FOR women, most psychiatric disorders will arise in the child bearing years with a 2–3-fold onset of new cases in the first few weeks postpartum. While earlier reports claimed that pregnancy was a time of relative mental wellbeing, it appears the prevalence of depression during pregnancy, as assessed using the Edinburgh Postnatal Depression Scale (EPDS) with a cut-off of >12, is of the order of 13% at 32 weeks gestation, with Gotlib et al reporting 10.3% depression at 24 weeks pregnancy using research diagnostic criteria. These rates are similar to those reported for postpartum depression.

In women with significant antenatal depression there are associated risks for the fetus by way of:
- maternal suicidal behaviour
- associated drug or alcohol abuse
- poor self care
- inadequate nutrition, and

BACKGROUND Psychological morbidity, and especially depression and anxiety arising antenatally, are as common as that seen postnatally. Approximately one-third of women will remain depressed postpartum, sometimes for prolonged periods - with the attendant morbidity for mother and infant that this brings. Morbidity is greatest where there is associated drug and alcohol use, domestic violence and personality disorder.

OBJECTIVE This article aims to provide an overview of psychosocial assessment and the detection and management of depression and anxiety disorders in pregnancy.

DISCUSSION Psychosocial assessment of all pregnant women is an integral part of good antenatal care. The Edinburgh Postnatal Depression Scale is a useful adjunct in the detection and monitoring of anxiety and depression antenatally. Many women will decline medication and thus psychological interventions will often be first line treatments. Where medication is required, prospective controlled studies suggest antidepressants are not associated with increased rates of teratogenicity and are thus relatively ‘safe’. Management of more severe and/or complex cases needs to be in association with a psychiatrist and a mental health or drug and alcohol team and may require antenatal notification of an ‘at risk’ offspring.

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• poor antenatal clinic attendance with a consequent lack of fetal monitoring.

There is an emerging literature suggesting that depression and anxiety in pregnancy may be associated with poorer neurological and behavioural outcomes in offspring. The negative impact of postpartum depression on the early mother-infant relationship and on the child’s social, emotional and behavioural development is well documented and as noted, a significant proportion of these women will have been depressed from pregnancy onward. Clearly it would be best for both mother and infant to treat depression and anxiety from pregnancy onward.

Antenatal psychosocial assessment: a preventive approach to maternal and infant mental health

In light of the above, it becomes clear that assessing maternal mental health is a key component of good antenatal care. The antenatal period provides general practitioners with a unique opportunity to assess and optimise the expectant mother’s mental health. This is especially important as maternal mental health will impact on the quality of parenting and attachment achieved in the developmentally crucial first year of the infant’s life. It is important to be aware that the dysfunc-

<table>
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<th>Study</th>
<th>Control variables</th>
<th>(N)</th>
<th>Adverse effects (obstetric and neonatal)</th>
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<tr>
<td></td>
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<td>Obstetric</td>
</tr>
<tr>
<td>Pregnancy outcomes</td>
<td>Age, obstetric history: all women</td>
<td>Total: 850</td>
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<tr>
<td>Pastuzak et al (1993)</td>
<td>EtOH, smoking</td>
<td>Tricyclic (74) Fluoxetine (128)</td>
<td>miscarriage rate</td>
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<tr>
<td>Chambers et al (1996)</td>
<td>Fluoxetine (228)</td>
<td>Prematurity NICU</td>
<td>Not significantly different</td>
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<tr>
<td>Kulin et al (1998)</td>
<td>EtOH</td>
<td>Sertaline (147) Paroxetine (97) Fluvoxamine (26)</td>
<td>Same weight and gestation</td>
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<tr>
<td>Einarson et al (2002)</td>
<td>EtOH, smoking</td>
<td>Venlafaxine (150) (mean 75 mg/day)</td>
<td>Same weight and gestation</td>
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Long term F/U

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<th>Study</th>
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<tr>
<td>Nulman et al (1997)</td>
<td>S/E, IQ, depression, EtOH, smoking</td>
<td>Tricyclic (80) Fluoxetine (55)</td>
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<td>Loebstein, Koren (1997)</td>
<td>EtOH, smoking</td>
<td>Fluoxetine (80)</td>
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NB: EtOH: alcohol, S/E: socioeconomic, increased, N/A: not applicable
Information for GPs

The Edinburgh Postnatal Depression Scale (EPDS) has been developed to assist primary care health professionals to detect mothers suffering from postnatal depression, a distressing disorder more prolonged than the ‘blues’ (which occur in the first week after delivery) but less severe than puerperal psychosis. Previous studies have shown that postnatal depression affects at least 10% of women and that many depressed mothers remain untreated. These mothers may cope with their baby and with household tasks, but their enjoyment of life is seriously affected and it is possible that there are long term effects on the family. The EPDS was developed at health centers in Livingston and Edinburgh. It consists of 10 short statements. The mother underlines which of the four possible responses is closest to how she has been feeling during the past week. Most mothers complete the scale without difficulty in less than five minutes. The validation study showed that mothers who scored above threshold 92.3% were likely to be suffering from a depressive illness of varying severity. Nevertheless the EPDS score should not over-ride clinical judgment. A careful clinical assessment should be carried out to confirm the diagnosis. The scale indicates how the mother has felt during the previous week and in doubtful cases it may be usefully repeated after two weeks. The scale will not detect mothers with anxiety neuroses, phobias or personality disorder.

Instructions for users
1. The mother is asked to underline the response which comes closest to how she has been feeling in the previous seven days.
2. All 10 items must be completed.
3. Care should be taken to avoid the possibility of the mother discussing her answers with others.
4. The mother should complete the scale herself, unless she has limited English or has difficulty with reading.
5. The EPDS may be used at 6-8 weeks to screen postnatal women. The child health clinic, postnatal check-up or a home visit may provide suitable opportunities for its completion.

Response categories are scored 0, 1, 2, and 3 according to increased severity of the symptoms. Items marked with an asterisk are reverse scored (i.e. 3, 2, 1, and 0). The total score is calculated by adding together the scores for each of the ten items.

Users may reproduce the scale without further permission providing they respect copyright by quoting the names of the authors, the title and the source of the paper in all reproduced copies.


Questionnaire for patients

Name: ___________________________

Address: ___________________________

Baby’s age: ___________________________

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 SEVEN 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 no 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 had difficulty sleeping*
   • Yes, most of the time
   • Yes, sometimes
   • Not very often
   • No, not at all

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

Figure 1. Edinburgh Postnatal Depression Scale
tional personality styles of some women may become accentuated at this time as unresolved emotions arising from a history of neglect and abuse become activated. Without appropriate support and intervention at this critical time, trans-generational patterns of abuse and neglect may continue to be repeated.

Risk factors
The key psychosocial risk factors that need to be assessed will therefore include:
- past history of depression and anxiety disorder or other psychiatric condition
- past history of abuse or poor parental care
- lack of current emotional or practical supports
- poor quality of relationship with, or absence of, a partner
- domestic violence (past or current)
- current major stressors or losses
- low self esteem
- drug and alcohol abuse, and
- dysfunctional personality or coping style.
The more risk factors the more one is likely to be dealing with a mother or family requiring added supports or more specific interventions, irrespective of the presence of current symptoms.

Psychosocial assessment tools
At the Royal Hospital for Women, Sydney, we use a brief self reporting psychosocial assessment tool, the Antenatal Risk Questionnaire (ANRQ) (Figure 2), in addition to the Edinburgh Patient Depression Scale (EPDS) and separate assessments of domestic violence and drug and alcohol use. Contrary to initial expectations, clinic attenders have found the questionnaires acceptable and did not find the specific abuse questions on the ANRQ distressing. They felt their care was enhanced as a result of the comprehensive approach taken by antenatal staff. This questionnaire has been used clinically and has not been validated as a screening tool.

In addition to the psychosocial assessment which gives an appreciation of the woman's pre-existing vulnerabilities and current supports and stressors, it is also important to screen for current symptoms.

The EPDS (Figure 1) – assessing depressive and anxiety symptoms in the preceding week – is a brief, validated, acceptable self reporting screening tool. Scores above 10 are indicative of significant distress with scores tending to rise as pregnancy progresses. Scores above 12/13 are suggestive of a diagnosis of depression.

Assessing for depression and anxiety disorder
More specific mental health evaluation should be undertaken if the woman scores above 12 on the EPDS or has a significant number of the risk factors outlined above. This will include questions about:
- current mood (depressed, irritable or anxious)
- loss of interest or motivation
- social withdrawal
- loss of self esteem
- depressive thoughts
- panic attacks or agoraphobia
- sense of hopelessness, and
- suicidal ideation or plans
- psychotic symptoms.
Sleep, energy and appetite are variable during pregnancy and therefore are less reliable correlates of depression or anxiety disorder at this time. It is also important to evaluate for socio-occupational impairment and to note the relevant risk factors that may be contributing to the episode.

While the predominant focus in the literature has been on depression, anxiety disorder at this time is also prevalent. It is therefore important to also consider either a primary or associated anxiety disorder (panic disorder +/- agoraphobia) which will need treatment in its own right.

Very high scores on the EPDS or a history of self harming behaviour, often in the context of volatile interpersonal relationships or domestic violence, and history of abuse or inadequate parenting, should alert the clinician to the possibility of comorbid personality dysfunction. These women will often not respond to first line management of depression or anxiety in the primary care setting. They will need referral for more intensive counselling and ongoing case management, as they are likely to have ongoing problems in attaching securely with their infant and in some cases may be unable to provide a safe environment for their offspring.

Management of antenatal psychological morbidity
Having assessed for psychosocial vulnerability, specifically sought a diagnosis of depression and anxiety disorder, and identified a woman with significant comorbidity it is important to formulate a
NAME: _________________________________   DATE ______/______/______    WEEKS PREGNANT: ____________

PHONE (h) __________________(w) ________________(m) ________________  DUE DATE: _______/_____________/______  

This is part of your Antenatal Booking Evaluation and will guide us as to what services we can offer you during your pregnancy. It is confidential information and will remain in your file.

PLEASE COMPLETE ALL ITEMS

Please circle numbers 1-5 or tick Yes/ No, as applicable

1. When you were growing up, did you feel your mother was emotionally supportive of you? (If you had no mother circle 6).

2. Before this pregnancy did you ever have a period of 2 weeks or more when you felt particularly miserable or depressed? If so, did this
   a) seriously interfere with your work and your relationships with friends and family?
   b) lead you to seek professional help?

3. Is your relationship with your partner an emotionally supportive one? (If you have no partner circle 6)

4. Have you had any major stresses, changes or losses in the last 12 months (eg. separation, moving house, domestic violence, unemployment, bereavement) ?
   a) If so please list these:
   b) Were you distressed by these stresses, changes or losses?

5. Would you generally consider yourself a worrier?

6. In general, do you become upset if you do not have order in your life (eg. regular time table, a tidy house)?

7. Do you feel you will have people you can depend on for emotional support when you go home with your baby?

8. Were you emotionally abused when you were growing up? 

9. Have you ever been sexually or physically abused?

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Figure 2. Antenatal risk questionnaire
6 • Reprinted from Australian Family Physician Vol. 32, No. 3, March 2003
management plan.

- Always try to meet with the partner to directly assess their attitude to the pregnancy, level of support and/or conflict within the relationship.
- If there are symptoms but no diagnosis of anxiety or depression, or there are significant risk factors (as listed above), it is important to continue regular monitoring throughout the pregnancy as symptoms may worsen and treatment may need to be instigated. Repeating the EPDS is an easy way of monitoring for symptom escalation.
- Where there are unresolved issues of anger or loss, often pertaining to childhood abuse and poor parental care, it is important to refer the woman for individual counselling. Often she will not be ready to accept this suggestion the first time and the clinician will need to persevere with this suggestion.
- For mild to moderate depression or anxiety disorder, or those with low self esteem, supportive counselling or more structured approaches of problem solving, basic cognitive restructuring, breathing exercises and stress management will be beneficial. For women suffering more severe panic attacks and agoraphobia or exhibiting more prominent negative cognitive style, cognitive behavioural therapy with a clinical psychologist is the treatment of choice although a number of GPs are now being trained in these methods.
- For moderate to severe depression or panic disorder, consider the use of an antidepressant, most of which are also useful for treating anxiety disorders. Consider referral to a psychiatrist if concerned about lack of response to medication, or where there is significant or persistent suicidal risk.
- For complex cases with comorbid substance abuse or personality disorder, refer to, or manage in conjunction with, the mental health and drug and alcohol team or a psychiatrist. Firm limit setting will be required and clear communication between health care providers is crucial. In substance abusing mothers monitoring of the baby for opiate withdrawal at delivery and the first few days postpartum is required.
- Notification of ‘at risk’ offspring: in some states such as NSW where the Child Protection Act has been recently updated, notification may be initiated in pregnancy. It is mandatory where there are concerns about domestic violence, substance abuse or history of neglect or abuse of previous children. Early notification in pregnancy gives child protection agencies time to meet with the mother and treating team to establish supports and ensure mental health care where required.

Safety of antidepressants in pregnancy

Given that antidepressants (and the SSRIs in particular) are widely prescribed for both depression and anxiety in the primary care setting, it is important to be familiar with their safety in pregnancy. Data is mainly available on fluoxetine with some data on other SSRIs and the tricyclics, and more recently venlafaxine. There have now been some 850 infants studied after exposure to antidepressants during pregnancy (usually consisting of at least first trimester exposure). Results from controlled but nonrandomised studies are reported in (Table 1). These studies found no increase in the rate of major congenital malformations above the usual risk in the general population. There was also no increase in neurobehavioural deficits or developmental delays compared to nonexposed offspring of depressed mothers in a small subset of offspring followed up to five years of age (Table 1). Impact on rates of prematurity remains equivocal with two studies reporting an increased rate while another two do not.

Guidelines for prescribing antidepressants in pregnancy

The issue of antidepressant use in pregnancy remains a matter of assessing the risk-benefit ratio for each individual case. Where the patient is currently medicated and well but there is a history of relapse on withdrawal of medications, or if the current depressive episode is severe, the direct benefits for mother (and indirectly for the infant) will usually outweigh the potential risks to the infant from medications. It is good practice to use the minimum effective dosage and halve the dose in the week before delivery to minimise any potential withdrawal in the infant. The infant should be observed for withdrawal symptoms in the first few days postpartum. The breastfed infant will need to be monitored for adverse reactions. Decisions about medications need to be discussed with both parents and all discussions should be clearly docu-
Psychosocial assessment and management of depression and anxiety in pregnancy

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MENTED IN THE PATIENT’S FILE.

CONCLUSION

GIVEN THE INCREASING POPULARITY OF ANTENATAL SHARED CARE, THE OPPORTUNITY FOR GPs OF REDUCING PSYCHOLOGICAL MORBIDITY, THROUGH UNIVERSAL PSYCHOSOCIAL ASSESSMENT AND EARLY DIAGNOSIS AND TREATMENT OF DEPRESSION AND ANXIETY DISORDERS, IS SIGNIFICANT. THE BENEFITS OF IMPLEMENTING GOOD MENTAL HEALTH CARE ANTENATALLY MAY HAVE LONG LASTING BENEFITS FOR THE MOTHER, INFANT AND FAMILY.

SUMMARY OF IMPORTANT POINTS

- Psychosocial assessment of all pregnant women to identify those who are symptomatic and/or ‘at risk’ of psychological morbidity should be an integral part of antenatal care.
- The Edinburgh Postnatal Depression Scale is a useful tool in the antenatal detection and monitoring of anxiety and depression.
- Psychosocial risks will also need to be assessed. One example of such a tool is the ANRQ.
- For patients requiring medication, the TCAs, SSRIs and venlafaxine are not associated with increased rates of teratogenicity.
- Management of more severe and/or complex cases needs to be in association with the mental health or drug and alcohol teams; notification of ‘at risk’ pregnancies and infants is not only mandatory but may also be a helpful strategy in planning ongoing support for mother and infant.

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CONFLICT OF INTEREST: NONE DECLARED.

REFERENCES


REPRINT REQUESTS

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