational therapists,



dietitians, and psychologists reported concerns about the person with an eating disorder having to go back and forth between different professionals to get the plan completed correctly, the amount of work needed to support some GPs, and the administrative work required as illustrated by this quote from a dietitian:

“Typically in those cases, the GP didn't actually even know the care plan existed. I was providing the link to the form, and really holding their hand in terms of ... yeah. So in those scenarios, I would talk through the patient, talk to the patient about the steps of eating disorder care plan, what it's entitled, the sessions over the calendar year, and that they need to be linked in with a psychologist.”

The same concerns were expressed by people with lived experience and people with lived experience of caring for someone with an eating disorder. For them, the experience felt like the GPs did not always know what to do, could not explain what was happening, and what was required clearly, resulting in increased stress and delays in getting the treatment started. Some participants reported a lack in understanding of eating disorders by their GP to be both obvious and quite confusing. One person with lived experience reported their GP attempted to write them a script for appetite suppressant drug Ozempic, with a psychologist also expressing the same confusion with frequently receiving referrals for patients with Eating Disorder Plans with the GP also advising them to lose weight.

“I've even had a GP refer somebody to me and say on the phone to me at the time, ‘She knows how to lose weight, she just can't keep it off’... if they're referring someone on an Eating Disorder Plan, they need to know not to say that to clients.”


The lack of knowledge related to eating disorder treatment was also expressed with reports of GPs not wishing to provide referrals for psychological treatment. One person with lived experience of caring for someone with an eating disorder reported their GP advising the focus to be solely on physical measures, to which the GP often provided punitive responses:

*“It's kind of like we have to sort of gear ourselves up to see her (the GP), cause like... she's called me controlling... and can be a little bit kind of punitive. When (person living with eating disorder, aged 14) was losing weight, she would say, you know, she did say things like, ‘you're going to f*ck up your family’.”*

The lack of knowledge about who can offer psychological therapies included in the Eating Disorder Plan beyond psychologists was perceived to contribute to delays in commencing treatment. Social workers, occupational therapists, dietitians, and some psychologists identified this as a serious issue. An occupational therapist mentioned:

“They just don't know... or maybe they think we don't know or that we aren't trained? We are listed there, it's not that hard to find out. It is really frustrating and more importantly, it delays access to treatment. People are really unwell and they have to wait when there are occupational therapists and social workers out there perfectly able to provide high quality psychological interventions.”

Once the Eating Disorder Plan was in place and treatment could commence, very few issues were reported. The psychological therapies included in the Eating Disorder Plan are very clearly identified and even if some participants felt there was a lack of flexibility in what was included, they also agreed that having a never-ending list of options was not a solution. Most mental health clinicians reported using cognitive behavioural therapy for eating disorders (CBT-ED; often referred to as CBT



by mental health clinicians even after further verification during the interviews), dialectical behavioural therapy (DBT), Maudsley model of anorexia treatment for adults (MANTRA), and specialist supportive clinical management for eating disorder (SSCM). However, best mental health practice like client-centred and trauma informed approaches underpinned the work of most mental health clinicians and dietitians as illustrated by this comment from a dietitian who said that her:

“Practice is always based on what works best for the person I am working with. I have to address trauma, otherwise, I am missing the point completely. Everything I do is client-centred and based on trauma informed approaches.”


As the time for the review by the GP approached, the amount of preparation and work, having to liaise with GPs and complete extra administrative tasks increased, resembling the experience of initiating the plan. At times, getting the documentation completed correctly and in a timely manner by GPs was a problem. With time, mental health clinicians and dietitians developed their own strategies like creating template letters and email reminders and having a dedicated administrative staff member who focussed only on getting the plan ready and reviewed. Also, some established professional relationships with GPs facilitated these processes significantly. As a psychologist mentioned:

“it’s not what you know, it’s who you know. I know great GPs. I call them and everything is done very quickly and efficiently.”

As treatment continued, again, few issues were identified by mental health clinicians, dietitians, people with lived experience of an eating disorder, and people with lived experience of caring for someone with an eating disorder. However, concerns were raised for 20-session reviews that are completed by psychiatrists (typically). The lack of therapeutic relationship between the person with the eating disorder and the psychiatrist was identified as a problem across all participants. For some individuals with lived experience of an eating disorder, traumatic experiences with past psychiatrists, having to enter a hospital, or fearing that the psychiatrist may admit them to inpatient care meant that they did not participate in the review process. One participant with lived experience of an eating disorder described the fear she experienced when seeing a psychiatrist within the hospital environment:

“It’s always nerve racking when, you know, I get fearful about being sent inpatient or anything like that. And I think being, like you go to the hospital suites in order to see the psychiatrist. So it’s kind of like you’re already at the hospital, and that’s got all of that baggage associated with it.”

Unnecessary delays in obtaining an appointment and significant out-of-pocket costs were other important issues identified but, more importantly, the possibility that the plan be ceased at the 20-session review was identified as a serious problem. The impacts of the 20-session review were not always made clear to people with an eating disorder and people who care for someone with an eating disorder. Mental health clinicians and dietitians felt that the progress made, which is what everyone hopes for, often meant that the individuals they were working with no longer met the eligibility requirements of the plan. As a result, even if they still felt they needed further treatment, they did not qualify for a new series of sessions/treatment under the Eating Disorder Plan. As a result of these challenges, people with lived experience of an eating disorder often skipped the 20-session review, meaning that services were terminated. Yet, it is important to mention that people with lived experience of an eating disorder ceased utilising services under the Eating Disorder Plan for various



reasons. For some, 20 sessions were sufficient to reach a stage of their recovery journey where they had met their goals, their symptoms had improved, and they no longer needed services provided under an Eating Disorder Plan.

The ups and downs of the Eating Disorder Plan

Overall, there were differing views between participants on what works and does not work with the Eating Disorder Plan. These views span across financial issues, eating disorder workforce capacity, eligibility, and collaboration.

Financial issues: All participants were positive about the increased number of rebated sessions provided under the Eating Disorder Plan (in comparison to the Mental Health Treatment Plan [MHTP] or Chronic Disease Management Plan [CDMP]), resulting in more people with an eating disorder participating in the Eating Disorder Plan if they are eligible. However, financial issues were commonly identified as a significant barrier to ongoing use of an Eating Disorder Plan, with numerous people with a lived experience of an eating disorder reporting that while the Eating Disorder Plan provided a rebate for some of the cost of treatment, the gap payments were not financially sustainable, especially for the specialist review completed by a psychiatrist or paediatrician, as illustrated in this quote:


“I know in the past I sort of had to choose between which professional I see for that week, whether it would be the dietitian or psychologist ... obviously there still is a cost involved. It's a rebate. And especially if you haven't met your Medicare safety net. And it's quite, quite significant.”

The discrepancy between the Medicare rebate across disciplines was a serious problem. The significant difference between rebates for psychologists and rebates for other mental health clinicians and dietitians, delivering the same treatment, was frustrating, demotivating, and for many simply not financially sustainable as illustrated in the following quote from a dietitian:

“So, the Medicare rebate does not allow us to function in private practice, which you would know... I have one client that I'm currently bulk billing, because, they actually are very well engaged, they were working on paying frequently when they could... So, I might bulk bill one or two clients in a month as part of just offering that service. But that is not a viable thing to continue to do for many clients.”

Social workers and occupational therapists especially felt discriminated against, receiving a lower rebate despite being qualified to deliver the same psychological interventions as their psychologist peers. Many times, people with lived experience of an eating disorder came to them thinking they would bulk bill, but issues with the rebate meant that this was not possible. By not being able to bulk bill, sessions were less frequent resulting in decreased consistency in care. Dietitians felt the same pressures and discrepancies, reporting that the rebate provided did not align with the required expertise needed to provide services under the Eating Disorder Plan. This was illustrated in the following quote:

“Dietitians using the eating disorder care plan are expected to have undergone additional training and be skilled enough to see this client base. And yet the rebate is less than half of the psychology rebate. And so it doesn't represent the complexity of these clients. Nor does it represent the level of



expertise that I think a dietitian can bring to the table. And I think it can undervalue us as a discipline when we're not, you know, getting a rebate that accurately reflects what we do."

As discussed above, all health professionals also commented on the significant number of unbillable hours required to initiate and implement the Eating Disorder Plan. This further contributed to their perception that the rebate amount was inadequate. As a result, they faced the dilemma of either shouldering the costs of unbillable hours or increasing the pricing of their treatment sessions. The latter option raised concerns regarding the affordability and accessibility of their services for those seeking care.

Insufficient eating disorders workforce: In addition to the significant financial cost of treatment services, difficulty locating and booking appointments with dietitians, mental health clinicians, or psychiatrists with experience working with individuals with eating disorders was noted, with many more experienced practitioners not taking on new clients or having significant waitlists. For many with a lived experience of an eating disorder, the wait times to consult with a health professional proved to be a source of frustration, as exemplified by the following statement:

"So that's the most obvious thing to me. Get people help sooner. You shouldn't have to wait 6 months to see umm... someone if you need them now. And that's another problem, obviously, because there's not enough people to treat them now."


Lengthy wait times and inability to find a psychiatrist to complete the 20-session review often led to unnecessary delays in the continuation of treatment. For some people with a lived experience of an eating disorder, and for people with a lived experience of caring for someone with an eating disorder, finding a health professional to initiate the plan, or finding a new professional to provide them with support under an existing plan often proved unattainable. Significant concerns were expressed by interviewees, particularly by those providing care to someone with an eating disorder, at the perceived danger this posed when the person with the eating disorder was experiencing a decline in health or refused treatment.

When further discussing the delay experienced in accessing a psychiatrist for the 20-session review, one participant with lived experience of an eating disorder explained the repercussions it had on her financial situation and ability to continue treatment:

"And for those times I've had to like pay out of pocket in full, which has been a bit umm... of a hurt. ... I think I might have, like, skipped one or two appointments here and there, or maybe like delayed them, spread them out a bit more. Umm... but yeah, more or less kind of continued until I could finally get the review done and get it out of the way, so I could have those sessions."

Added to this, there are challenges related to caring for someone over the age of 18, including increased levels of stress experienced by people with lived experience of caring for someone with an eating disorder, as illustrated below.

"It's really hard for the family to also be included into all of this - so, because (person with eating disorder) is 19 so she's still very, very young, and you know, like there's a lot of things that she needs help and support from the family for but kind of like in the eyes of... like everything because she's like an adult, so therefore, like the family, isn't necessarily needed and so there are a lot of things that the GP can't share."



Eligibility: Eligibility criteria, while being clearly identified, felt quite limiting for GPs, mental health professionals, and dietitians. They felt that it was somewhat easier to access the Eating Disorder Plan when there was a diagnosis of anorexia nervosa even if other eating disorders are included in the plan. The same issue was reported by people with an eating disorder and people caring for someone with an eating disorder. It was suggested that the eligibility criteria be broadened to capture other eating disorder clinical presentations more effectively, especially ARFID. All participant groups expressed confusion about why ARFID was excluded from the eligibility criteria considering the impact this diagnosis has on the health and wellbeing of the individual affected. Issues with the measures and tools used to determine whether someone meets eligibility criteria were reported. For example, relying on BMI is a problem as it automatically excludes people living in a larger body and many of those with a severe and enduring clinical presentation. Alarming, it continues to reinforce the concept of having to be ‘sick enough’ to access treatment and discriminates against people living in a larger body as illustrated by a comment made by a dietitian:

“This reinforces the belief that to access treatment, you have to be exceptionally underweight and emaciated. This is crazy when we know that so many people living in different or larger bodies are also exceptionally unwell.”


Similar sentiments were voiced by individuals with a lived experience of an eating disorder. Specifically, one person expressed concerns about the potential risk posed by the eligibility criteria, fearing that it could result in a delay in accessing treatment:

“Not wait until you have to lose another 20 kilos before they’ll talk to you or take you seriously, or... do you know what I mean? The problem starts in here (pointing to head) long before the symptoms are visible on the outside. You know, if you’re get skinny and obsessive losing weight, why do you have to wait until you’re, yeah, 40 kilos before you can get treatment? You should be able to get it then.”

To navigate the constraints posed by eligibility criteria, some individuals with lived experience noted that their GPs provided guidance on how to respond to questions within the EDE-Q to “find that wiggle room in order to be eligible”. This approach was deemed essential to ensure that those in need of eating disorder treatment could effectively access services through the Eating Disorder Plan, regardless of their presentation. This experience is highlighted in the following quote:

“...if you have a diagnosis of anorexia, that's all you need to qualify. Whereas if you have any other eating disorders, there's other eligibility requirements that you need to meet, which I feel is a barrier and also inequitable (...). It also already has this kind of a hierarchy in the eating disorder world, as being seen as the people who were the most sick, who need and deserve the most help. And I actually think that the eating disorder treatment plan at the way that it's set up perpetuates that because it's almost saying like, well, if you have anorexia, you get this treatment, you get it without being sort of ask more questions. But if you have another eating disorder, we're gonna make you really work for it, which I think would deter a lot of people from accessing that help in the first place.”

Other problems with the lack of flexibility in the Eating Disorder Plan were noted. Although not a reality of how the Eating Disorders MBS items criteria are set up, there was a perception from some participants that when people progress and get better, gain weight, or change their thought process around food and weight, they no longer met the eligibility criteria for the Eating Disorder Plan while still needing treatment and support. As someone with an eating disorder said:



“This means that I can only get a little bit better or have to stay unwell to get treated. It’s crazy!”

A dietitian complemented this, stating:

“... It's really hard to sit across from somebody who is struggling a lot and say, you're not sick enough to get support. I think it could be really demoralizing for people who are reaching out for support, maybe feeling vulnerable.”

Collaboration: A lack of ongoing communication and collaboration between health professionals and people caring for someone with an eating disorder was reported. Mental health clinicians and dietitians identified the absence of items for collaboration between psychologist, occupational therapists, social workers, and dietitians as a problem since they are the ones implementing the Eating Disorder Plan. They supported the introduction of an item for case consultation but noted that it needs to be organised and coordinated by GPs and is not designed for other types of consultations. Therefore, health professionals again emphasised their concerns regarding the significant volume of unpaid work necessary to facilitate coordinated care effectively. Challenges in establishing communication, particularly with GPs, were also discussed, with difficulties scheduling care team meetings frequently encountered due to busy and conflicting schedules. This meant that crucial lines of communication were often hindered, impeding the collaboration between dietitians, mental health professionals, and GPs. One dietitian explained her experiences of trying to organise a case conference:


“When I tried to schedule a case conference, I was told by the GP ‘I don't really know how to do that, so if you set it up and organise it, I guess I can try and make that work’. Something that's meant to be GP lead, is very difficult to be GP lead. So that's an example of a GP that is highly involved, highly multidisciplinary team focus, and I can't even get him to engage in a case conference. So, the likelihood of me engaging a GP that won't even respond to my letters, slim to nil.”

A lack of collaboration between GPs and people with an eating disorder was also mentioned. Often, once an Eating Disorder Plan was completed, the person with the eating disorder, alone or with the support of someone caring for them, was responsible for finding a mental health clinician and a dietitian able to implement the plan and offer the appropriate treatment. Overwhelmingly, people who care for someone with an eating disorder felt there was minimal to no communication with them. They felt isolated and ignored.

Who does what, when, and with whom

This theme focusses on improving GPs and psychologists’ knowledge of who is able to deliver the psychological therapies covered by the Eating Disorder Plan. It also discusses participants’ perception of the role different stakeholders have or should have in the Eating Disorder Plan.

It became clear through the interviews that most GPs thought that only psychologists could offer psychological therapies covered by the Eating Disorder Plan. The frustration of social workers, occupational therapists, and dietitians was expressed quite clearly with some saying they felt ‘dismissed’, ‘ignored’, and ‘disrespected’ by the other health professionals. While some believed it was due to a lack of knowledge, others mentioned it was a more systemic issue. The discrepancy in the rebate these professionals benefited from in comparison to psychologists was also raised. As one occupational therapist mentioned:



“At this level of specialisation where we are all trained to deliver the same interventions, we are all credentialed eating disorder practitioners, the monetary difference is unjustified.”

When reflecting on how they found out about the new items for the treatment of eating disorders, people with lived experience shared that they were made aware of the new items by their GP, or through eating disorder organisations like Eating Disorders Victoria, while others did not know about the new items and the Eating Disorder Plan. Multiple participants with lived experience reported that they were not aware that psychological therapies could be delivered by other mental health clinicians like occupational therapists and social workers because their GP mentioned that treatment was only possible with psychologists.

People with lived experience and people caring for someone with an eating disorder alike needed support to navigating the system (e.g., searching for new psychologists with eating disorder treatment education and experience). In some cases, GPs made referrals, but most people with lived experience and those caring for a person with an eating disorder reported that once their GP had completed the Eating Disorder Plan, they were left to find a suitable clinician, which was difficult, with most not knowing where to start. This required a lot of energy and self-advocacy which was a challenge they had not anticipated.


People with lived experience of caring for someone with an eating disorder felt largely forgotten, left to try to understand the Eating Disorder Plan and how to navigate the system on their own while also trying to support and reassure the person with the eating disorder they cared for. Furthermore, they felt their own wellbeing was often neglected by health professionals who failed to check in with them or provide them with information about available services they could access for support. Yet even those who commonly reported knowing about the existence of the MHTP rarely obtained or used this support for themselves. This reluctance was attributed to the belief that obtaining another plan would be difficult and burdensome, and concerns about the further financial pressures this would incur. Consequently, those caring for someone with an eating disorder faced the dilemma of deciding whether to prioritise support for themselves or support for their loved one. Support for their loved one was typically prioritised. As one person with lived experience of caring for someone with an eating disorder stated:

“I think there is probably actually a lot of support out there. There's just no education for anyone to give you. You have to go out and find it yourself if you need the help, you will have to be the driving force of it. And when you are looking after someone who is so unwell it's literally the last thing that you think about. So, I don't think, yeah, in terms of like being supported by medical professionals, I would say, no.”

The Eating Disorder Plan, a vision for the future

While all participants appreciate the creation of the Eating Disorder Plan and praised it as a vital step forward in the treatment of eating disorders, they were all able to identify specific areas for improvement. These improvement areas are closely tied to the overarching themes that have been previously identified.

Overwhelmingly, participants agreed about adding ARFID to the list of diagnoses covered by the Eating Disorder Plan. In addition, there was an overwhelming feeling that the Eating Disorder Plan in



its current iteration favours people with restrictive anorexia nervosa over other eating disorders, even if other diagnoses are included in the plan. Participants emphasised the need for a more balanced and inclusive approach that adequately addresses the diverse needs of individuals with various eating disorder diagnoses and clinical presentations, moving beyond a focus on restrictive anorexia nervosa.


Most mental health professionals cited using evidence-based treatments from the approved Eating Disorders MBS items intervention list. However, in addition, some professionals also used interventions not included in this list, such as motivational interviewing and acceptance and commitment therapy (ACT). Although most mental health clinicians acknowledged that the treatment models outlined in the Eating Disorders MBS items aligned with contemporary evidence-based practices, both clinicians and people with a lived experience of an eating disorders expressed frustration with the constraints imposed by the specific interventions permitted. Many believed that these limitations did not adequately capture emerging evidence on eating disorder interventions (e.g., Temperament-Based Therapy with Supports was mentioned), underscoring a perceived lack of flexibility in the provision of services supported by the Eating Disorders MBS items. One individual with an eating disorder also noted that the available interventions are not always helpful and there was a perception that the most helpful interventions were not funded.

“I think some of the kind of gold standard approaches that Medicare recognises are actually not very helpful. So I think that is a bit of a barrier in terms of what people find helpful and what is being researched and funded.”

Increased knowledge of what the Eating Disorder Plan is, how it has to be initiated, implemented, reviewed, and completed, and most importantly, who can deliver psychological therapies beyond psychologists was identified by people with lived experience and mental health clinicians, including some psychologists. One significant concern was a perceived lack of knowledge amongst GPs regarding the Eating Disorder Plan. This prompted health professionals, individuals with lived experience of eating disorders, and caregivers to collectively highlight the importance of providing GPs with enhanced training on eating disorders and the associated Eating Disorder Plan, emphasising the value of ongoing education in fostering better understanding and support.

An examination of the 20-session specialist review, its purpose, timing within the 40 sessions, who can versus who should complete it, and its implications was recommended. Considering the substantial financial cost, prolonged wait times, and emotional distress associated with these reviews, which reportedly contribute to individuals discontinuing services for their eating disorder, all participant groups emphasised the importance of reassessing the necessity of involving a psychiatrist (or paediatrician) in the review process.

Working more collaboratively with people with lived experience caring for someone with an eating disorder was also identified and the importance of their role and contribution to the recovery of their loved one was clearly noted. People with lived experience of caring for someone with an eating disorder recommended the development of an information package specifically for them that describes the Eating Disorder Plan, its different steps, who can provide treatment and where they are located, and how to support their loved ones through the development, implementation, and review of the Eating Disorder Plan.



Individuals with lived experience of eating disorders, people with lived experience of caring for someone with an eating disorder, and health professionals provided valuable suggestions for enhancing the plan through the inclusion of additional services. Recommendations included peer support, recovery coaching, specialised support coordination, involvement of exercise physiologists, and expanding the roles of social workers and occupational therapists to provide more comprehensive mental health interventions. A GP provided the following insight:

“...it would be good to have a little bit more flexibility with the plan for other clinicians. So, for example, I had a patient that really required an exercise physiologist as part of the plan as well because she was a professional marathon runner and she also was an over exerciser.”

When discussing who was included in the Eating Disorder Plan, there was a clear recognition of the need for additional items to facilitate effective interprofessional collaboration. Particularly, having items accessible and claimable by mental health clinicians and dietitians to support collaboration, without the need for GP involvement, was recommended. A psychologist shared the following:


“I know it is, you know, that Medicare number for like case conferencing with the GP. But even trying to use that is an absolute headache, trying to get a time when the GP could be on board. Like, I think there’d be so much value in having a code where the GP don’t have to, it could just be two members of the treating team and can bill for that rather than the need of a GP. Because the GP is almost never available as it is. And then it almost stops everyone in the team for having those discussions because like, without the GP we can’t bill for it, so what’s the point? You know, which is a massive barrier I think.”

A plan that requires less paperwork and administrative tasks, that is more streamlined resulting in less unpaid work for health professionals, and clearer direction for people with an eating disorder and for people caring for someone with an eating disorder was also recommended. A potential solution to address this was to transition the Eating Disorder Plan to an online platform, granting access to individuals receiving services (and their supports, if desired) as well as the broader health professional team. The recommendation included incorporating details of the diagnosis, contact information of the involved professionals, and a session tracking system to prompt the team when reviews were due.

Discussion

To our knowledge, this is the first qualitative study to explore the experiences of multiple stakeholders who are connected and involved with the Eating Disorder Plan. The stories we heard were very similar across participant groups with some emphasising specific aspects based on their training, disciplines, or lived experiences. While sample sizes were not reached for the different groups of participants, data saturation and inductive thematic saturation was reached.

It was disappointing that no psychiatrists or paediatricians were recruited despite several recruitment methods being implemented. This, however, aligns with the difficulty to identify psychiatrists and paediatricians who could complete the 20-session review reported by other participants. Nevertheless, overwhelmingly, participants welcomed the new Eating Disorders MBS items and the added sessions these items enabled. However, some people with lived experience of an eating disorder worried that the critical reflection of their personal experience might lead to a decrease in the number of sessions.




Reflecting on their own experiences, health professionals, people with a lived experience of an eating disorder, and people who care for them clearly identified the need for an Eating Disorder Plan that is more flexible in terms of which diagnoses are included, the types of interventions that are covered and can be delivered, who delivered the Eating Disorder Plan, the funding structure of the Eating Disorder Plan (rebates for health professionals and out of pocket costs for people with an eating disorder and people caring for someone with an eating disorder), and reconsideration of the consequences of the 20-session review. This review felt arbitrary and punitive, and the lack of therapeutic relationship with the specialist they had not built rapport with worried people with lived experience of an eating disorder.

Findings from this qualitative study suggest that it may be time to address the belief that the core eating disorder team is limited to a GP, a psychologist, and a dietitian. Occupational therapists and social workers have the knowledge, skills, and competencies to deliver psychological interventions identified in the Eating Disorder Plan, akin to their psychologist peers. Strategies to increase GPs' knowledge about who can competently offer these therapies are needed. Also, further training that focusses on how to initiate, complete, and review the Eating Disorder Plan is recommended.

Furthermore, all participant groups agreed that the inclusion criteria to access the 40 sessions and the measures used to determine eligibility favour anorexia nervosa (restrictive type even more). This was viewed as a significant concern because people with lived experience of an eating disorder with different diagnoses (e.g., ARFID) are excluded from this initiative and people with other clinical presentations (e.g., living in larger bodies), and length of illness (e.g., severe and enduring eating disorders) may misperceive that they are not eligible for inclusion. This concern was also expressed regarding receiving reviews completed by GPs where, once again, some participants perceived that strict criteria could mean that improvement, while still needing treatment, could result in access to more sessions be terminated. Clearly greater awareness of the true purpose of reviews, namely, to review progress and provide alternative directions when treatment is not progressing well, is needed to dispel these perceptions and reduce fears about eating disorder reviews.

Mental health clinicians mostly, and some dietitians, expressed concerns about the strict list of interventions covered by the Eating Disorder Plan. While no one contested the evidence-base supporting these interventions, these participants noted that there is no space for emerging evidence and other treatments that might work better for certain people with lived experience of an eating disorder. Again, the treatments approved under the Eating Disorder Plan were perceived to favour people with anorexia over other diagnoses and clinical presentations.

The lack of eating disorder knowledge in GPs was highlighted very clearly by mental health clinicians, dietitians, people with lived experience of an eating disorder, and the people who care for them. While participants acknowledged the generalised nature of GP practise, further understanding of eating disorders, enhanced knowledge about early identification, assessment, and how to engage with people with lived experience of an eating disorder were identified as necessary. In addition, better knowledge about the Eating Disorder Plan, how to initiate it, who can deliver the psychological interventions, and how to review the plan were other issues identified by participants. The importance of adequate training has been documented in the literature, especially in Australia with the development and delivery of the eating disorder credentialing program led by the Australian & New Zealand Academy for Eating Disorders and the National Eating Disorders Collaboration¹²⁻¹⁴.



The importance of the role of people with lived experience of caring for someone with an eating disorder has been widely documented in the literature and yet, participants in this study reported feeling ignored, excluded from treatment and communication about the eating disorder of their loved one, being left on their own to identify and find eating disorder clinicians, and deal with the initiation, development, delivery, and review of the plan with no support. The out-of-pocket costs, also reported by people with lived experience of an eating disorder, was reported and identified as a significant issue in accessing and maintaining access to treatment.

Conclusion

The Eating Disorder Plan offers some people with an eating disorder much needed access to evidence-based psychological treatments and evidence-informed dietetic services. As evidence, when asked if anything had changed in relation to eating disorder treatment since the plan was introduced, a person with lived experience of an eating disorder immediately stated, 'We have hope'.

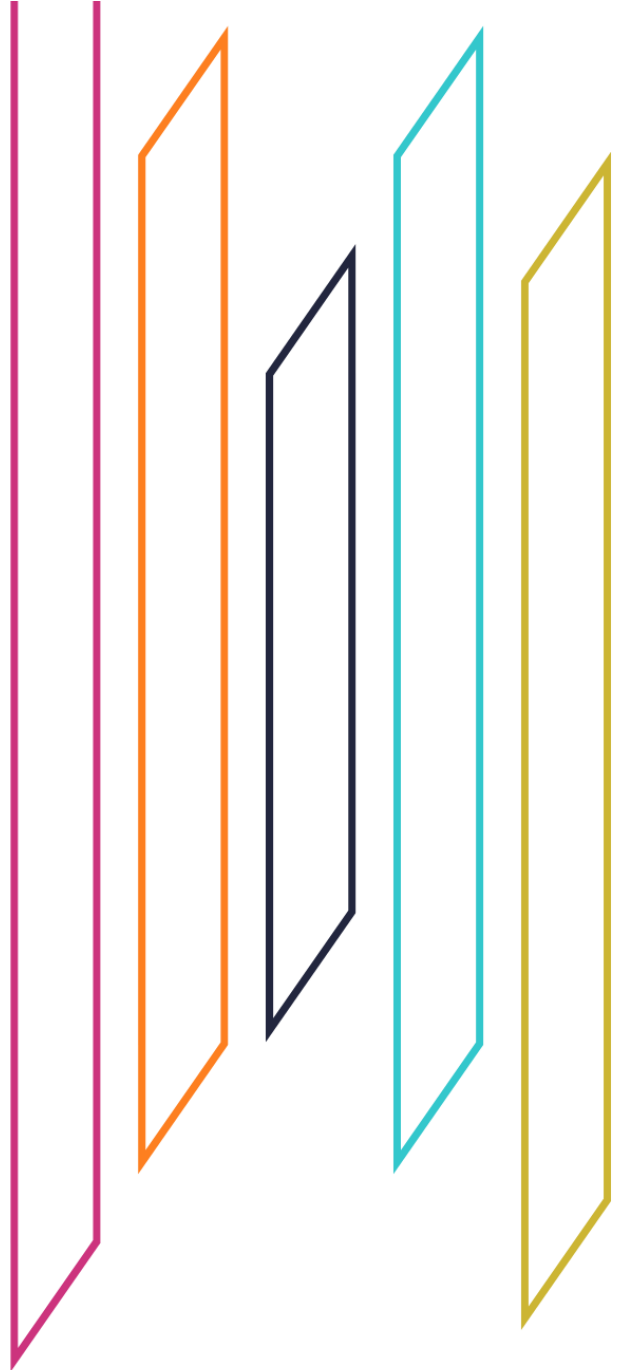
While the plan was welcomed by all participants in this study, all offered critical reflection and identified problems and solutions to the challenges they faced. A review of how the plan is initiated and who it applies to is recommended to ensure that people with an eating disorder diagnosis other than anorexia nervosa can access the treatment they need, when they need it. In line with increased flexibility related to diagnoses and clinical presentations, reviewing, and potentially expanding the interventions included in the Eating Disorder Plan, as well as how an eating disorder is diagnosed, was recommended. For example, critique of the EDE-Q was strong and clear across participant groups.

A review of the Eating Disorder Plan funding and the need to acknowledge the amount of administrative and clinical work that is not currently covered appears essential to ensure its continuity. Better communication strategies between professionals involved and recognition of the expertise and contribution of all involved is also essential to provide the best interventions and support to people with an eating disorder and to people caring for someone with an eating disorder. The feeling of 'them and us' reported by dietitians, occupational therapists, social workers, and people caring for someone with an eating disorder is divisive, problematic, and ultimately may compromise the implementation of the Eating Disorder Plan and impact treatment and recovery of those it is meant to support.

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Chapter 8.
Review of clinical
guidelines
(Study 8)





Chapter 8. Review of clinical guidelines (Study 8)

Scoping recommendations for treatment and alignment with Eating Disorders MBS approved treatments


Introduction

The Eating Disorders Medicare Benefits Schedule (MBS) items initiative is designed to deliver evidence-based treatments for individuals with an eating disorder and lists specific treatments that are eligible for use in the treatment of those who meet criteria for the initiative. Approved treatments include family-based treatment (FBT), adolescent-focused therapy (AFT), cognitive behavioural therapy (CBT), specialist supportive clinical management (SSCM), Maudsley Model of Anorexia Treatment in Adults (MANTRA), interpersonal therapy (IPT) for bulimia nervosa and binge eating disorder, dialectical behavioural therapy (DBT) for bulimia nervosa and binge eating disorder, and focal psychodynamic therapy for eating disorders. People who meet the eligibility criteria are provided an eating disorder plan that is valid for 12 months for up to 40 psychological treatment sessions (with clinical review after every 10 sessions). They are also referred for up to 20 dietetic sessions.

In the present study of the overall Eating Disorders MBS evaluation project, multiple methods such as systematic searches, scoping review, and meta-analysis were used to synthesise existing literature to evaluate whether the currently approved treatments in the Eating Disorders MBS align with the best practice recommendations in the field from clinical guidelines. These range in focus from exclusive focus on a specific eating disorder (e.g., guidelines for anorexia nervosa) to consideration of the full range of eating disorders covered in the Diagnostic and Statistical Manual of Mental Disorders 5th Edition (DSM-5), and from consideration of adult populations to consideration of individuals across the lifespan.

Regardless of the scope of these documents included in this study, each is designed to provide a summary of best available evidence to inform clinical practice. More than a simple articulation of which treatments work for whom, as is often the focus in meta-analyses, these guidelines often include details about combination and sequencing of treatments, and best practice for key components of care (e.g., appropriateness and best approach for weight monitoring). These guidelines thus provide a solid basis from which to evaluate current practice in eating disorder treatment within the Australian context. We thus synthesise available clinical guidelines to compare against the criteria used for treatment of eating disorders in Australia under the Eating Disorders MBS items introduced in November 2019.

The purpose of clinical treatment guidelines is to provide healthcare professionals in the area with an up to date and evidence-based guide for treatment of eating disorders for people with an eating disorder. A synthesis of the clinical treatment guidelines is necessary to determine where similarities and differences lie within the recommendations for the treatment of eating disorders. It is expected that clinical guidelines documents may differ in their recommendations for a variety of reasons, including: (1) recency of review of literature and publication of guidelines, and (2) stated focus of the guidelines (e.g., focus on all eating disorders versus a subset, focus on adolescent populations versus



adult populations). This scoping review will produce a summary of the recommendations based on eating disorder type as well as by age group where possible.

A scoping review was chosen in preference to other knowledge synthesis methodologies for this study because scoping reviews map the existing literature and provide an opportunity to identify gaps in literature ¹, or in this case the similarities and differences in the treatment guidelines. Our specific review provides an update and expansion of a prior systematic review conducted by Hilbert, Hoek and Schmidt ². There was need for an update given the date of publication of the previous literature, and likelihood of potential updated clinical guidelines in the last six or seven years. Further, to allow for a more comprehensive review, the Hilbert, Hoek and Schmidt ² study was expanded. We extended the list of permitted eating disorders beyond anorexia nervosa, bulimia nervosa, and binge eating disorder (BED) to include avoidant/restrictive food intake disorder (ARFID), and other specified feeding or eating disorders (OSFED). We also allowed guidelines for all ages in the search and screening process so that recommendations for all ages could be covered.


This scoping review addresses three key research questions:

1. What do current, best-practice clinical guidelines for the treatment of eating disorders recommend as best practice?
2. How do these recommendations align with detailed manualised treatments that are easily available for eating disorders?
3. How do approved treatments within the Eating Disorders MBS initiative align with best practice in the field as indicated in clinical guidelines?

Methods

This scoping review involved identifying national and international clinical guidelines in the treatment of eating disorders. The inclusion criteria included i) the document providing guidelines for clinical treatment of eating disorders; ii) that at least one of anorexia nervosa, bulimia nervosa, BED, ARFID, or OSFED were addressed in the guidelines; and iii) guidelines were written in English to facilitate data extraction by the research team whose language skills were limited to English (studies that were in languages other than English were screened but were not included in the review). The search was not limited on the basis of the age group to which the guidelines were targeted; therefore, our results include guidelines for children and adolescents as well as adults. This is in recognition that eating disorders often have an onset earlier than adulthood, and acknowledge that guideline-related work has been conducted beyond the area of adult years in the time since the Hilbert, Hoek and Schmidt ² review was conducted (e.g., Krishnamoorthy, Shin and Rees ³; Lantzouni and Grady ⁴).

A protocol for this study was registered on the Open Science Framework (OSF), and can be accessed at <https://osf.io/vtgbp>. This review was written according to PRISMA guidelines for scoping reviews ⁵. An electronic search was conducted in July 2023, and updated in January 2024, in databases PubMed, Cochrane Database of Systematic Reviews, and the International Guideline Library, using the search terms 'guideline AND (eating disorder OR anorexia nervosa OR avoidant/restrictive food intake disorder OR bulimia nervosa OR binge-eating disorder OR other specified feeding or eating disorders)'. No limits were placed on the search (e.g., date, country, literature type). In the case of a



guideline having multiple versions, data was extracted from the most recent version. We excluded any kind of systematic review, primary study, or randomised controlled trial.

Two authors (MN and CJ) independently screened the titles and abstracts before then screening relevant full texts of documents for eligibility criteria. Any disagreements were decided by discussion to achieve consensus about inclusion or exclusion of a document.

Data extraction was conducted by MN, CJ, and AA, and 20% of data were double extracted to ensure consistency in reporting. The data extracted for guidelines for anorexia nervosa, bulimia nervosa, BED, OSFED, and ARFID followed the Hilbert, Hoek and Schmidt ² review process and focused on recommendations for provision of treatment provided by each guideline and included: first line treatment model recommendation being outpatient; criteria for day treatment; criteria for hospitalisation (inpatient); criteria for discharge; information on compulsory treatment; recommended energy intake per day; recommended weight gain per week (both inpatient and outpatient settings); recommendations for supplements; recommendations for artificial feeding; nutritional counselling; recommendations about psychological interventions including CBT, FBT, psychodynamic therapy, self-help, and IPT; recommendations about medications including antidepressants, selective serotonin reuptake inhibitors (SSRIs), tricyclic antidepressant (TCAs), monoamine oxidase inhibitor (MAOIs), antipsychotics, anticonvulsants, appetisers, anti-obesity medications, lithium, and oestrogen; and any other treatments or special issues mentioned in the guidelines. The data extraction process was completed separately for guidelines targeting children and adolescents and those targeting adults. Guidelines were synthesised to indicate guideline documents that had included particular recommendations but not explicitly in favour or not, had provided explicit favourable recommendation for particular practices, provided cautious recommendation for practices, recommended against particular practices, or had not provided a recommendation about particular practices.

Results

A total of 85 clinical guideline documents were identified to be screened as full texts as shown in the flowchart for the document screening and selection process (Figure 8.1). Guideline documents were excluded due to not being clinical treatment guidelines ($n = 58$), there being a newer version of the guideline available ($n = 7$), being in a language other than English ($n = 6$) or being in a population other than the treatment of eating disorders ($n = 5$). Nine clinical guidelines that met criteria were identified. These were from seven countries and published between 2011 and 2023. Six of these guidelines provided recommendations for all ages, two were specifically for the treatment of children and adolescents, and one was specifically for the treatment of people over the age of 18 years. The guidelines from Australia (Royal Australian and New Zealand College of Psychiatrists [RANZCP] ⁶), US (American Psychiatric Association ⁷), United Kingdom (UK; National Institute for Health and Care Excellence [NICE] ⁸, Scotland (Scottish Intercollegiate Guidelines Network [SIGN] ⁹), Germany ¹⁰, and the World Federation of Societies of Biological Psychiatry (WFSBP) ¹¹ all included recommendations for anorexia nervosa, bulimia nervosa, and BED. The second guideline from the UK, Medical Emergencies in Eating Disorders ([MEED] ¹²), provided treatment recommendations solely for anorexia nervosa. The Canadian Practice Guidelines provided treatment recommendations for children and adolescents ¹³. A second guideline from Australia (National Eating Disorders Collaboration [NEDC] ¹⁴) focused on adult bulimia nervosa, BED, and OSFED and child and adolescent

anorexia nervosa, bulimia nervosa, BED, and OSFED. All guidelines except the WFSBP focused on multiple types of treatment. As shown in Table 8.1, a range of perspectives and organising committees developed the guidelines, with several being psychiatry-based. These perspectives will shape the inclusion and direction of their respective recommendations. The WFSBP only focused on medication-based intervention. The full table of guidelines are shown in Table 8.1.

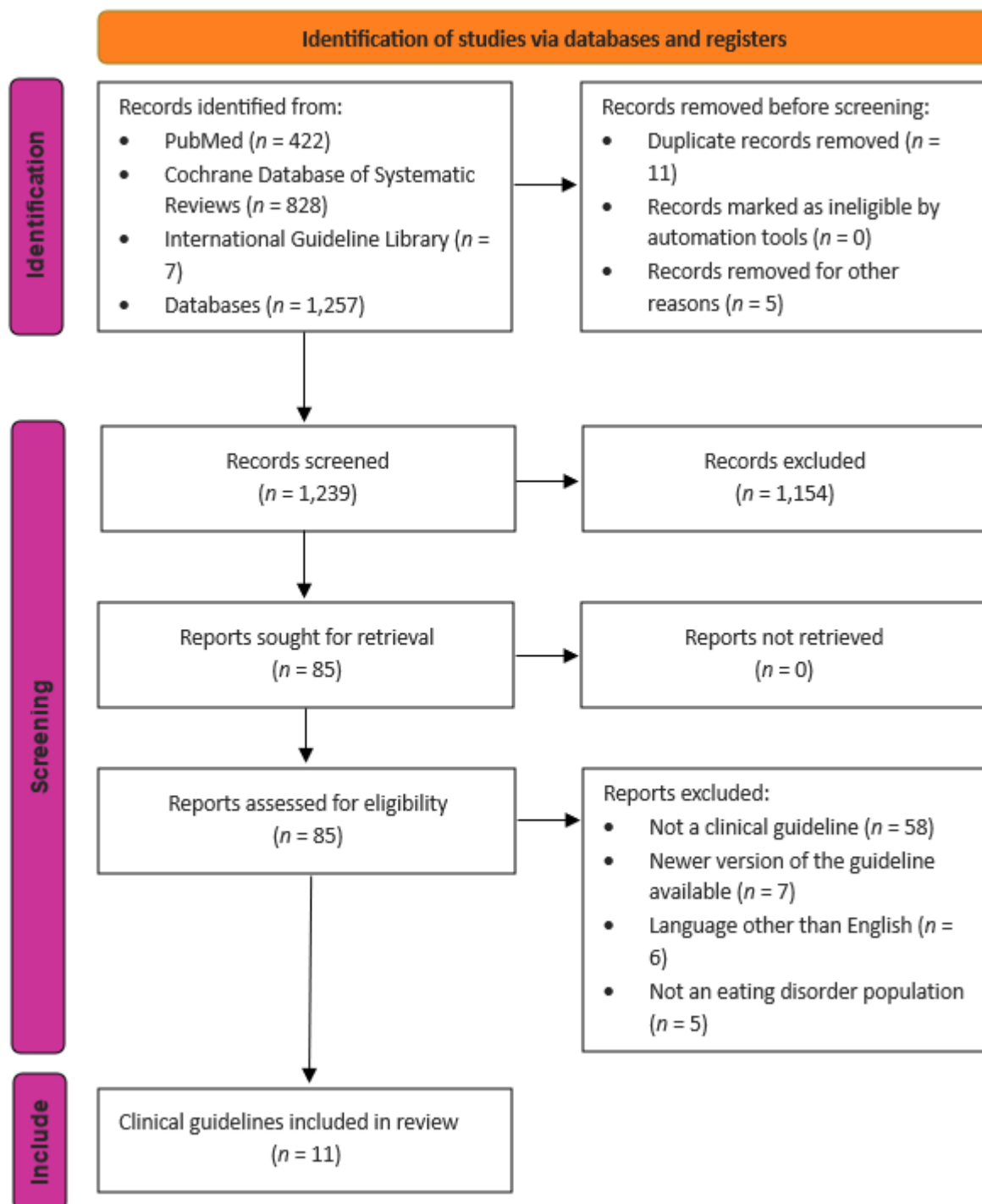



Figure 8.1. PRISMA flowchart for review.

Children and adolescents

Eight guideline documents made recommendations about treatment of anorexia nervosa for children and adolescents. In general, however, there were fewer recommendations for the treatment of anorexia nervosa in children and adolescents across the categories of treatment than for adults included in the guidelines. The Canadian and UK (MEED) guidelines specifically focus only on these age groups. Three of the guidelines recommend that carers should be involved in the treatment of patients under the age of 18 (UK [MEED], US, and Germany). The Australian (RANZCP) guideline recommends that there be a stepped care approach to treatment as well as treatment being multidisciplinary. Three of the guidelines also mention how to transition patients to adult services should that be required, with the Australian (RANZCP) guidelines recommending this be carefully planned to ensure a smooth change in provider.

All guidelines that made recommendations on the treatment setting ($n = 5$) made recommendations for the first line treatment setting to be outpatient. The Canadian, German, and UK (MEED) guidelines all included recommendations for day patient treatment, hospitalisation, discharge criteria, as well as information on compulsory treatment. The US guidelines included recommendations for day patient treatment, hospitalisation, and information on compulsory treatment, with the Australian (RANZCP) guidelines including criteria for hospitalisation. Only the UK (MEED) guidelines provided information on recommended energy intake and recommended weight gain per week in inpatient settings. Recommendations from three guidelines addressed supplementation and artificial feeding. Four guidelines recommend nutritional counselling. Hereafter, the term nutritional counselling will be used as it was the term most frequently used in the majority of guidelines and encompasses nutritional therapy and nutritional education. All guidelines that mention nutritional counselling and education in anorexia nervosa (Germany, UK [NICE], UK [MEED], and US) recommend it be provided by a multidisciplinary team, as well as not being used as the sole treatment. The US guidelines recommend that registered dietitians (this term will be used within this review; it is acknowledged that countries use different terms for dietitians such as accredited practicing dietitian or registered dietitian) are involved in nutritional counselling and along with the German guidelines recommend that these professionals have experience in treating individuals with an eating disorder. The UK (NICE) guidelines stipulate that all therapies should include some form of nutritional counselling and that when treating a patient under the age of 18 there needs to be parental or carer education around this as well.

All but one of the guidelines provide recommendations for psychological intervention, with FBT recommended as the first line therapy in children and adolescents with anorexia nervosa. Five of the guidelines offer alternate therapies if FBT is not appropriate, these include AFT or CBT. In general, no guideline recommends the use of medication in treatment of children and adolescents, stating there needs to be more research conducted in the area. The UK (NICE) guidelines explicitly state medication is not recommended as a sole treatment. Four guidelines recommend against using antidepressants, with the Australian (RANZCP) guidelines also recommending against using SSRIs. A further two guidelines (German and Scottish) cautiously recommend the use of SSRIs, specifically fluoxetine. The Canadian guidelines cautiously recommend some antipsychotics but recommend against using SNRIs and mood stabilisers.



A comparison of evidence-based clinical guidelines in anorexia nervosa in children and adolescents is provided in Appendix 8.4.

Adults

Seven guideline documents made recommendations on treatment of anorexia nervosa for adults. All guidelines that made recommendations on the treatment setting for adults with anorexia nervosa ($n = 4$) made recommendations for the first line treatment setting to be outpatient. Some guidelines provided information on day patient treatment ($n = 3$), and the majority provided criteria for inpatient treatment ($n = 4$) as well as information on compulsory hospitalisation ($n = 4$). The Australian (RANZCP) guideline recommends that there be a stepped care approach to treatment, as well as treatment being multidisciplinary.

The majority of guidelines ($n = 4$) included recommendations for energy intake within inpatient, day patient, and outpatient treatment settings, with the level of intake varying across guidelines. All but one guideline recommend supplements (e.g., phosphate, iron, vitamin D) as part of the nutritional intake. All guidelines that made recommendations for adults with anorexia nervosa gave information around artificial feeding. The three guidelines that recommended nutritional counselling did so by also stating that this should not be the sole treatment (German), that it should be conducted by a registered dietitian (US), and that it should be a part of a multidisciplinary approach (UK [NICE]). Psychological intervention was recommended by most of the guidelines ($n = 5$); however, the US guidelines expand on this and make the caveat that psychological intervention may be ineffective in patients who are starving. CBT was the most frequently recommended specific therapy for adults, with the UK (NICE) and US guidelines specifically recommending enhanced CBT (CBT-E). FBT and psychodynamic therapies were cautiously recommended, and IPT was recommended by the Scottish guidelines if CBT was deemed ineffective. MANTRA and SSCM were also mentioned by three of the guidelines as other treatments to consider initially (see Appendix 8.1).

In general, medications to treat anorexia nervosa in adults were not recommended, with the Scottish and UK (NICE) guidelines stating that clinicians need to consider physiological safety and impact of malnutrition on medication adherence, and if they were to be used in treatment they must not be used alone. With regard to specific medications, one guideline (German) recommended against the use of antidepressants, with the US guideline cautiously recommending them. Three guidelines cautiously recommended the antipsychotic olanzapine, with the US guidelines also recommending caution for other antipsychotics such as risperidone, quetiapine, and chlorpromazine. The German guidelines recommended against appetisers, lithium, oxytocin, and benzodiazepines with the US guidelines agreeing that benzodiazepines should not be recommended. Oestrogen was recommended to be considered for relevant patients by the US guideline.

With regards to any other relevant information to consider, the German guidelines discuss how all treatment settings need to adhere to having therapists or institutions that have experience treating eating disorders, especially when the patient is being treated through compulsory hospitalisation or are being tube fed. The guidelines state that it is of utmost importance that the patient is treated with dignity. The recommendations regarding the importance of experienced healthcare professionals in the German guidelines were supported by research that observed that 70% of inpatients achieved specified weight restoration when treatment was provided by an experienced



team that worked closely together with a structured plan. This compared to 20% of inpatients achieving weight restoration prior to implementation of a structured plan process¹⁵. The Scottish guidelines also note that formal support should be provided to carers of patients with anorexia nervosa. The full table of guidelines is presented in Table 8.1 below. A comparison of evidence-based clinical guidelines in anorexia nervosa in adults is provided in Appendix 8.1.



Table 8.1. Evidence-based clinical guidelines for eating disorders

Abbreviation	Full guideline name	Year	Country	Status	Scientific society	Target	Preparing committee	Eating disorders	Age
AUS (RANZCP)	RANZCP clinical practice guidelines for the treatment of eating disorders	2014	Australia and New Zealand	Active	RANZCP	Specialists	Working group of health care academics and professionals and wide consultation with key stakeholders and the community	AN, BN, BED	< 18 and >18
AUS	Management of eating disorders for people with higher weight: clinical practice guideline	2022	Australia	Active	National Eating Disorders Collaboration	Specialists	Development group supported by The National Eating Disorder Committee	Child and adolescent AN, BN, BED, OSFED	< 18 and >18
CAN	Canadian practice guidelines for the treatment of children and adolescents with eating disorders	2020	Canada	Active	–	Specialists	Academic experts in the field of eating disorders, multi-disciplinary front-line clinicians in community settings, parent and patient representatives, hospital administrators, and policymakers and those with lived experience.	AN, BN	< 18
GER	S3 Guidelines: Diagnosis and Treatment of Eating Disorders	2019	Germany	Active (due for revision)	German Society for Psychosomatic Medicine and Medical Psychotherapy	Specialists	Multidisciplinary group comprising of those with expertise in eating disorders	AN, BN, BED	< 18 and >18
SCO	Eating Disorders: A National Clinical Guideline	2022	Scotland	Active	Scottish Intercollegiate Guidelines Network	Primary, secondary and tertiary healthcare professionals		AN, BN, BED	< 18 and >18
UK (MEED)	MEED: Guidance on Recognition	2023	United Kingdom	Active	Royal College of Psychiatrists	Specialists	Multidisciplinary group consisting of eating disorder	AN	< 18



	and Management						psychiatrists, paediatricians, dietitians, and a GP		
UK (NICE)	NICE: Clinical Guidelines	2020	United Kingdom	Active	NICE	Specialists, those with suspected eating disorders and their families	Multidisciplinary group	AN, BN, BED	< 18 and >18
US	The APA Practice Guideline for the Treatment of Patients With Eating Disorders	2023	US	Active	APA	Specialists	Psychiatrists	AN, BN, BED	< 18 and >18
WFSBP	WFSBP guidelines for the pharmacological treatment of eating disorders	2011	–	Active	WFSBP	Specialists	WFSBP task force on eating disorders	AN, BN, BED	

Note. AUS = Australia, RANZCP = Royal Australian & New Zealand College of Psychiatrists, AN = anorexia nervosa, BN = bulimia nervosa, BED = binge eating disorder, OSFED = other specified feeding or eating disorder, CAN = Canada, GER = Germany, SCO = Scotland, UK = United Kingdom, MEED = Medical Emergencies in Eating Disorders, GP = general practitioner, NICE = National Institute for Health and Care Excellence, US = United States, APA = American Psychiatric Association, WFSBP = World Federation of Societies of Biological Psychiatry.

Children and adolescents

Six guideline documents provided recommendations for treatment of bulimia nervosa for children and adolescents. Of the three guidelines that provide recommendations for treatment settings in the treatment of children and adolescents with bulimia nervosa, two recommend that outpatient treatment should be first line and the third includes information around the topic. The Canadian and Scottish guidelines also provide criteria for both day patient and inpatient treatment of bulimia nervosa. Two guidelines provide recommendations around nutritional counselling (Australian [NEDC] and US). The majority of guidelines provide recommendation for psychological intervention with two specifically recommending that this is first line treatment (Australian [NEDC] and German), and both of these guidelines recommending CBT as the therapy with which to commence treatment. FBT is recommended by all six guidelines that provide information on treating bulimia nervosa in children and adolescents, with the UK (NICE) guidelines recommending that the FBT be bulimia nervosa-specific FBT.


Three guidelines specifically recommend against the use of medication, whether that be as a first line treatment (Australian [NEDC]) or as the sole treatment (German and UK [NICE]). Two guidelines (Canadian and German) recommend specifically against the use of bupropion, and fluoxetine is recommended by two (Canadian and Scottish). There is also a recommendation against the use of mood stabilisers and SNRIs by the Canadian guidelines.

Other information mentioned across the guidelines is the recommendation that treatment be multidisciplinary, that comorbid illness needs to be treated as well as the eating disorder, recommendations against transcranial magnetic stimulation, acupuncture, weight training, yoga or warming therapy, and that carers should be involved in treatment. A comparison of evidence-based clinical guidelines in bulimia nervosa in children and adults is provided in Appendices 8.2 (adults) and 8.5 (child and adolescents).

Adults

Seven guideline documents provide recommendations for treatment for adults with bulimia nervosa. All guidelines that made recommendations on the treatment setting in adults with bulimia nervosa ($n = 5$) made recommendations for the first line treatment setting to be outpatient treatment. Three of the guidelines included recommendations for day patient and inpatient treatment settings. Only two of the guidelines (Australian [NEDC] and US) provide information around nutritional counselling.

All guidelines have recommendations for psychological intervention as a treatment in general, however the WFSBP state there appears to be a ceiling effect when psychotherapy is combined with pharmacology. This is most likely due to this group only providing guidelines on pharmacology so there are no concrete recommendations about therapy in this guideline. Five guidelines recommend CBT as first line therapy, with a sixth (UK [NICE]) recommending CBT if self-help is ineffective or unsuitable. Recommendations regarding FBT were also made; with the Australian (RANZCP) guide specifically recommending against this treatment in adults with bulimia nervosa. Self-help is also recommended by four other guidelines, but the US guidelines specify that if this is not effective



within four weeks moving to other therapy is necessary. IPT is recommended by three guidelines if the use of CBT is ineffective or unsuitable. The Australian (NEDC) guideline also recommend considering therapy that has demonstrated efficacy in the treatment of anorexia nervosa, as well as DBT. DBT is also recommended by two other guidelines for patients who may also have comorbid illness such as borderline personality disorder.

All guidelines provide recommendations for the use of medications in general to treat bulimia nervosa in adults, with two of these specifying that medication should be used in conjunction with psychotherapy and not used as a sole treatment. Fluoxetine is the most commonly recommended SSRI, with two guidelines recommending against the use of bupropion. The German guideline recommends against the use of tricyclics, MAOIs, anticonvulsants, and lithium. There are mixed recommendations with regard to anticonvulsants, with one guideline (Australian [RANZCP]) recommending topiramate and two others recommending against their use (Australian [NEDC] and Germany). Other treatments such as physical activity are mentioned by the Australian (NEDC) guidelines. It is also mentioned in the Australian (NEDC) guidelines that anyone who is wanting to undergo bariatric surgery needs to be screened for an eating disorder. The UK (NICE) guidelines specifically recommend against the use of transcranial magnetic stimulation, acupuncture, weight training, yoga, or warming therapy.

Other areas covered by these guidelines are the cultural considerations and treatments within minority groups (Australian [NEDC]), that co-morbid illnesses need to be diagnosed and treated accordingly (German), and that there should be formal support provided to carers (Scottish). A comparison of evidence-based clinical guidelines in bulimia nervosa in adults is provided in Appendix 8.2.


Binge eating disorder

Children and adolescents

There is a lack of recommendations in this area, with only three guideline documents covering recommendations for BED in children and adolescents (Germany, Scottish, and UK [NICE]). The UK (NICE) guidelines recommend that treatment for children and adolescents is the same as provided for adults. The German guidelines provide criteria for hospitalisation as well as recommending in favour of psychological intervention with FBT being the first line treatment. The Scottish guidelines recommend that CBT, FBT, and IPT be offered to adolescents. Both the German and the Scottish guidelines recommend against the use of medications with the NICE guidelines providing criteria for their general use. A comparison of evidence-based clinical guidelines in binge eating disorder in children and adolescents is provided in Appendix 8.6.

Adults

Seven guideline documents made recommendations for treatment of BED in adults. All guidelines that made recommendations on the treatment setting in adults ($n = 4$) made recommendations for the first line treatment setting to be outpatient treatment. Three of the guidelines provided recommendations for criteria for hospitalisation. The majority of the guidelines provide



recommendations for nutritional counselling with the US guidelines specifying that this needs to be conducted by a registered dietitian.

Psychological intervention in general is recommended as first line treatment by most guidelines, with CBT being specifically recommended by the majority of guidelines. FBT is not recommended by the Australian (RANZCP) guidelines, whereas a recommendation in favour of FBT was made by the Australian (NEDC) guideline as a second line treatment of BED in adults. Self-help is also commonly recommended, with five guidelines recommending in favour and all providing information regarding the treatment. The German guidelines and the NICE guidelines are detailed in their recommendations and evidence base, with the latter indicating a treatment length and then alternative treatments that should be considered at 4-week review if self-help is not effective or contraindicated. The Australian (NEDC) guidelines provide statistics to support the effectiveness of this form of therapy in those with BED. In contrast, the guidelines from Australia (RANZCP) and the US provide little additional information around therapist guided self-help. Four of the guidelines also recommend interpersonal therapy in the treatment of BED. Other therapies mentioned in the guidelines include humanistic therapy, DBT, schema therapy, and integrative cognitive-affective therapy.

In general, the recommendations regarding medication are detailed, with five guidelines providing recommendations. The guidelines further state that medication can be used if psychotherapy is refused (German), can be used but not as the sole treatment (UK [NICE]), or can be used if the patient prefers medication or when therapy alone is not enough but should not be used as the sole treatment (US). One guideline (Scottish) recommends against the use of medications as either a sole treatment or an adjunct to psychotherapy. Fluoxetine is the most frequently recommended SSRI. Other SSRIs that are recommended are citalopram/escitalopram and sertraline, with three guidelines recommending in favour of these and one cautiously recommending. One guideline recommends the use of the tricyclic imipramine. The anticonvulsant topiramate is recommended in favour of its use by two guidelines (Australian [RANZCP] and WFSBP) with two guidelines cautiously recommending it. This is in opposition to the German guideline that states there is limited evidence of the effectiveness of anticonvulsants in BED. The German guideline also recommends against the use of orlistat compared to two guidelines that recommend in favour. The final medication mentioned is lisdexamfetamine with two guidelines cautiously recommending the use of this in treatment.


Other treatments such as physical activity are mentioned by the Australian (NEDC) and the German guidelines. The UK (NICE) guidelines specifically recommend against the use of transcranial magnetic stimulation, acupuncture, weight training, yoga, or warming therapy. A comparison of evidence-based clinical guidelines in binge eating disorder in adults is provided in Appendix 8.3.

Other specified feeding and eating disorders

In all ages in the clinical guidelines that discussed OSFED, the recommendations were to follow the treatment recommendations of the eating disorder that it most closely resembles.

Avoidant restrictive food intake disorder

ARFID was not discussed in detail in the majority of the guidelines in terms of recommendations to treat it. However, the guidelines from Germany do present a few recommendations in regard to



treatment setting and therapy. They recommend that ARFID is treated in outpatient settings but that medical review be conducted and in the case of malnutrition that hospitalisation be considered. They also recommend that parents be informed and that a mealtime structure be applied. The UK (MEED) guidelines also included a focus on ARFID. The guidelines emphasise that parents should be involved in treatment and that they are essential to treatment.

The other guidelines (Australian [RANZCP], US, Australian [NEDC], Scottish) that did mention ARFID stated that more research should be conducted in this area and specifically to inform the most efficacious way to treat ARFID. The updated WFSBP guidelines recommend medication to help treat ARFID: mirtazapine, fluoxetine, sertraline, olanzapine, and appetite stimulants ¹¹.


Discussion

This scoping review updated and expanded upon the previous systematic review conducted by Hilbert, Hoek and Schmidt ² of clinical guidelines for treatment of eating disorders. The present review shows both the similarities and the differences between the treatment recommendations across anorexia nervosa, bulimia nervosa, and binge eating disorder across multiple countries and age groups. This information is then used to compare against key features of the Eating Disorders MBS initiative in Australia.

Key features of clinical guidelines

For all ages and eating disorder types, it is recommended to treat as outpatient first wherever possible. For individuals with living experience of anorexia nervosa who are under the age of 18, the consensus is to have parents or carers involved in treatment. In such instances, FBT is the most commonly recommended therapy across guidelines. For adults with anorexia nervosa, the main consensus was that CBT/CBT-E is used as first line therapy and that medications are not generally recommended. Medications are also not recommended in those under 18 with bulimia nervosa; CBT and FBT are the most common therapies to be recommended. This is different from recommendations for adults with bulimia nervosa where medications are generally positively recommended. CBT is the main therapy that should be trialled first in this group as well. There is an overall lack of recommendations for treatment of BED in those under 18 years of age. However, where recommendations exist, CBT and FBT are recommended to be used, and medications are generally not recommended. This again is different from recommendations for the adult group with BED, for whom medications are indicated as first line treatments. All guidelines that mention OSFED state that people with OSFED should be provided the treatment as per the eating disorder the presentation most commonly resembles.

There are several key things to consider with treatment including first line treatment options, hospitalisation, and age of the person with the eating disorder. There is agreement in guidelines identified through this review that outpatient psychotherapy should be the first treatment option in those that do not require medical intervention due to being severely underweight. The recommended approach is different for those who are medically compromised and require hospitalisation, with guidelines indicating that hospitalisation should be considered, and most guidelines provide recommendations for criteria to be evaluated to support decisions about hospitalisation. In terms of psychotherapy among those under the age of 18, the main treatment




recommendation that is consistent across the guidelines is FBT as a first line therapy (Australian [RANZCP], Australian [NEDC], German, Scottish, and US). This recommendation for FBT is also consistent with the Hilbert, Hoek and Schmidt ² review findings. CBT was also consistently recommended across guidelines for this age range and across eating disorders. Some of the guidelines recommended that adolescents receive a different treatment than FBT or CBT, or that they have individual treatment if FBT is not suitable. Overall, in terms of the clinical guidelines that discuss the treatment of anorexia nervosa in children and adolescents, there is consistency where there are recommendations made.

The guidelines are also all consistent in recommending that psychotherapy be the first treatment option for adults, with the exception that in BED medications may also be trialled first. As noted above, this is the case for those adults who do not require medical intervention due to being severely underweight, with the US guidelines noting that therapy may be ineffective among starving patients. CBT is the main therapy recommended in adults, due to the volume of evidence in support of this approach. In addition to recommending CBT as the first line therapy, recommendations are also made as to the duration and number of sessions to be provided. These recommendations are also relatively consistent across the guidelines but dependent on the type of therapy being recommended. None of the guidelines recommend a therapeutic dose of less than 16 sessions of clinical therapy in any type of eating disorder. The guidelines from the US and the UK detail recommended number of sessions across multiple eating disorders. One difference in recommended treatments that emerged across guidelines is the recommendations around use of psychodynamic therapy, with the US guideline providing an overall recommendation for its use and the Scottish guideline recommending its use only when CBT is ineffective or contraindicated. The US guideline states therapy should be conducted twice weekly to begin with, with the initial goal of developing the therapeutic relationship. MANTRA and SSCM are also recommended by multiple guidelines as alternatives or other therapies to consider.

Recommendations for medication use also demonstrated some consistencies across guideline documents. Almost all guidelines agree that there needs to be more research conducted regarding use of general medication therapy within children and adolescents with anorexia nervosa. As such, there is consistency in recommending against the use of medications in general and antidepressants specifically for children and adolescents. In relation to adults, the guidelines are also similar in recommendations for use of medications in treatment. Three of the guidelines recommend that if medications are to be used, consideration of co-morbid conditions as well as the impact that malnutrition will have on their efficacy must be made. Overall, the highest level of consistency seen in guidelines regarding the use of medications is for their recommendations across all age groups and the caution that needs to be taken with their use. Other non-psychological treatments were also covered in the guidelines and differences emerged as to which treatments were recommended. The German guidelines mentioned neuromodulation (rTMS, deep brain stimulation, tDCS) but that these have only played a role in research contexts thus far. This is in contrast to the UK guidelines which recommend against alternate treatments such as transcranial magnetic stimulation, acupuncture, weight training, yoga, or warming therapy for anorexia nervosa and also for any other eating disorder.

Several considerations to take into account when treating bulimia nervosa also arose from the guidelines. The recommendation for psychological interventions is a strength of these guidelines as




almost all provide some recommendations as first line treatment options in people under 18 years of age. The Australian (NEDC) guidelines recommend that FBT is the first therapy for young people, with CBT being the second line option. This is in contrast with the German guidelines which recommend CBT as a first line treatment. Some guidelines (Canadian and Scottish) have specific recommendations for adolescent patients; that they are offered CBT, FBT, or AFT. All guidelines were consistent in not recommending anything in terms of self-help or IPT for adolescents, in contrast to these options being recommended for adults. For adults with bulimia nervosa, there is agreement between all guidelines that psychological interventions should be used, with three indicating that it is a first line treatment recommendation. CBT is the therapy that is most positively recommended with the majority stating it should be first line therapy, the UK (NICE) and the Australian (NEDC) guidelines recommend CBT is tried if self-help is not effective. Self-help is also discussed by a few guidelines with the US recommendation for use of self-help having the caveat there needs to be improvement within four weeks before trying another therapy. No other guidelines recommend a time frame for self-help. In cases where a co-morbid disorder, such as borderline personality disorder, is present, guidelines indicated that consideration should be given to other therapies such as DBT, group CBT, FPT, and mentalisation-based therapy. These other types of therapy (e.g., DBT, FPT; Scottish, Australian [NEDC]) were also recommended by guidelines if other recommended psychological interventions were not effective. In relation to the pharmacological treatment of bulimia nervosa, similar to the recommendations for anorexia nervosa in children and adolescents, there are recommendations against using medications as sole and first line treatments as well as reminders to check warning labels. There is disagreement, for adults, between the German guidelines and Australian (NEDC) and the Australian (RANZCP) recommendations in terms of use of anticonvulsants. The former two guidelines both recommend against use, stating not enough evidence is available to support use for people with bulimia nervosa, whereas the latter guideline recommends the use. Across all guidelines, the recommendation that medications should be combined with therapy and not used as a sole treatment was consistently made.

With regard to therapy considerations in BED, CBT is consistently recommended for adults with the specific CBT-E approach mentioned. Differences in recommendations were observed with the Australian (RANZCP) guidelines recommending against FBT but the Australian (NEDC) guidelines recommend FBT as a second line treatment. This difference could be because the latter guidelines account for a younger patient group where the family may be more involved in treatment. Self-help is also an approach consistently recommended; this may be due to this approach having a stronger evidence base and following a stepped care approach where the less intensive treatment is considered first. There are also several other therapies recommended for BED such as DBT, MANTRA, FPT, and schema therapy. Nutritional counselling is also recommended by four of the guidelines (Australian [RANZCP], Australian [NEDC], German, US), with the US guidelines specifically recommending that this is with a registered dietitian. In terms of specific classes of medication for adults with BED, the consensus across the guidelines is that SSRIs are used. Two guidelines (German and US) state that medications can be used if psychotherapy is refused (Germany and US) or can be used but not as the sole treatment (NICE).

Alignment of clinical guidelines with accessible, manualised treatments

Our second aim of this review was to determine whether recommended treatments identified in clinical guidelines have readily available manuals to facilitate training and use in the field.



Encouragingly, we find good alignment here, as treatments have been manualised for eating disorders for children and adolescents, and adults. Manuals were found for CBT^{16,17}, AFT¹⁸, FBT¹⁹, MANTRA²⁰, DBT²¹, and IPT-ED²². For consistency of treatment delivery, access to manuals is essential. They may also offer training resources for clinicians interested in applying these recommended treatments in routine practice with their clients.

Alignment of clinical guidelines with Eating Disorders MBS initiative


When viewed as a whole, the identified clinical guidelines documents make recommendations aligned with salient features of the Eating Disorders MBS initiative. In some instances, a recommendation may have only been made in one of these clinical guideline documents, but this was not contradicted by recommendations against in other guidelines. In other instances, there was stronger consensus with explicit agreement across most guidelines about a particular recommendation.

The Eating Disorders MBS initiative permits treatment involving any of the following FBT, AFT, CBT- E, SSCM, MANTRA, IPT, DBT (conditionally recommended), and focal dynamic therapy. Each of these were explicitly mentioned in clinical guidelines as appropriate treatments, dependent on eating disorder type and age of individual with living experience of an eating disorder. In several of the clinical guidelines (including Australian clinical guidelines), there is explicit mention of a stepped care model for treatment, emphasising matching of treatment intensity and type to severity of illness. There is some mention of self-guided therapies, but these are not recommended for more severe level of illness, and thus are unlikely to be recommended for individuals who would meet eligibility criteria for Eating Disorders MBS access.

Each of the psychological treatments identified in the clinical guidelines documents may be offered in outpatient settings, via trained healthcare providers, consistent with the Eating Disorders MBS item structure. In cases of severe underweight where urgent medical attention is strongly recommended, in-patient stays are likely required to stabilise weight. This aspect is not captured in Eating Disorders MBS, though would be captured via other existing mechanisms within the Australian healthcare system. Study 4 in this Eating Disorders MBS evaluation asks about hospitalisation as a means to ascertain the proportion of individuals accessing Eating Disorders MBS items who also utilise other healthcare services.

Medication is not recommended as a stand-alone treatment for any of these eating disorder subtypes covered in clinical guideline documents, though may be permissible in conjunction with psychological treatment. The Eating Disorders MBS initiative does not include items specifically for medication as this is covered through the Pharmaceutical Benefits Scheme (PBS). Study 1 of the main report includes evaluation of proportion of individuals accessing Eating Disorders MBS items who also access prescriptions via PBS to provide a broader picture of healthcare utilisation.

Although the clinical guidelines documents identify specific treatments as first line, many note the need for alternate treatment options where individuals are not responsive to these initial treatment approaches. This is broadly in keeping with the flexibility in approach taken in Eating Disorders MBS, where a range of treatment options may be covered under this initiative. It is important to reiterate that recommended first line treatments differ by age and eating disorder subtype, and hence appropriate wording is needed in the Eating Disorders MBS initiative to help guide initial approach



for individuals accessing treatment. Potential amendments to wording of Eating Disorders MBS treatment options are proposed in the Recommendations section (Chapter 7) of our main report.

The value of a multidisciplinary approach to treatment was emphasised across clinical guideline documents, which included psychological treatment as well as nutritional counselling. This is consistent with the provision of psychological and dietetic services through the Eating Disorders MBS initiative. Moreover, in cases where clinical guidelines specify an ideal number of treatment sessions, there was some variability (dependent on treatment type and age of individual receiving treatment), yet all guidelines recommended at least 16 sessions – a number that exceeds treatment affordances via pre- Eating Disorders MBS initiative such as Better Access, but which is accommodated through the maximum of 60 sessions (40 psychological, 20 dietetic) available through the Eating Disorders MBS initiative. The US clinical guidelines also make mention of ideal frequency of two sessions per week, especially early in the treatment process. The Eating Disorders MBS initiative does not place requirements on frequency of sessions, and this may in large part be dictated by healthcare provider availability and consumer’s ability to pay rather than optimal pacing of treatment. This point is taken up further in the Recommendations section (see Chapter 7) of the main report for this Eating Disorders MBS evaluation project.


Finally, several clinical guidelines make explicit mention of carers, either as a core component of treatment process (e.g., for adolescents with living experience of anorexia nervosa) or as a group of individuals who should also be given access to treatment services given the potential psychological impacts of the carer role. This aligns nicely with emphasis on carer involvement in the treatment process for Eating Disorders MBS.

Strengths and weaknesses of current review

As found in Hilbert, Hoek and Schmidt ² the consistency across guidelines lies within the recommendations for psychological treatment of eating disorders. The guidelines are all based on the literature that was available at the time, therefore any similarities are most likely influenced by this. Another consistency noted in the previous review as well as this current review is the recommendations for single medications, rather than a combination, that have more evidence available about their use in treatment of eating disorders.

The guidelines were created by different organisations representing differing professions. While most guidelines were created by multidisciplinary organisations (see Table 8.1), the dominant professions that contributed to each treatment guideline will impact what is recommended. This may be one reason for inconsistencies across guideline documents and the approaches that are recommended for treatment. For example, the WFSBP guidelines, developed by societies of biological psychiatry, focused on pharmacological treatments, whereas the Australian (RANZCP) guidelines, also developed for a psychiatry organisation, had multidisciplinary contributors. As well as this, the age of the guidelines will impact their recommendations as recommendations were based on research that was available at the time the guidelines were developed. Almost all guidelines were published between 2020 and 2023, with only two lying outside this date range (Australian [RANZCP] in 2014 and German in 2019).

One strength of this scoping review is that it was not limited to any particular age group, meaning that there are summaries for the treatment across the lifespan. A methodological limitation is that



this review could only include English language guidelines which means there may be cultural biases in the recommendations that are summarised. Future reviews should employ multi-lingual teams to ensure all guidelines can be obtained for analysis. The conclusions and summaries that can be drawn in this review are limited to the content of the guidelines document. It is noted that none of the guidelines provided content regarding the identification and diagnosis of eating disorders, and no information exists as to how or if these guidelines are being used in practice, and if they are effective tools for professionals or service delivery organisation. It would be beneficial in future to determine the level of use of these guidelines within a professional setting.

We also observed that few guidelines referred to ARFID. There needs to be more guidance into the treatment of ARFID across all guidelines. This is also mentioned by the guidelines themselves. Several gaps were evident in the recommendations. Having a clear time frame for guided self-help in treatment guidelines could be useful for the treatment of bulimia nervosa, and potentially reducing time spent in recovery. There are some gaps relating to criteria for hospitalisation and discharge (Australian [RANZCP], Scottish, US, German), so more recommendations could be made on this matter to maintain consistency in what is being recommended and in which country. Only three guidelines touch on treatment recommendations for children and adolescents with BED, which is a large gap. The treatment recommendations for pharmacology in BED in children and adolescents is also sparse, with only one guideline (UK [NICE]) mentioning this approach to treatment.

Conclusion

This scoping review aimed to articulate what best practice treatment for people with eating disorders is, as well as if treatment recommendations align with readily available manualised treatments and the Eating Disorders MBS initiative. The results of this review demonstrated availability of manuals for first line treatments identified through clinical guidelines documents, and reasonable alignment between the approved treatments within the Eating Disorders MBS and those recommended in clinical guidelines. The guidelines across children and adolescents consistently recommend that children and adolescents are offered FBT, and there several guidelines that recommend AFT. CBT is almost always recommended to people across eating disorder types, with some specifying that the CBT should be used specifically for the type of eating disorder (e.g., CBT for anorexia nervosa, CBT-E). There are considerations in the clinical guidelines for IPT for bulimia nervosa in adults, but this is only for when another treatment such as CBT has been tried and has been unsuccessful. Within BED in adults there are clear recommendations for IPT, so this aligns with the Eating Disorders MBS recommended treatments. In relation to the length of sessions, guidelines are clear in their recommendation that no patient receives less than a 16-session course of the chosen psychotherapy, with two of the guidelines detailing the number of sessions for each therapy style.

We note that clinical guidelines are evolving in light of emerging literature, and that there is a particular dearth of literature on best approaches for treatment of ARFID. There is tacit acknowledgement that first line treatments may not work for everyone, and hence emerging lines of scientific evidence provide a crucial means for identifying new treatments that may ensure appropriate and effective treatments for more individuals with an eating disorder over time. This evolution in understanding and clinical practice has direct relevance for Eating Disorders MBS offerings; a mechanism for ensuring continued appropriateness of Eating Disorders MBS treatment offerings is vitally important to the success of this initiative.

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