



**Evaluating the Access to Allied Psychological
Services component of the Better Outcomes in
Mental Health Care program**

Seventeenth Interim Evaluation Report Supplement

**Third report of the Perinatal Depression
Initiative: Consumers, their treatment and
outcomes**

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Executive summary

Since the introduction of the National Perinatal Depression Initiative, an increasing number of Divisions have been taking part in the initiative. For both urban and rural Divisions the number of referrals and sessions delivered peaked in 2010. Consumers referred to the initiative have primarily been female, low income earners who experienced severe levels of psychological distress. CBT-based cognitive, CBT-based behavioural and psycho-educational interventions were the most commonly delivered treatments. Consumers have responded well to the care that they have received making both statistically significant and clinically meaningful gains when assessed by standardised mental health outcome measures.

Background

The Better Outcomes in Mental Health Care program has been extended to provide services for the National Perinatal Depression Initiative. In 2008 the Federal Government introduced the National Perinatal Depression Initiative which is designed to improve prevention, early detection of and intervention for antenatal and post natal depression and provide better support and treatment to expectant and new mothers.¹ The Initiative also aimed to provide training for health professionals and raise community awareness about antenatal and perinatal depression. Funding has been distributed through state and territory governments, the Access to Allied Psychological Services (ATAPS) component of Better Outcomes in Mental Health Care Program and *beyondblue*: the National Depression Initiative.

More specifically the ATAPS component of the National Perinatal Depression Initiative aims to:

- Build the capacity of Divisions of General Practice to better support women with perinatal depression;
- Provide psychological treatment and follow-up services for women at risk of or experiencing perinatal depression;
- Strengthen key links and referral pathways with child and maternal health services; and
- Improve access to services in rural and remote areas, and communities with special needs (e.g., Aboriginal and Torres Strait Islander communities).

This current report profiles the Perinatal Depression ATAPS consumers in terms of their socio-demographic, clinical and treatment characteristics and presents data on their treatment outcomes.

Method

Evaluation Questions

This evaluation addresses three primary questions that relate to uptake, consumer characteristics and treatment outcomes. The evaluation questions are as follows:

Evaluation Question 1: What is the uptake of the Perinatal Depression Initiative by GPs, allied health professionals, and consumers?

Evaluation Question 2: What is the profile of consumers and the care they are receiving?

Evaluation Question 3: What are the outcomes for consumers of the Perinatal Depression Initiative?

Data Source

Data related to the ATAPS component of the National Perinatal Depression Initiative were extracted from the web-based minimum dataset. Four types of data were collected via the minimum dataset:

1. Provider-level data (demographic, professional).
2. Consumer-level data (socio-demographic, clinical).
3. Consumer-level (outcomes): These data involved the use of three standardised outcome measures, namely the Edinburgh Post Natal Depression Scale (EPDS)², the Depression Anxiety Stress Scales (DASS 21 or DASS 42)³, and the Kessler-10 (K-10)⁴. These instruments are described in Table 1, and full versions of each are provided in Appendices 1, 2 and 3.
4. Session-level data: These data were collected at each session and included detail on the duration of the session, the assessment(s) and intervention(s) that were provided during its course, and whether the session attracted a co-payment.

Data analysed included numbers of GPs and allied health professionals providing services through the ATAPS projects and the number of referrals and sessions delivered to consumers (Evaluation Question 1), the profile of consumers (Evaluation Question 2), the nature of these services (Evaluation Question 2), and consumer outcomes (Evaluation Question 3).

Data Analysis

Simple frequencies and percentages were calculated in order to answer Evaluation Questions 1 and 2. Paired samples t-tests were undertaken to answer Evaluation Question 3.

Table 1: Summary of outcome measures used in the evaluation

Instrument	Description	Scoring	Use in evaluation
Edinburgh Postnatal Depression Scale (EPDS)²	Consumer-rated measure developed to assess post natal depression. Comprises 10 items which ask consumers about symptoms of post natal depression in the past seven days.	<p>Each item is scored from 0 to 3 according to the severity of the symptom. Resulting in scores of 0 to 30.</p> <p>Mothers who score above 10 are likely to be suffering from a depressive illness of varying severity.</p>	Used to assess pre- and post- treatment levels of depression.
Depression Anxiety Stress Scales (DASS-21)² and Depression Anxiety Stress Scales (DASS-42)³	Consumer-rated measure consisting of three sub-scales designed to measure depression, anxiety and stress, respectively. Each sub-scale consists of seven items, each of which consists of a statement relating to a symptom of depression, anxiety or stress. The consumer is asked to consider how much each statement applied to him or her in the past week.	<p>Each item is scored from 0 (“Did not apply to me at all”) to 3 (“Applied to me very much, or most of the time”). The raw sub-scale score on the DASS-21 ranges from 0 to 21 and is then doubled so that it ranges from 0 to 42. The raw sub-scale score on the DASS-42 ranges from 0 to 42 and unlike the DASS 21 the raw scores are not doubled.</p> <p>Recommended cut-off scores for conventional severity labels (normal, moderate, severe) are as follows:</p> <ul style="list-style-type: none"> • Depression: 0-9 (Normal); 10-13 (Mild); 14-20 (Moderate); 21-27 (Severe); ≥28 (Extremely severe); • Anxiety: 0-7 (Normal); 8-9 (Mild); 10-14 (Moderate); 15-19 (Severe); ≥20 (Extremely severe); and • Stress: 0-14 (Normal); 15-18 (Mild); 19-25 (Moderate); 26-33 (Severe); ≥37 (Extremely severe). 	Used to assess pre- and post- treatment levels of depression, anxiety and stress.
Kessler-10 (K-10)⁴	Consumer-rated measure developed to assess non-specific psychological distress. Comprises 10 items which ask the consumer about symptoms of depression and anxiety in the past four weeks.	<p>Each item is rated from 1 (“None of the time”) to 5 (“All of the time”), resulting in a total score that ranges from 10 to 50.</p> <p>Standard cut-off scores for levels of psychological distress are as follows: 10-15 (Low); 16-21 (Moderate); 22-29 (High); ≥30 (Very high).</p> <p>A positive difference between pre- and post-treatment scores indicates improvement.</p>	Used to assess pre- and post- treatment levels of psychological distress.

Results

Uptake data is now available for 91 (42 urban and 49 rural) Divisions. This is a substantial increase in the number of Divisions delivering these services from when this data was first reported in June 2009 (23 Divisions had delivered perinatal services)⁶ and from the second report in July 2010 (69 Divisions had delivered perinatal services)⁷.

Evaluation Question 1: What is the uptake of the Perinatal Depression Initiative by GPs, allied health professionals and consumers?

Uptake by GPs and allied health professionals

Table 2 presents the number of GPs and allied health professionals who have been participating in the National Perinatal Depression Initiative nationally and in urban and rural Divisions. Nationally, for the period from April 2008 to December 2010, a total of 1450 professionals (1043 GPs; 407 allied health professionals) participated in the initiative. In July 2010 the number of participating professionals was 713 (505 GPs and 208 allied health professionals), representing an increase of 103%⁷. There are 18% more urban than rural GPs involved in the initiative, whereas the proportion of allied health professionals in urban and rural Divisions are relatively even (approximately 50% each).

Table 2: Number of GPs and allied health professionals participating in the Perinatal Depression Initiative

	National (n= 1450) ^a		Urban (n = 828)		Rural (n=622)	
	Freq	%	Freq	%	Freq	%
GPs	1043	100%	611	59%	432	41%
Allied health professionals	407	100%	217	53%	190	47%

^a Cells do not always sum to the total n due to some missing data.

Referral sources

Table 3 shows a summary of referral sources; this data were available for 1162 (665 urban and 497 rural) of the 1724 referrals made. GPs were responsible for of the majority of referrals made in both urban and rural areas. It is noteworthy that the new referral sources namely maternal health nurses, midwives and obstetricians have only been added to the most recent iteration of the minimum dataset, accounting for the low rate of referrals recorded from these data sources.

Table 3: Summary of referral sources for the ATAPS component of the National Perinatal Depression Initiative

	National		Urban		Rural	
	Freq	%	Freq	%	Freq	%
GPs	1137	98%	648	97	489	98%
Community mental health services	13	1%	13	2%	0	0%
Maternal health nurses	6	1%	1	0%	5	1%
Midwives	3	0%	0	0%	3	1%
Emergency departments	3	0%	3	1%	0	0%
Obstetricians	0	0%	0	0%	0	0%

Uptake by consumers

Between April 2008 and December 2010, 1724 referrals (881 urban; 843 rural) were made to allied health professionals. An additional five referrals were reported to have been made prior to April 2008 and are likely to represent errors in data entry bringing the total number of referrals made to allied health professionals 1729 (882 urban; 847 rural). This represents a 126% increase in referrals since July 2010⁷.

A total of 6591 (3130 urban; 3461 rural) sessions of care were delivered to 1347 (or 78% of the referred) consumers making the average number of sessions provided to consumers 5. Figure 1 shows the number of referrals and sessions by month in urban projects and Figure 2 shows the number of referrals and sessions by month in rural projects. A comparison of Figure 1 and Figure 2 indicates that between April 2008 and May 2009 referrals and sessions in both urban and rural areas were low with rural areas receiving more referrals and conducting more sessions. Urban referrals peaked in March 2010 and rural referrals peaked in May 2010. Urban sessions peaked in June 2010 whereas rural sessions peaked in November 2010. The drop in both referrals and sessions in December 2010 for both urban and rural areas is likely to be a reflection of data entry lags.

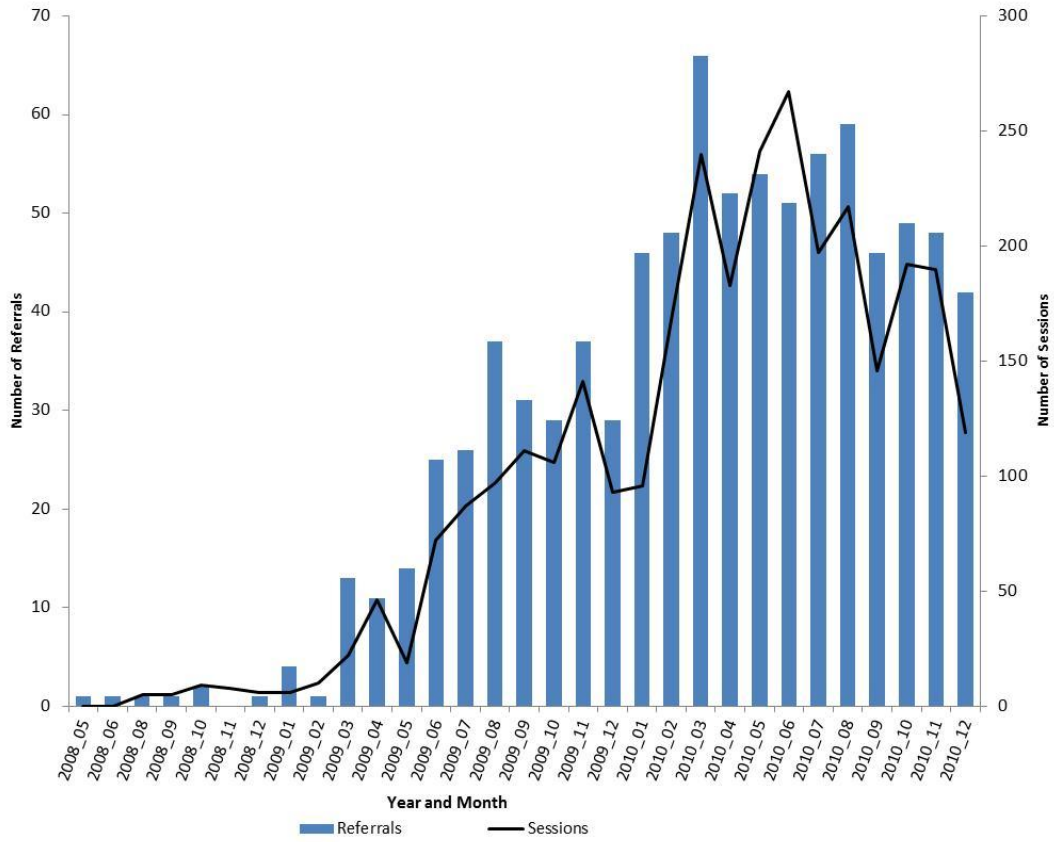


Figure 1: Urban referrals and sessions over time

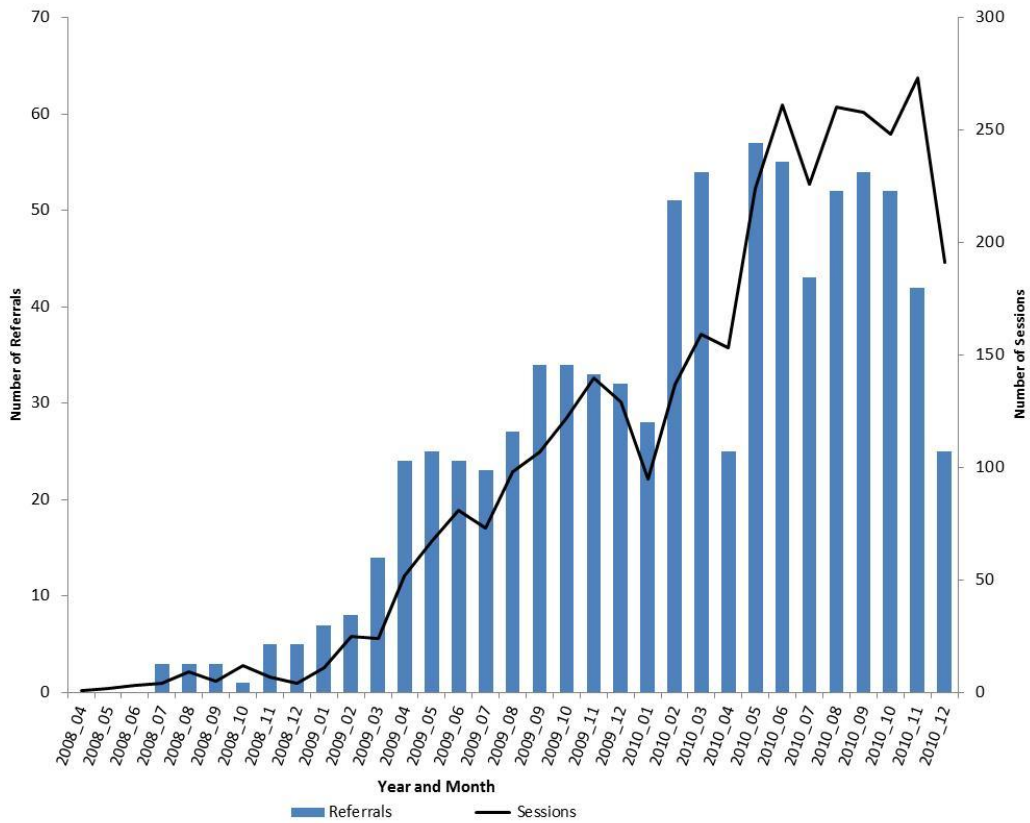


Figure 2: Rural referrals and sessions overtime

Evaluation Question 2: What is the profile of consumers and the care they are receiving?

Profile of consumers

Table 4 summarises some of the key characteristics of the consumers receiving care through the ATAPS component of the National Perinatal Depression Initiative between April 2008 and December 2010, displaying data at the national, rural, and urban levels.

Nationally almost all consumers are female, apart from a small percentage (2%) who are male. The mean age of consumers is approximately 30 years (31 and 29 years for urban and rural consumers, respectively). Nearly two thirds of the consumers are on low incomes as identified by their GPs; just over 40% of consumers have never accessed previous mental health care; in rural areas almost 5% of consumers are Aboriginal whereas in urban areas about 3% of consumers are Aboriginal. Eighty-eight percent of consumers have been diagnosed with a depressive disorder whilst around 38% have been diagnosed with an anxiety disorder. In the main, the profiles of rural and urban consumers were similar with the exception that anxiety disorders were slightly higher in urban consumers and rural consumers were somewhat less likely to have previously accessed mental health care.

Table 4: Summary characteristics of consumers receiving care through the National Perinatal Depression Initiative

		National		Urban		Rural	
		Freq	%	Freq	%	Freq	%
Gender	Male	32	2%	22	3%	10	1%
	Female	1607	98%	833	97%	774	99%
Aboriginal	Yes	60	4%	20	3%	40	5%
	No	1328	86%	663	87%	665	86%
	Unknown	148	10%	75	10%	73	9%
Torres Strait Islander	Yes	16	1%	8	1%	8	1%
	No	1349	89%	665	88%	684	89%
	Unknown	158	10%	83	11%	75	10%
Low income	Yes	1051	65%	522	65%	529	66%
	No	289	18%	162	20%	127	16%
	Unknown	265	17%	123	16%	142	18%
Diagnosis^a	Alcohol and drug use disorders	24	2%	12	2%	12	2%
	Psychotic disorders	11	1%	8	1%	3	0%
	Depression	1081	88%	491	89%	590	87%
	Anxiety	471	38%	227	41%	244	36%
	Unexplained somatic disorders	14	1%	7	1%	7	1%
	Unknown	12	1%	4	1%	8	1%
Previous history of mental health care	No previous history of mental health care	683	43%	326	41%	357	46%
	Previous history of mental health care	685	43%	379	48%	306	39%
	Unknown	208	13%	89	12%	119	15%

^aMultiple responses permitted

Profile of sessions

A total of 6591 (3130 urban; 3461 rural) sessions of care were delivered to 1347 (or 78% of the referred) consumers making the average number of sessions provided to consumers 5. The profile of these sessions is shown in Table 5 detailing national, rural, and urban data.

In summary the vast majority of sessions received by consumers were 46-60 minutes in duration. Almost all sessions conducted were face to face. The most common type of session delivered in both rural and urban areas were individual sessions. Urban Divisions delivered more group sessions (16%) compared with rural Divisions (2%). Approximately 79% of sessions conducted in rural and urban Divisions did not attract a co-payment. Nationally, CBT-based cognitive interventions were the most commonly used treatment modalities in sessions, occurring 42% of the time. The next most frequently delivered psychological therapies were CBT-based behavioural (31%) and psycho-education interventions (23%). This pattern of interventions is basically consistent in urban and rural Divisions, with CBT-based cognitive, CBT-based behavioural and psycho-educational interventions occurring slightly more frequently in urban sessions.

Table 5: Summary characteristics of sessions provided to consumers through the National Perinatal Depression Initiative

		National (N=6591) ^b		Urban (n=3130) ^b		Rural (n=3461) ^b	
		Freq	%	Freq	%	Freq	%
Duration	0-30 minutes	159	3%	92	1%	67	2%
	31-45 minutes	64	1%	29	1%	35	1%
	46-60 minutes	4554	74%	2214	76%	2340	73%
	Over 60 minutes	1397	23%	637	22%	760	24%
Modality	Face to face consultation	6423	99%	3040	98%	3383	99%
	Telephone consultation	85	1%	54	2%	31	1%
	Video conferencing	1	0%	1	0%	0	0%
Type	Group	560	8%	507	16%	53	2%
	Individual	5778	88%	2495	80%	3283	95%
	Unspecified	253	4%	128	4%	125	4%
Co-payment	Yes	882	21%	442	20%	440	22%
	No	3244	79%	1721	80%	1523	78%
Interventions^a	Diagnostic Assessment	846	13%	497	16%	349	13%
	Psycho-education	1530	23%	811	32%	719	26%
	CBT Behaviour	2040	31%	1037	41%	1003	37%
	CBT Cognitive	2770	42%	1399	55%	1371	50%
	CBT Relaxation	962	15%	495	19%	467	17%
	CBT Skills	1046	16%	670	26%	376	13%
	Narrative	4	0%	3	0%	1	0%
	Family Therapy	19	0%	3	0%	16	1%
Interpersonal Therapy	1283	20%	631	20%	667	19%	

^a Multiple responses permitted

^b Cells do not always sum to the total n due to some missing data.

Evaluation Question 3: What are the outcomes for consumers of the Perinatal Depression Initiative?

In order to assess consumer outcomes for the ATAPS component of the National Perinatal Depression initiative, Divisions were instructed to use the Edinburgh Postnatal Depression Scale (EPDS)² (see Table 1 for a description of the measures). The EPDS is designed to identify patients at risk for perinatal depression. However, an investigation of the available data highlighted that many projects were not using the EPDS and in fact were still utilising other outcome measures utilised for other ATAPS consumers. These outcome measures included the DASS³ 42 or 21 and the K10⁴ (see Table 1 for a description of the measures).

Investigation of all the available outcome data indicated that 199 (15%) of the 1347 consumers who attended sessions had pre- and post-treatment scores on at least one outcome measure, with Table 6 describing the number of outcome measures used to assess each consumer. Of the 199 consumers, 89 had been assessed with the EPDS, 92 with either the DASS 21 or DASS 42 item version, and 65 with the Kessler 10 (K10).

Table 6: Number of outcome measures available for consumers with pre- and post-treatment outcome data

Number of outcome measures	Number of consumers	Percent of consumers
1	99	50%
2	16	8%
3	48	24%
4	27	14%
5	17	9%
Total	199	100%

Treatment outcomes

We used paired t-tests to examine the difference between mean pre- and post-treatment scores. Table 7 indicates the mean pre-treatment, mean post-treatment, and mean difference scores for the EPDS, DASS (42 or 21 item version) subscales, and K10, a positive difference between pre- and post-treatment is indicative of symptom improvements on all of the scales.

Across all measures, the mean difference was statistically significant and indicative of clinical improvement suggesting that the National Perinatal Depression Initiative is achieving positive consumer outcomes. On the EPDS consumers shifted from likely to be experiencing depression to non-likely to be experiencing depression. The DASS scales indicated that consumers shifted from experiencing moderate levels of anxiety, stress and depression to normal levels of anxiety and stress and mild levels of depression. According to the K10 measure consumers shifted from having very high levels of psychological distress to having low levels of psychological distress.

Table 7: Pre and Post treatment outcome scores on outcome measures for consumers taking part in the Perinatal Depression Initiative.

Outcome Measures	n	Pre-treatment		Post-treatment		Difference		P-Value
		Mean	s.d.	Mean	s.d.	Mean	s.d.	
EPDS	89	17.0	5.4	8.1	6.7	8.9	8.0	.000 [*]
DASS- Anxiety ^a	91	11.0	8.9	5.4	6.7	5.6	8.2	.000 [*]
DASS - Depression ^a	92	17.0	10.2	8.0	7.8	8.9	10.4	.000 [*]
DASS Stress ^a	92	20.4	8.6	12.2	7.9	8.2	8.4	.000 [*]
K10	65	30.8	7.4	20.1	7.7	10.6	9.6	.000 [*]

* p <0.001

^aThe DASS subscales are completed as one measure and therefore these represent the same consumers on all three subscales

Discussion and conclusions

This current report profiles the ATAPS perinatal depression consumers in terms of their socio-demographic clinical and treatment characteristics and presents data on their mental health outcomes. Specifically, it set out to investigate three evaluation questions, the answers to each of which are summarised below.

Key findings

What is the uptake of the Perinatal Depression Initiative by GPs, allied health professionals, and consumers?

Since the introduction of the Perinatal Depression Initiative, 91 Divisions have entered data in the minimum-dataset. Nationally, for the period from April 2008 to December 2010, a total of 1450 professionals (1043 GPs; 407 allied health professionals) have participated in the initiative and 1729 referrals were made to allied health professionals representing a 103% increase in referrals since July 2010⁷.

A total of 6591 (3130 urban; 3461 rural) sessions of care were delivered to 1347 (or 78% of the referred) consumers making the average number of sessions provided to consumers 5. For both urban and rural areas the number of referrals and number of sessions delivered peaked in 2010.

What is the profile of consumers and the care they are receiving?

Nationally almost all consumers are female with a mean age of 30 years. Two thirds of consumers were on low incomes as identified by their GPs; just over 40% of consumers have never accessed previous mental health care; in rural areas almost 5% of consumers were Aboriginal whereas in urban areas about 3% of consumers are Aboriginal. Eighty-eight percent of consumers have been diagnosed with a depressive disorder whilst around 40% have been diagnosed with an anxiety disorder. In the main, the profiles of rural and urban consumers were similar with the exception that anxiety disorders were slightly higher in urban consumers and rural consumers were somewhat less likely to have previously accessed mental health care.

The vast majority of sessions received by consumers were 46-60 minutes in duration and almost all sessions conducted were face to face. The most common type of session delivered in both rural and urban areas were individual sessions. Urban Divisions delivered more group sessions (16%) compared with rural Divisions (2%). Approximately 79% of sessions conducted in rural and urban Divisions did not attract a co-payment. Nationally, CBT-based cognitive interventions were the most commonly used treatment modalities in sessions, occurring 42% of the time. The next most frequently delivered psychological therapies were CBT-based behavioural (31%) and psycho-education interventions (23%). This pattern of interventions is basically consistent in urban and rural Divisions, with CBT-based cognitive, CBT-based behavioural and psycho-educational interventions occurring slightly more frequently in urban sessions.

What are the outcomes for consumers of the Perinatal Depression Initiative?

Consumer outcomes as measured by the EDPS, DASS subscales and the K10 all indicated statistical and clinical levels of improvement in consumers from the start to the end of treatment.

Caveat

Some caution should be exercised in interpreting the above findings because there are often lags in data entry which are attributable to some Divisions not entering session data into the minimum dataset until treatment has been completed for a given consumer. This is likely to have the greatest impact on recent data.

Conclusion

This caveat aside, the current report indicates that more Divisions are taking part in the National Perinatal Depression Initiative. Uptake by GPs and allied health professionals has steadily increased since the commencement of the initiative. These providers have delivered increasing numbers of sessions to an increasing number of women experiencing severe levels of psychological distress. Consumers have responded well to the care that they have received making both statistically significant and clinically meaningful gains when assessed by standardised mental health outcome measures.

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Appendix 1: Edinburgh Postnatal Depression Scale (EPDS)

As you have recently had a baby, we would like to know how you are feeling. Please UNDERLINE the answer which comes closest to how you have felt IN THE PAST 7 DAYS, not just how you feel today

- | | |
|--|--|
| 1. I have been able to laugh and see the funny side of things.
As much as I always could
Not quite so much now
Definitely not so much now
Not at all | 2. I have looked forward with enjoyment to things.
As much as I ever did
Rather less than I used to
Definitely less than I used to
Hardly at all |
| 3. * I have blamed myself unnecessarily when things went wrong.
Yes, most of the time
Yes, some of the time
Not very often
No, never | 4. I have been anxious or worried for no good reason.
No, not at all
Hardly ever
Yes, sometimes
Yes, very often |
| 5. * I have felt scared or panicky for not very good reason.
Yes, quite a lot
Yes, sometimes
No, not much
No, not at all | 6. * Things have been getting on top of me.
Yes, most of the time I haven't been able to cope at all
Yes, sometimes I haven't been coping as well as usual
No, most of the time I have coped quite well
No, I have been coping as well as ever |
| 7. * I have been so unhappy that I have been crying.
Yes, most of the time
Yes, quite often
Only occasionally
No, never | 8. * I have felt sad or miserable.
Yes, most of the time
Yes, quite often
Not very often
No, not at all |
| 9. * I have been so unhappy that I have been crying.

Yes, most of the time
Yes, quite often
Only occasionally
No, never | 10. * The thought of harming myself has occurred to me.
Yes, quite often
Sometimes
Hardly ever
Never |

Appendix 2: Depression Anxiety Stress Scale (DASS 21)

Please read each statement and circle a number 0, 1, 2 or 3 which indicates how much the statement applied to you *over the past week*. There are no right or wrong answers. Do not spend too much time on any statement.

The rating scale is as follows:

- 0 Did not apply to me at all
- 1 Applied to me to some degree, or some of the time
- 2 Applied to me to a considerable degree, or a good part of time
- 3 Applied to me very much, or most of the time

1	I found it hard to wind down	0	1	2	3
2	I was aware of dryness of my mouth	0	1	2	3
3	I couldn't seem to experience any positive feeling at all	0	1	2	3
4	I experienced breathing difficulty (e.g., excessively rapid breathing, breathlessness in the absence of physical exertion)	0	1	2	3
5	I found it difficult to work up the initiative to do things	0	1	2	3
6	I tended to over-react to situations	0	1	2	3
7	I experienced trembling (e.g., in the hands)	0	1	2	3
8	I felt that I was using a lot of nervous energy	0	1	2	3
9	I was worried about situations in which I might panic and make a fool of myself	0	1	2	3
10	I felt that I had nothing to look forward to	0	1	2	3
11	I found myself getting agitated	0	1	2	3
12	I found it difficult to relax	0	1	2	3
13	I felt down-hearted and blue	0	1	2	3
14	I was intolerant of anything that kept me from getting on with what I was doing	0	1	2	3
15	I felt I was close to panic	0	1	2	3
16	I was unable to become enthusiastic about anything	0	1	2	3
17	I felt I wasn't worth much as a person	0	1	2	3
18	I felt that I was rather touchy	0	1	2	3
19	I was aware of the action of my heart in the absence of physical exertion (e.g., sense of heart rate increase, heart missing a beat)	0	1	2	3
20	I felt scared without any good reason	0	1	2	3
21	I felt that life was meaningless	0	1	2	3

Appendix 2: Depression Anxiety Stress Scale (DASS 42)

Please read each statement and circle a number 0, 1, 2 or 3 which indicates how much the statement applied to you *over the past week*. There are no right or wrong answers. Do not spend too much time on any statement.

The rating scale is as follows:

- 0 Did not apply to me at all
- 1 Applied to me to some degree, or some of the time
- 2 Applied to me to a considerable degree, or a good part of time
- 3 Applied to me very much, or most of the time

1	I found myself getting upset by quite trivial things	0	1	2	3
2	I was aware of dryness of my mouth	0	1	2	3
3	I couldn't seem to experience any positive feeling at all	0	1	2	3
4	I experienced breathing difficulty (eg, excessively rapid breathing, breathlessness in the absence of physical exertion)	0	1	2	3
5	I just couldn't seem to get going	0	1	2	3
6	I tended to over-react to situations	0	1	2	3
7	I had a feeling of shakiness (eg, legs going to give way)	0	1	2	3
8	I found it difficult to relax	0	1	2	3
9	I found myself in situations that made me so anxious I was most relieved when they ended	0	1	2	3
10	I felt that I had nothing to look forward to	0	1	2	3
11	I found myself getting upset rather easily	0	1	2	3
12	I felt that I was using a lot of nervous energy	0	1	2	3
13	I felt sad and depressed	0	1	2	3
14	I found myself getting impatient when I was delayed in any way (eg, lifts, traffic lights, being kept waiting)	0	1	2	3
15	I had a feeling of faintness	0	1	2	3
16	I felt that I had lost interest in just about everything	0	1	2	3
17	I felt I wasn't worth much as a person	0	1	2	3
18	I felt that I was rather touchy	0	1	2	3
19	I perspired noticeably (eg, hands sweaty) in the absence of high temperatures or physical exertion	0	1	2	3
20	I felt scared without any good reason	0	1	2	3
21	I felt that life wasn't worthwhile	0	1	2	3

Appendix 2: DASS 42 (continued)

Reminder of rating scale:

0 Did not apply to me at all

1 Applied to me to some degree, or some of the time

2 Applied to me to a considerable degree, or a good part of time

3 Applied to me very much, or most of the time

22	I found it hard to wind down	0	1	2	3
23	I had difficulty in swallowing	0	1	2	3
24	I couldn't seem to get any enjoyment out of the things I did	0	1	2	3
25	I was aware of the action of my heart in the absence of physical exertion (eg, sense of heart rate increase, heart missing a beat)	0	1	2	3
26	I felt down-hearted and blue	0	1	2	3
27	I found that I was very irritable	0	1	2	3
28	I felt I was close to panic	0	1	2	3
29	I found it hard to calm down after something upset me	0	1	2	3
30	I feared that I would be "thrown" by some trivial but unfamiliar task	0	1	2	3
31	I was unable to become enthusiastic about anything	0	1	2	3
32	I found it difficult to tolerate interruptions to what I was doing	0	1	2	3
33	I was in a state of nervous tension	0	1	2	3
34	I felt I was pretty worthless	0	1	2	3
35	I was intolerant of anything that kept me from getting on with what I was doing	0	1	2	3
36	I felt terrified	0	1	2	3
37	I could see nothing in the future to be hopeful about	0	1	2	3
38	I felt that life was meaningless	0	1	2	3
39	I found myself getting agitated	0	1	2	3
40	I was worried about situations in which I might panic and make a fool of myself	0	1	2	3
41	I experienced trembling (eg, in the hands)	0	1	2	3
42	I found it difficult to work up the initiative to do things	0	1	2	3

Appendix 3: The Kessler 10 (K-10)

For all questions, please fill in the appropriate response circle. Fill in the circles like this: ☐
Please do not tick or cross the circles.

In the past 4 weeks:	None of the time	A little of the time	Some of the time	Most of the time	All of the time
1. About how often did you feel tired out for no good reason?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
2. About how often did you feel nervous?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
3. About how often did you feel so nervous that nothing could calm you down?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
4. About how often did you feel hopeless?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
5. About how often did you feel restless or fidgety?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
6. About how often did you feel so restless you could not sit still?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
7. About how often did you feel depressed?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
8. About how often did you feel that everything is an effort?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
9. About how often did you feel so sad that nothing could cheer you up?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
10. About how often did you feel worthless?	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

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