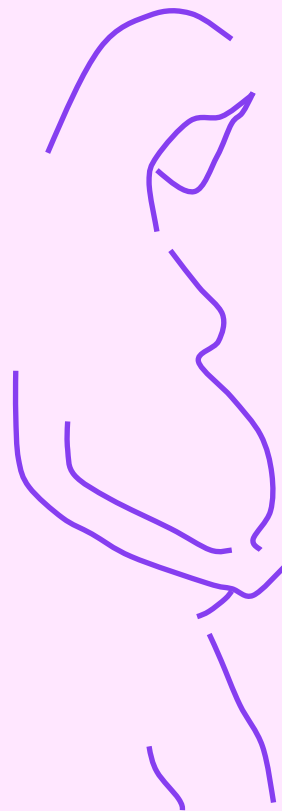


# Guidelines for Shared Maternity Care Affiliates



2010

The Shared Maternity Care Collaborative



# **GUIDELINES FOR SHARED MATERNITY CARE AFFILIATES 2010**

**Mercy Hospital for Women**

**The Royal Women's Hospital**

**Western Health**

**Northern Health**

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## **DISCLAIMER**

These guidelines have been developed for the provision of shared maternity care between Mercy Hospital for Women, The Royal Women's Hospital, Western Health and Northern Health (The Hospitals) and shared maternity care affiliates accredited at these Hospitals.

Irrespective of these Guidelines, every health service provider and health professional must individually exercise the standard of professional judgment and conduct expected of them in selecting the most appropriate care for a pregnant woman and in the management of her pregnancy.

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# CONTENTS

- INTRODUCTION ..... 6
- THE SHARED MATERNITY CARE MODEL..... 8
  - Definition..... 8
  - Responsibilities in Shared Maternity Care ..... 8
  - The Hand Held Pregnancy Record..... 9
  - The Shared Maternity Care Coordinator..... 10
  - Accreditation and Reaccreditation of Shared Maternity Care Affiliates..... 11
- THE PRE-PREGNANCY CONSULTATION ..... 13
  - Preventive Activities before Pregnancy ..... 13
  - Pre-pregnancy Consultation Checklist ..... 17
- ANTENATAL VISITS ..... 24
  - Confirmation of Pregnancy ..... 24
  - Shared Maternity Care at Our Hospitals ..... 26
    - Hospital location maps..... 27
  - How to Refer for Shared Maternity Care ..... 28
    - Satellite Clinics..... 28
    - Hospital Tours..... 28
  - Support Services..... 29
  - Schedule of Visits ..... 29
  - Shared Maternity Care Affiliate Discussion Points and Patient Information..... 37
- ANTENATAL INVESTIGATIONS ..... 49
  - Initial Routine Investigations..... 49
  - Initial Investigations to Consider..... 50
  - Second Trimester Investigations ..... 55
  - Third Trimester Investigations ..... 55
- TESTING IN PREGNANCY FOR FETAL ABNORMALITIES ..... 60
  - Screening versus Diagnostic Tests..... 60

Counselling .....	60
Down Syndrome and other Chromosomal Abnormalities .....	61
Fetal Morphology Ultrasound (18-20 weeks) .....	67
<b>MANAGEMENT AND REFERRAL OF ABNORMAL FINDINGS .....</b>	<b>71</b>
Referral of Problems .....	71
Abnormal Results: Test for Fetal Abnormalities .....	74
Other Abnormal Findings .....	77
<b>MENTAL HEALTH AND WELLBEING .....</b>	<b>81</b>
Alcohol and Drug Services .....	83
Intimate Partner Violence .....	83
<b>POSTNATAL CARE .....</b>	<b>86</b>
Immediate Postnatal Care .....	86
Community Postnatal Care.....	88
Mental Health and Wellbeing in the Postnatal Period.....	92
Breastfeeding .....	94
Gestational Diabetes .....	95
Hepatitis B Carriers.....	95
<b>APPENDIX 1: LEVELS OF EVIDENCE.....</b>	<b>102</b>

# INTRODUCTION

'Guidelines for Shared Maternity Care Affiliates 2010' have been prepared for Shared Maternity Care Affiliates who are accredited to provide Shared Maternity Care at The Royal Women's Hospital, Mercy Hospital for Women, Sunshine Hospital and Northern Health.

Shared Maternity Care is a model of care in which a woman is cared for by both hospital staff and a community based Shared Maternity Care Affiliates (a General Practitioner (GP), Obstetrician or community-based Midwife) throughout her pregnancy. The baby's birth and immediate postnatal care are managed by the hospital. Shared Maternity Care aims to provide a high quality community-based, holistic, safe and culturally appropriate model of care for women.

Shared Maternity Care is a significant and important model of maternity care at The Royal Women's Hospital, Mercy Hospital for Women, Sunshine Hospital and Northern Health. These hospitals are committed to supporting Shared Maternity Care and the involvement of Shared Maternity Care Affiliates in the ongoing development of this model of care.

These guidelines have been developed through a collaborative process between The Shared Maternity Care Collaborative (comprising of General Practice Liaison Units at The Royal Women's Hospital, Mercy Hospital for Women, Sunshine Hospital and Northern Health). While they build upon guidelines initially developed by The Royal Women's Hospital, Mercy Hospital for Women and Sunshine Hospital in 2002, they provide much more than an update of service information.

These guidelines are the result of extensive consultation and collaboration between the four hospitals, Shared Maternity Care Affiliates and specialist clinicians and services. Their goal is to support the provision of high quality Shared Maternity Care. They aim to:

- delineate roles, responsibilities and expectations of different providers
- clarify pathways of referral, care and support
- assist providers in the provision of evidence based care and initiatives to support quality maternity care
- provide useful and relevant information for both providers and women

These guidelines include new and expanded information including:

- investigations and tests
- screening and testing for fetal abnormalities
- Rh D immunoglobulin (anti-D) in pregnancy
- mental health
- postnatal care

Added components include:

- 'practice notes' designed to highlight important points throughout the guidelines
- direct links to useful clinical resources for Shared Maternity Care Affiliates and clinical practice guidelines at the end of each topic area
- direct links to a range of quality patient information

- greater clarity of pathways for referral
- easily identifiable contact details

In the development of these guidelines significant changes have been achieved that strengthen Shared Maternity Care at these hospitals, including:

- greater alignment of antenatal care schedules
- clarity about the use of investigations during pregnancy
- clearer delineation of responsibilities of both Shared Maternity Care Affiliates and hospitals
- mapping of referral pathways and access to specialist advice for Shared Maternity Care Affiliates
- the development of enhanced support for Shared Maternity Care Affiliates through access to hospital services

Extracts from the most recent 'Three Centres Consensus Guidelines on Antenatal Care' (1) have been incorporated into these guidelines. These extracts are printed in italics text, followed by "- 3 Centres". The Three Centres Consensus Guidelines provide a consensus statement on some aspects of clinical antenatal care for low-risk women based on the best available evidence. Levels of evidence for the Three Centres Consensus Guidelines can be found at the end of these Guidelines.

The following acronyms are used throughout this document:

GP	General Practitioner
MHW	Mercy Hospital for Women
NH	Northern Health
RWH	Royal Women's Hospital
SH	Sunshine Hospital. Please note. This document refers to Sunshine Hospital as maternity services are delivered at Western Health's Sunshine campus.
SMCA	Shared Maternity Care Affiliate

We hope these concise, up-to-date guidelines assist you in providing quality Shared Maternity Care to women who choose this popular and important model of maternity care.

It is anticipated that these guidelines will also provide a useful basis for Shared Maternity Care guideline development for other maternity services in Australia. In this case, please ensure appropriate acknowledgement is included.

The guidelines are accessible on each of the hospital websites: [www.thewomens.org.au](http://www.thewomens.org.au) , [www.mercy.com.au](http://www.mercy.com.au), [www.wh.org.au](http://www.wh.org.au) and [www.nh.org.au](http://www.nh.org.au).

1 3 Centres Consensus Guidelines on Antenatal Care, Mercy Hospital for Women, Southern Health and Royal Women's Hospital, 2006

# THE SHARED MATERNITY CARE MODEL

## Definition

In the four participating hospitals, Shared Maternity Care is a model of care in which the majority of antenatal visits take place in the community with a hospital affiliated GP, Obstetrician or Midwife (SMCA). Visits also take place at key times at the hospital (the main hospital site or hospital community satellite clinic). The woman attends the hospital for the baby's birth and immediate postnatal care.

Therefore the community based SMCA and hospital-based Doctors and Midwives act as a team in the provision of a woman's care.

*Wherever possible, women should be offered continuity of care, including continuity of carer (Level I evidence) – 3 Centres*

*GP and midwifery led models of care are safe for low-risk women (Level I, II & III evidence) – 3 Centres*

Shared Maternity Care is available to all low-risk women, including women who use the Family Birth Centre (available at MHW). Modified Shared Maternity Care may also be available to women who are not strictly low-risk. In these cases individual plans will be developed and documented in the hand held pregnancy record by the hospital Doctor.

## Responsibilities in Shared Maternity Care

For Shared Maternity Care to work well, a team approach is necessary between the community and hospital providers. Responsibility for a woman's care is shared, including responsibility for communication and the management of results and abnormal findings.

**The following obligations form the basis of responsibilities and communication between SMCA and hospital staff.**

**It is the responsibility of the hospital to:**

- notify the referring Doctor of the receipt of the referral
- notify both the woman and the referring Doctor of first hospital appointment details and location
- notify the referring Doctor if the woman does not attend her first hospital appointment
- notify SMCA that a woman has registered for Shared Maternity Care
- ensure the woman has a hand held pregnancy record
- ensure that a woman has information on her required schedule of visits and tests (for both hospital and SMCA). Please note that women are required to make their own appointments with SMCA
- notify SMCA if a woman's Shared Maternity Care is ceased
- notify SMCA of any discharges from hospital (including the birth of the baby)



**It is the responsibility of the SMCA to:**

- notify the Shared Maternity Care Coordinator if a woman does not attend her first SMCA visit
- contact the woman if she does not attend her first scheduled SMCA appointment
- notify the hospital's Shared Maternity Care Coordinator if a women has a poor attendance record for her antenatal visits

**It is the responsibility of both hospital staff and SMCA to:**

- record findings and management in the hand held pregnancy record
- follow-up on abnormal findings

It is the primary responsibility of the provider ordering a test or noting any abnormal finding to ensure appropriate follow-up, communication and management. However, all providers should check that follow-up of any abnormal investigation or finding has occurred.

The four hospitals have the following support and infrastructure to assist SMCA in the provision of Shared Maternity Care.

*'It is the primary responsibility of the provider ordering a test or noting any abnormal finding to ensure appropriate follow-up, communication and management. However, all providers should check that follow-up of any abnormal investigation or finding has occurred.'*

**The Hand Held Pregnancy Record**

Women enrolled in Shared Maternity Care require a hand held pregnancy record which is to be used at both SMCA and hospital visits. It is essential that all providers legibly complete this at every visit.

All providers must record routine examination findings in the hand held pregnancy record. This includes:

- blood pressure reading
- measurement of fundal height in centimetres
- fetal movements from 20 weeks
- fetal auscultation from 20 weeks
- checking fetal presentation from 30 weeks
- oedema if present
- consider urine testing for proteinuria

*'The hand held pregnancy record is the key means of communication between the hospital and SMCA. Women should be made aware of its importance and bring it to each visit.'*

All entries (including the ordering of tests) should be dated and signed. If a woman attends either a SMCA or hospital visit without her hand held pregnancy record, please ensure she leaves the visit with some written correspondence that she can attach to her pregnancy record.

The hand held pregnancy record is the key means of communication between the hospital and SMCA. Women should be made aware of its importance and bring it to each visit.

The Victoria Maternity Record (VMR) is the hand held pregnancy record used at the RWH, MHW and SH. NH uses its own hand held record. The VMR has a companion booklet for women, "A guide to tests and investigations for uncomplicated pregnancies."

## The Shared Maternity Care Coordinator

The Shared Maternity Care Coordinator is the key person for non-urgent contact for both SMCA and women.

The Shared Maternity Care Coordinator responds to issues that may arise for women and ensures that non-urgent queries from SMCA are dealt with in a timely manner. The Shared Maternity Care Coordinator role varies between health services and depending on the hospital, the Shared Maternity Care Coordinator may be able to assist with the following:

- organising extra appointments for additional clinical consultation with, for example, obstetric Doctors, allied health, psychiatry, genetics and physicians
- non-urgent reassessment of community ultrasound results and other pathology results by the relevant department
- changing a woman's contact details

*'The Shared Maternity Care Coordinator is the key person for non-urgent contact for both SMCA and women.'*

### Shared Maternity Care Coordinator Contact Details

RWH	MHW	SH	NH
Ph: 8345 2129	Ph: 8458 4120	Ph: 8345 1616 Mob: 0466 130 457	Ph: 8405 8772
Fax: 8345 2130	Fax: 8458 4205	Fax: 8345 1691	Fax: 8405 8766
Email: <a href="mailto:sharedcare@thewomens.org.au">sharedcare@thewomens.org.au</a>	Email: <a href="mailto:sharedcare@mercy.com.au">sharedcare@mercy.com.au</a>	Email: <a href="mailto:maternitysharedcare@wh.org.au">maternitysharedcare@wh.org.au</a>	Email: <a href="mailto:maternitysharedcare@nh.org.au">maternitysharedcare@nh.org.au</a>

## Family Birth Centre

Only MHW has a separate Family Birth Centre. Shared Maternity Care is available to women attending the Family Birth Centre. Referrals occur via the standard referral pathway for MHW.

## Suitability for Shared Maternity Care

At the four hospitals, Shared Maternity Care is an option for all healthy women with a normal pregnancy.

The criteria listed below generally make women unsuitable for Shared Maternity Care. However, some women with these conditions or history may still be appropriate for a modified form of Shared Maternity Care. In this situation, extra visits and investigations at either the community, hospital or both may be required and an individual care plan will be made by the hospital Doctor and documented in the hand held pregnancy record.

It is the hospital's responsibility to determine a woman's suitability for Shared Maternity Care. It is useful for GPs to discuss and promote Shared Maternity Care to women at time of referral and indicate a woman's preference on the referral.

## **Exclusion Guide for Shared Maternity Care:**

### **Medical and social history**

- Pre-pregnancy BMI >35 or <18.5
- Cardiac disease, including hypertension
- Renal disease
- Endocrine disorders or diabetes requiring insulin
- Some psychiatric disorders
- Haematological disorders, including thromboembolic disease
- Epilepsy requiring anticonvulsant drugs
- Malignant disease
- Severe asthma
- Chemical dependency
- HIV positive
- Auto-immune disorders
- Cone biopsy

*'It is the hospital's responsibility to determine a woman's suitability for Shared Maternity Care. It is useful for GPs to discuss and promote Shared Maternity Care to women at time of referral and indicate a woman's preference on the referral.'*

### **Previous obstetric history**

- Recurrent miscarriage or mid-trimester loss
- Severe pre-eclampsia
- Rhesus allo isoimmunisation or other significant blood group antibodies
- Antenatal haemorrhage on two occasions
- Growth restriction (IUGR). Birth weight <2500g
- Pre-term birth ( $\leq 32$  weeks)
- Cervical incompetence
- Stillbirth or neonatal death
- Some congenital abnormalities

### **Current pregnancy**

- Multiple pregnancy
- Some congenital abnormalities

Note that previous lower uterine segment caesarean section (LUSCS), assisted conception and previous gestational diabetes do not preclude shared care.

## **Accreditation and Reaccreditation of Shared Maternity Care Affiliates**

Any GP, Obstetrician or Midwife who is accredited at Mercy Hospital for Women, The Royal Women's Hospital, Sunshine Hospital and Northern Health as a SMCA can provide Shared Maternity Care to eligible women. The hospitals have joint common accreditation criteria and a single application process for GPs and Obstetricians who wish to become SMCA at any of the four hospitals. An application form can be obtained from the Shared Maternity Care Coordinator or downloaded at the hospital websites.

Every three years, as per the Royal Australian College of General Practice triennium, all affiliates will be invited to undertake reaccreditation in order to maintain their affiliation. Reaccreditation criteria differ from initial accreditation criteria.

## Resources

Hospital Shared Maternity Care Information	
Royal Women's Hospital <a href="http://www.thewomens.org.au/SharedMaternityCareAffiliates">http://www.thewomens.org.au/SharedMaternityCareAffiliates</a>	RWH Shared Maternity Care information for affiliates
Mercy Hospital for Women <a href="http://www.mercy.com.au/html/s02_article/article_view.asp?id=882&amp;nav_cat_id=207&amp;nav_top_id=84">http://www.mercy.com.au/html/s02_article/article_view.asp?id=882&amp;nav_cat_id=207&amp;nav_top_id=84</a>	MHW Shared Maternity Care information for affiliates
Western Health (Sunshine Hospital) <a href="http://www.wh.org.au/GP_Liaison/Shared_Care/Shared_Maternity_Care/index.aspx">http://www.wh.org.au/GP_Liaison/Shared_Care/Shared_Maternity_Care/index.aspx</a>	SH Shared Maternity Care information for affiliates
Northern Health <a href="http://www.nh.org.au/antenatal-shared-care/w1/i1001234/">http://www.nh.org.au/antenatal-shared-care/w1/i1001234/</a>	NH Shared Maternity Care information for affiliates
Victorian Maternity Record: <a href="http://www.health.vic.gov.au/maternitycare/downloads/vic_maternity_record_form.pdf">http://www.health.vic.gov.au/maternitycare/downloads/vic_maternity_record_form.pdf</a>	The hand held pregnancy record used at RWH, MHW and SH

# THE PRE-PREGNANCY CONSULTATION

Many of the most important maternity interventions resulting in improved health outcomes are best initiated prior to conception. These include immunisation, smoking cessation, folate supplementation and screening of prospective parents for inherited disorders such as cystic fibrosis, haemoglobinopathies and Fragile X syndrome (amongst others).

GPs are in the unique position of seeing a woman in the context of her life prior to pregnancy and therefore are able to provide opportunistic pre-pregnancy activities and screening.

The aim of the pre-pregnancy consultation is to:

- provide the optimum situation for conception and pregnancy to occur in order to optimise the health of mother and child
- identify and manage potential problems for the fetus and mother, based on personal and family history
- provide education about the health care system and choices available
- develop rapport with a woman and her family

## Preventive Activities before Pregnancy

The following is taken from “Guidelines for preventive activities in general practice. Chapter 1: Preventive activities before pregnancy, pp 1-3”.

Every woman aged 15–49 years should be considered for preconception care (C). Preconception care is a set of interventions that aim to identify and modify biomedical, behavioral and social risks to a woman’s health or pregnancy outcome through prevention and management.<sup>45</sup> This should include smoking cessation (A)<sup>46</sup> and advice to consider abstinence from alcohol (especially in the early stages of pregnancy),<sup>47</sup> folic acid supplementation (A),<sup>48</sup> review of immunisation status (C),<sup>49</sup> medications (B),<sup>50</sup> and chronic medical conditions, especially glucose control in patients with diabetes (B).<sup>51</sup>

There is evidence to show improved birth outcomes with preconception health care in women with diabetes, phenylketonuria and nutritional deficiency,<sup>52</sup> as well as benefit from the use of folate supplementation and a reduction in maternal anxiety.<sup>53</sup> The following table lists the potential interventions recommended by expert groups in preconception care (C).

### What does preconception care include?

#### Medical issues

#### Reproductive life plan

Assist your patient in developing a reproductive life plan that includes whether they want to have children and if so, discuss the number, spacing and timing of children.

#### Reproductive history

Have there been any problems with previous pregnancies such as infant death, fetal loss, birth defects, low birth weight, preterm birth, or gestational diabetes? Are there any ongoing risks that could lead to a recurrence in any

future pregnancy?

### **Medical history**

Are there any medical conditions that may affect future pregnancies? Are chronic conditions such as diabetes, thyroid disease, hypertension, epilepsy and thrombophilias well managed?

### **Medication use**

Review all current medications, including over-the-counter medications, vitamins and supplements.

### **Genetic/family history**

Assess risk of chromosomal/genetic disorders, based on family history/ethnic background (eg. neural tube defects [NTD], cystic fibrosis, fragile X syndrome, Tay-Sachs disease, thalassaemia, sickle cell anaemia, and phenylketonuria).

### **General physical assessment**

Pap test and breast examinations should be conducted before pregnancy if due or indicated respectively. Also assess body mass index (BMI), blood pressure (BP) and ask about periodontal disease.

### **Substance use**

Ask about tobacco, alcohol and illegal drug use.

### **Vaccinations**

Vaccinations can prevent some infections that may be contracted during pregnancy. If previous vaccination history or infection is uncertain, testing should be undertaken to determine immunity to varicella and rubella, so that vaccination can be provided to nonimmune women. Women receiving live viral vaccines such as measles/mumps/rubella (MMR) and varicella should be advised against falling pregnant within 28 days of vaccination.

- If indicated, MMR and varicella (in those without a clear history of chickenpox or nonimmune on testing) should be given at least 28 days before conception
- Influenza is recommended during pregnancy to protect against infection (if in second or third trimester during influenza season)
- Diphtheria/tetanus/pertussis (to protect the newborn from tetanus or pertussis) should be considered before conception

### **Lifestyle Issues**

#### **Family planning**

Based on the patient's reproductive life plan, discuss fertility awareness, chance of conception and risk of infertility and fetal abnormality. For women not planning to become pregnant, discuss effective contraception and emergency contraceptive options.

#### **Folic acid supplementation**

Women should take a 0.4–0.5 mg supplement of folic acid per day for at least 1 month before pregnancy and for the first 3 months after conception. In women at high risk (ie. those with a reproductive or family history of NTD, those who have had a previous pregnancy affected by NTD, those on antiepileptics, or those who have diabetes) the dose should be increased to 5 mg/day.

### Healthy weight, nutrition and exercise

Discuss weight management and caution against being over or underweight. Recommend regular moderate intensity exercise and assess risk of nutritional deficiencies (eg. vegan diet, lactose intolerant, calcium or iron, vitamin D deficiency due to lack of sun exposure).

### Psychosocial health

Provide support and identify coping strategies to improve your patient's emotional health and wellbeing.

### Smoking, alcohol and illegal drug cessation (as indicated)

Smoking and illegal drug use during pregnancy can have serious consequences for an unborn child and should be stopped before conception. There are no safe limits of alcohol consumption during pregnancy.

### Healthy environment

Repeated exposure to hazardous toxins in the household and workplace environment can impact on fertility and increase the risk of miscarriage and birth defects. Discuss the avoidance of TORCH infections:

- **toxoplasmosis** – avoid cat litter, garden soil, and raw/undercooked meat, unpasteurised milk products, wash all fruit and vegetables
- **cytomegalovirus, parvovirus B19 (fifth disease)** – discuss the importance of frequent hand washing (and the additional risk reduction by the use of gloves when changing nappies in child and health care workers)
- **listeriosis** – avoid paté, soft cheeses (eg. feta, brie, blue vein), pre-packaged salads, deli meats, and chilled/smoked seafood. Wash all fruit and vegetables before eating
- **fish** – limit the amount of fish containing high levels of mercury.

Intervention	Technique	References
Folate supplementation	<ul style="list-style-type: none"><li>• High risk women: 5 mg/day supplementation ideally beginning at least 1 month before conception and for first trimester</li><li>• Most women 0.5 mg/day supplementation ideally beginning at least 1 month before conception and for first trimester</li></ul>	48,54–56
Smoking cessation	Women should be informed that tobacco affects fetal growth and all women should be advised to stop smoking. Evidence exists to suggest improved cognitive ability in children of mothers who quit smoking during gestation (III A). Pharmacotherapy should be considered when a pregnant woman is otherwise unable to quit, and when the likelihood and benefits of cessation outweigh the risks of pharmacotherapy and potential continued smoking	57
Alcohol and illicit drug use	Women should be informed of the potential harmful effects of alcohol to the fetus and should be advised that there are no safe limits of alcohol consumption during pregnancy. Women should be informed that illicit drug use may harm the fetus and advised to avoid use	47

Inter pregnancy interval	Worse perinatal outcomes with inter pregnancy intervals <18 months or >59 months, namely pre-term birth, low birth weight and small for gestational age	58
Chronic diseases	Optimise control of existing chronic diseases (eg. diabetes, hypertension, epilepsy). Avoid teratogenic medications	56
Preconception care resources for GPs and patients	Address risk factors using Pregnancy Lifescripts. Available at <a href="http://www.health.gov.au/internet/quitnow/publishing.nsf/Content/lifescrpts">http://www.health.gov.au/internet/quitnow/publishing.nsf/Content/lifescrpts</a>	

Health inequality
Less than 50% of women in Victoria and New South Wales supplement their diet with folate periconceptually. This figure is lower in:59
<ul style="list-style-type: none"> <li>• women in lower socioeconomic groups</li> <li>• indigenous women</li> <li>• rural women</li> <li>• younger women</li> <li>• multiparous women</li> </ul>
Strategy
Refer to general principles as discussed in the introduction and as outlined in the 'green book'.

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## Pre-pregnancy Consultation Checklist

	Reproductive history
	Medical history
	Genetic/family history
	Psychosocial history
	General physical assessment
	Medicine use
	Substance use and cessation
	Vaccinations
	Folic acid supplementation
	Healthy weight/nutrition/exercise
	Health environment (toxoplasmosis, cytomegalovirus, parvovirus, listeria, fish)
	Dental health

## Resources

General		
Preparing for pregnancy	Royal Women's Hospital <a href="http://www.thewomens.org.au/PreparingforPregnancy">http://www.thewomens.org.au/PreparingforPregnancy</a>	Consumer fact sheets: Preparing for pregnancy. Includes: thinking it through, your career, the financial impact of having a baby, medical issues, drug facts, the environment
	Royal Australian And New Zealand College of Obstetricians and Gynaecologists (RANZCOG) <a href="http://www.ranzcog.edu.au/publications/statements/C-obs3.pdf">http://www.ranzcog.edu.au/publications/statements/C-obs3.pdf</a>	Clinician information: pre-pregnancy counselling & antenatal screening tests
Maternity services and models of care (Victoria)	Victoria Department of Health <a href="http://www.health.vic.gov.au/maternity/">http://www.health.vic.gov.au/maternity/</a>	Consumer information on maternity services and models of care in Victoria
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_birth_choices?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_birth_choices?open</a>	Consumer information on birth choices
Preventive health	The Royal Australian College of General Practitioners <a href="http://www.racgp.org.au/Content/NavigationMenu/ClinicalResources/RACGPGuidelines/TheRedBook/redbook_7th_edition_May_2009.pdf">http://www.racgp.org.au/Content/NavigationMenu/ClinicalResources/RACGPGuidelines/TheRedBook/redbook_7th_edition_May_2009.pdf</a>	Clinician information: RACGP Guidelines for Preventive Health in General Practice (The Red Book)
	Department of Health and Ageing <a href="http://www.health.gov.au/internet/quitnow/publishing.nsf/Content/lifescrpts">http://www.health.gov.au/internet/quitnow/publishing.nsf/Content/lifescrpts</a>	Clinician information: Pregnancy Lifescrpts (smoking, alcohol, nutrition)

<b>Medical history</b>		
Asthma	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Asthma_and_pregnancy?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Asthma_and_pregnancy?open</a>	Consumer fact sheet: Asthma and pregnancy
	National Asthma Council Australia <a href="http://www.nationalasthma.org.au/cms/images/stories/amh2006_web_5.pdf">http://www.nationalasthma.org.au/cms/images/stories/amh2006_web_5.pdf</a>	Clinical information: Asthma management handbook (p.101 Pregnancy and asthma)
	National Asthma Council Australia <a href="http://www.nationalasthma.org.au/content/view/291/655/">http://www.nationalasthma.org.au/content/view/291/655/</a>	Consumer information: Pregnancy and asthma
Diabetes	National Institute for Health and Clinical Excellence (UK) <a href="http://www.nice.org.uk/nicemedia/pdf/CG063Guidance.pdf">http://www.nice.org.uk/nicemedia/pdf/CG063Guidance.pdf</a>	Clinical guideline: Management of Diabetes and its complications from pre-conception to the postnatal period
	Australasian Diabetes in Pregnancy Society <a href="http://www.adips.org/images/stories/documents/adips_pregdm_guidelines.pdf">http://www.adips.org/images/stories/documents/adips_pregdm_guidelines.pdf</a>	Clinical guidelines: Management of patients with of Type 1 and Type 2 Diabetes in relation to pregnancy
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Gestational_diabetes?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Gestational_diabetes?open</a>	Consumer information: Gestational Diabetes
	Royal Women's Hospital <a href="http://www.thewomens.org.au/DiabetesMellitusManagementofPreexistingDiabetesMellitusinPregnancy">http://www.thewomens.org.au/DiabetesMellitusManagementofPreexistingDiabetesMellitusinPregnancy</a>	Clinical Practice Guideline: pre-existing Diabetes in pregnancy
Epilepsy	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Epilepsy_lifestyle_issues">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Epilepsy_lifestyle_issues</a>	Consumer information: Epilepsy lifestyle issues
	Epilepsy Foundation of Victoria <a href="http://www.epinet.org.au/articles/epilepsy_and_your_lifestage/pregnancy/">http://www.epinet.org.au/articles/epilepsy_and_your_lifestage/pregnancy/</a>	Consumer information on epilepsy in pregnancy. Includes: pre-pregnancy counselling, pregnancy and anti-epileptic drugs, anti-epileptic drugs and the developing baby, pregnancy and seizures, labour, motherhood and breastfeeding
	American Academy of Neurology <a href="http://www.neurology.org/cgi/content/full/73/2/142">http://www.neurology.org/cgi/content/full/73/2/142</a>	Clinician information: management issues for women with epilepsy. Focus on pregnancy: Vitamin K, folic acid, blood levels, and breastfeeding
Thyroid disease	The Endocrine Society (USA) <a href="http://www.endo-society.org/guidelines/Current-Clinical-Practice-Guidelines.cfm">http://www.endo-society.org/guidelines/Current-Clinical-Practice-Guidelines.cfm</a>	Clinical practice guideline: management of thyroid dysfunction during pregnancy and postpartum.
	The Australian Thyroid Foundation <a href="http://www.thyroidfoundation.com.au/information/information.html">http://www.thyroidfoundation.com.au/information/information.html</a>	Consumer information: thyroid conditions and iodine deficiency
<b>Genetics</b>		
General	Genetic Health Services Victoria <a href="http://www.genetichealthvic.net.au/sections/Patients/?docid=e5ac4a89-9f9c-4313-9bc0-9a9300b93ba8">http://www.genetichealthvic.net.au/sections/Patients/?docid=e5ac4a89-9f9c-4313-9bc0-9a9300b93ba8</a>	Consumer information: Planning a pregnancy
	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/your_health/egenetics/practitioners/gems.htm">http://www.nhmrc.gov.au/your_health/egenetics/practitioners/gems.htm</a>	Clinician information: Genetics in Family Medicine: The Australian Handbook for General Practitioners

	World Health Organisation (WHO) <a href="http://www.who.int/genomics/public/geneticdiseases/en/index2.html#ts">http://www.who.int/genomics/public/geneticdiseases/en/index2.html#ts</a>	WHO monogenic diseases information. Includes: <ul style="list-style-type: none"> <li>• Thalassaemia</li> <li>• Sickle cell anaemia</li> <li>• Haemophilia</li> <li>• Cystic Fibrosis</li> <li>• Tay Sachs disease</li> <li>• Fragile X syndrome</li> <li>• Huntington's disease</li> </ul>
	Genetic Health Services Victoria <a href="http://www.genetichealthvic.net.au">www.genetichealthvic.net.au</a>	Consumer and health professional information
Cystic Fibrosis	Genetic Health Services Victoria <a href="http://www.cfscreening.com.au/">http://www.cfscreening.com.au/</a>	Consumer and clinician information: Cystic fibrosis carrier screening program (population carrier screening)
	Genetic Health Services Victoria <a href="http://www.cfscreening.com.au/Documents/CF_brochure.pdf">http://www.cfscreening.com.au/Documents/CF_brochure.pdf</a>	Consumer brochure: Cystic Fibrosis carrier testing (population carrier screening)
	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/sections/09%20-%20Cystic%20fibrosis%20WEB.pdf">http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/sections/09%20-%20Cystic%20fibrosis%20WEB.pdf</a>	Clinician information. Genetics in Family Medicine: The Australian Handbook for General Practitioners. Cystic Fibrosis
	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/fact_sheets/09%20-%20Cystic%20fibrosis%20WEB.pdf">http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/fact_sheets/09%20-%20Cystic%20fibrosis%20WEB.pdf</a>	Consumer fact sheet from Genetics in Family Medicine: The Australian Handbook for General Practitioners. Cystic Fibrosis
Fragile X	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/sections/11%20-%20Fragile%20X%20syndrome%20WEB.pdf">http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/sections/11%20-%20Fragile%20X%20syndrome%20WEB.pdf</a>	Clinician information. Genetics in Family Medicine: The Australian Handbook for General Practitioners. Fragile X syndrome
	Fragile X Association of Australia <a href="http://www.fragilex.org.au/">http://www.fragilex.org.au/</a>	Consumer information: Fragile X
Tay Sachs disease	<a href="http://www.genetichealthvic.net.au/Documents/PDF/TaySachsBrochure.pdf">http://www.genetichealthvic.net.au/Documents/PDF/TaySachsBrochure.pdf</a>	Consumer and clinician information: Carrier Testing for Tay Sachs and related conditions. For people with Ashkenazi Jewish ancestry
<b>Medicine use</b>		
	Mercy Hospital for Women <a href="http://www.mercy.com.au/files/NRR6CEQQCO/Psychotropic%20drugs%20%20pregnancy%202nd%20Edn.pdf">http://www.mercy.com.au/files/NRR6CEQQCO/Psychotropic%20drugs%20%20pregnancy%202nd%20Edn.pdf</a>	Clinician information. Psychotropic Medication in Pregnancy/Lactation
	Royal Women's Hospital Pregnancy and Breastfeeding Medicines Guide Available from Pharmacy Department Ph: 9345 3190 E: <a href="mailto:rwh.pharmacy@thewomens.org.au">rwh.pharmacy@thewomens.org.au</a>	Clinician information: Pregnancy and Breastfeeding Medicines Guide
	Therapeutic Goods Administration <a href="http://www.tga.gov.au/docs/html/medpreg.htm">http://www.tga.gov.au/docs/html/medpreg.htm</a>	Clinician information: Prescribing Medicines in Pregnancy. An Australian categorisation of risk of drug use in pregnancy
	Royal Women's Hospital <a href="http://www.thewomens.org.au/Herbalpreparationsinpregnancy">http://www.thewomens.org.au/Herbalpreparationsinpregnancy</a>	Consumer fact sheet: Herbal preparations in pregnancy
<b>Vaccinations</b>		
General	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/</a>	Clinician information: vaccination of women planning pregnancy, pregnant or

	<a href="#">Handbook-specialrisk232</a>	breastfeeding women, and preterm infants
Measles, mumps and rubella	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-measles">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-measles</a>	Clinician information: Measles immunisation
	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-mumps">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-mumps</a>	Clinician information: Mumps immunisation
	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-rubella">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-rubella</a>	Clinician information: Rubella immunisation
Varicella	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-varicella">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-varicella</a>	Clinician information: Varicella immunisation
Influenza	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-influenza">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-influenza</a>	Clinician information: Influenza immunisation
	Australian & State and Territory Governments <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/MM123-cnt/\$File/imm123-fs-2010.pdf">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/MM123-cnt/\$File/imm123-fs-2010.pdf</a>	Clinician fact sheet: Influenza vaccination 2010
Diphtheria, tetanus, pertussis	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-diphtheria">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-diphtheria</a>	Clinician information: Diphtheria immunisation
	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-tetanus">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-tetanus</a>	Clinician information: Tetanus immunisation
	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-pertussis">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-pertussis</a>	Clinician information: Pertussis immunisation
<b>Folate</b>		
	Food Standards Australia New Zealand <a href="http://www.foodstandards.gov.au/srcfiles/Fact%20Sheet%20-%20Folic%20Acid%20(July%2009).pdf">http://www.foodstandards.gov.au/srcfiles/Fact%20Sheet%20-%20Folic%20Acid%20(July%2009).pdf</a>	Clinician and consumer fact sheet: Mandatory folic acid fortification in Australia
	Food Standards Australia New Zealand <a href="http://www.foodstandards.gov.au/consumerinformation/adviceforpregnantwomen/folicacidfolateandpr4598.cfm">http://www.foodstandards.gov.au/consumerinformation/adviceforpregnantwomen/folicacidfolateandpr4598.cfm</a>	Consumer information: Folic Acid/Folate
	Family Planning Victoria <a href="http://www.fpv.org.au/2_9_4.html">http://www.fpv.org.au/2_9_4.html</a>	Consumer information: Folic acid
	Royal Women's Hospital <a href="http://www.thewomens.org.au/FolateinPregnancy">http://www.thewomens.org.au/FolateinPregnancy</a>	Clinical Practice Guideline: Folate in Pregnancy
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Folate_for_women?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Folate_for_women?open</a>	Consumer fact sheet: Folate for Women
<b>Iodine</b>		
	Food Standards Australia New Zealand <a href="http://www.foodstandards.gov.au/srcfiles/Fact%20Sheet%20-%20Iodine%20(July%2009).pdf">http://www.foodstandards.gov.au/srcfiles/Fact%20Sheet%20-%20Iodine%20(July%2009).pdf</a>	Clinician and Consumer fact sheet: Mandatory iodine fortification

	Food Standards Australia New Zealand <a href="http://www.foodstandards.gov.au/consumerinformation/adviceforpregnantwomen/iodineandpregnancy.cfm">http://www.foodstandards.gov.au/consumerinformation/adviceforpregnantwomen/iodineandpregnancy.cfm</a>	Consumer information: Iodine advice for pregnant women
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Iodine_explained">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Iodine_explained</a>	Consumer fact sheet: Iodine explained
<b>Diet, nutrition and food safety</b>		
General	Department of Health & Ageing <a href="http://www.healthactive.gov.au/internet/healthactive/publishing.nsf/Content/pregnant-women">http://www.healthactive.gov.au/internet/healthactive/publishing.nsf/Content/pregnant-women</a>	Consumer information: Healthy eating guidelines for pregnant women. Includes: general dietary advice and information on iron, folate, iodine, morning sickness, indigestion, listeria, mercury and caffeine
	Royal Women's Hospital <a href="http://www.thewomens.org.au/Healthyeatingforpregnancy">http://www.thewomens.org.au/Healthyeatingforpregnancy</a>	Consumer fact sheet: Healthy eating for pregnancy
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_diet?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_diet?open</a>	Consumer fact sheet: Pregnancy and diet
	Royal Women's Hospital <a href="http://www.thewomens.org.au/Weightgaininpregnancy">http://www.thewomens.org.au/Weightgaininpregnancy</a>	Consumer fact sheet: Weight gain in pregnancy
Food safety	Royal Women's Hospital <a href="http://www.thewomens.org.au/Foodsafetyduringpregnancy">http://www.thewomens.org.au/Foodsafetyduringpregnancy</a>	Consumer fact sheet: Food safety in pregnancy
	Food Standards Australia & New Zealand <a href="http://www.foodstandards.gov.au/consumerinformation/adviceforpregnantwomen">http://www.foodstandards.gov.au/consumerinformation/adviceforpregnantwomen</a>	Consumer information: Food safety advice for pregnancy. Includes links to further information on folic acid, iodine, fish and mercury, listeria prevention, alcohol caffeine
	Food Standards Australia & New Zealand <a href="http://www.foodstandards.gov.au/_srcfiles/Listeria.pdf">http://www.foodstandards.gov.au/_srcfiles/Listeria.pdf</a>	Consumer brochure: Listeria and food- advice for people at risk
	Food Standards Australia & New Zealand <a href="http://www.foodstandards.gov.au/scienceandeducation/factsheets/factsheets2005/listeriacommonlyasked3115.cfm">http://www.foodstandards.gov.au/scienceandeducation/factsheets/factsheets2005/listeriacommonlyasked3115.cfm</a>	Clinician and consumer information: Listeria and food- commonly asked questions
	Food Standards Australia & New Zealand <a href="http://www.foodstandards.gov.au/_srcfiles/mercury_in_fish_brochure_lowres.pdf">http://www.foodstandards.gov.au/_srcfiles/mercury_in_fish_brochure_lowres.pdf</a>	Consumer brochure: Mercury in fish
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Mercury_in_fish?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Mercury_in_fish?open</a>	Consumer fact sheet: Mercury in fish
Vegetarian and vegan diets	Royal Women's Hospital <a href="http://www.thewomens.org.au/Vegetarianeatingandpregnancy">http://www.thewomens.org.au/Vegetarianeatingandpregnancy</a>	Consumer fact sheet: Vegetarian eating and pregnancy
	Queensland Health <a href="http://www.health.qld.gov.au/nutrition/resources/antenatal_veget.pdf">http://www.health.qld.gov.au/nutrition/resources/antenatal_veget.pdf</a>	Consumer information: Healthy eating for vegetarian pregnant and breastfeeding mothers
	Queensland Health <a href="http://www.health.qld.gov.au/nutrition/resources/antenatal_vegan.pdf">http://www.health.qld.gov.au/nutrition/resources/antenatal_vegan.pdf</a>	Consumer information: Healthy eating for vegan pregnant and breastfeeding mothers
Vitamins and minerals	Royal Women's Hospital <a href="http://www.thewomens.org.au/Ironpregnancy">http://www.thewomens.org.au/Ironpregnancy</a>	Consumer fact sheet: Iron in pregnancy
	Royal Women's Hospital	Consumer fact sheet: Vitamin D and

	<a href="http://www.thewomens.org.au/VitaminDandpregnancy">http://www.thewomens.org.au/VitaminDandpregnancy</a>	pregnancy
	Victorian Department of Health <a href="http://www.health.vic.gov.au/chiefhealthofficer/publications/low_vitamin_d_med.htm">http://www.health.vic.gov.au/chiefhealthofficer/publications/low_vitamin_d_med.htm</a>	Clinician information: Low Vitamin D in Pregnancy- Key Messages for Doctors, Nurses and Allied Health
	Royal Women's Hospital <a href="http://www.thewomens.org.au/VitaminDantenatalScreening">http://www.thewomens.org.au/VitaminDantenatalScreening</a>	Clinical practice Guideline: vitamin D antenatal screening
	Royal Australian and New Zealand College of Obstetricians and Gynaecologists <a href="http://www.ranzcog.edu.au/publications/statements/C-obs25.pdf">http://www.ranzcog.edu.au/publications/statements/C-obs25.pdf</a>	Clinician information: Vitamin and mineral Supplementation in pregnancy
	Royal Women's Hospital <a href="http://www.thewomens.org.au/VitaminB12inPregnancy">http://www.thewomens.org.au/VitaminB12inPregnancy</a>	Clinical Practice Guideline: Vitamin B12 in pregnancy
<b>Exercise</b>		
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_exercise?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_exercise?open</a>	Consumer fact sheet: Pregnancy and exercise
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_sport?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_sport?open</a>	Consumer fact sheet: Pregnancy and sport
<b>Infections</b>		
Toxoplasmosis	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Toxoplasmosis_reducing_the_risks?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Toxoplasmosis_reducing_the_risks?open</a>	Consumer fact sheet: Toxoplasmosis-reducing the risk
Parvovirus	Australian Department of Health and Ageing <a href="http://www.health.gov.au/internet/main/publishing.nsf/Content/cda-pubs-cdi-2000-cdi2403s-cdi24msa.htm">http://www.health.gov.au/internet/main/publishing.nsf/Content/cda-pubs-cdi-2000-cdi2403s-cdi24msa.htm</a>	Clinician information: Parvovirus B19 infection and its significance in pregnancy
	Victorian Department of Health and Ageing <a href="http://www.health.vic.gov.au/ideas/bluebook/erythema">http://www.health.vic.gov.au/ideas/bluebook/erythema</a>	Clinician information: Guidelines for the control of infectious diseases -Parvovirus
	Victorian Department of Health and Ageing <a href="http://www.health.vic.gov.au/ideas/bluebook/erythema/erythema_pregnant_info">http://www.health.vic.gov.au/ideas/bluebook/erythema/erythema_pregnant_info</a>	Consumer information: Slapped cheek infection information for pregnant women
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Slapped_face_disease?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Slapped_face_disease?open</a>	Consumer fact sheet: Slapped cheek infection
Cytomegalovirus	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Cytomegalovirus_(cmv)">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Cytomegalovirus_(cmv)</a>	Consumer fact sheet: Cytomegalovirus
	Victorian Department of Health <a href="http://www.health.vic.gov.au/ideas/bluebook/cmv">http://www.health.vic.gov.au/ideas/bluebook/cmv</a>	Clinician information: Cytomegalovirus
Influenza	Royal Women's Hospital <a href="http://www.thewomens.org.au/Pregnancyandflu">http://www.thewomens.org.au/Pregnancyandflu</a>	Consumer fact sheet: Pregnancy and Flu-precautions
<b>Substance use and cessation</b>		
General	Department of Health and Ageing <a href="http://www.health.gov.au/internet/quitnow/publishing.nsf/Content/lifescrpts">http://www.health.gov.au/internet/quitnow/publishing.nsf/Content/lifescrpts</a>	Clinician information: Pregnancy Lifescrpts: smoking, alcohol, nutrition
Smoking	QUIT <a href="http://www.quit.org.au/article.asp?ContentID=pregnancy">http://www.quit.org.au/article.asp?ContentID=pregnancy</a>	Consumer information: Smoking and pregnancy

	<p>QUIT  <a href="http://www.quit.org.au/article.asp?ContentID=media_bkground_pregnancy">http://www.quit.org.au/article.asp?ContentID=media_bkground_pregnancy</a></p>	Consumer information: Common myths about smoking and pregnancy
	<p>QUIT  <a href="http://www.quit.org.au/browse.asp?ContainerID=pregnancy_nicotine_replacement">http://www.quit.org.au/browse.asp?ContainerID=pregnancy_nicotine_replacement</a></p>	Consumer information: pregnancy, quitting smoking and nicotine replacement therapy
	<p>Better Health Channel  <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_smoking?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_smoking?open</a></p>	Consumer information: Pregnancy and smoking
	<p>Royal Women's Hospital  <a href="http://www.thewomens.org.au/Tobacco">http://www.thewomens.org.au/Tobacco</a></p>	Consumer fact sheet: Tobacco in pregnancy
Alcohol	<p>National Health and Medical Research Council  <a href="http://www.nhmrc.gov.au/publications/synopses/ds10syn.htm">http://www.nhmrc.gov.au/publications/synopses/ds10syn.htm</a></p>	Clinician information: Australian Guidelines to Reduce Health Risks from Drinking Alcohol (p. 67 Guideline 4: Pregnancy and Breastfeeding)
	<p>Drug info clearinghouse  <a href="http://www.druginfo.adf.org.au/druginfo/fact_sheets/aod_pregnancy/aod_pregnancy.html">http://www.druginfo.adf.org.au/druginfo/fact_sheets/aod_pregnancy/aod_pregnancy.html</a></p>	Consumer information: Alcohol, other drugs and pregnancy for women who are pregnant/considering pregnancy
	<p>Better Health Channel  <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Foetal_alcohol_syndrome?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Foetal_alcohol_syndrome?open</a></p>	Consumer fact sheet: fetal alcohol syndrome
	<p>Royal Women's Hospital  <a href="http://www.thewomens.org.au/Alcohol">http://www.thewomens.org.au/Alcohol</a></p>	Consumer fact sheet: Effects on pregnancy, breastfeeding and infant development
Drug Use	<p>New South Wales Department of Health  <a href="http://www.health.nsw.gov.au/pubs/2006/pdf/ncg_druguse.pdf">http://www.health.nsw.gov.au/pubs/2006/pdf/ncg_druguse.pdf</a></p>	Clinician information: National clinical guidelines for the management of drug use during pregnancy, birth and the early development years of the newborn
	<p>Royal Women's Hospital  <a href="http://www.thewomens.org.au/AlcoholDrugsDuringPregnancy">http://www.thewomens.org.au/AlcoholDrugsDuringPregnancy</a></p>	Consumer fact sheets: Alcohol and drugs during pregnancy. Includes alcohol, amphetamines, benzodiazepines, buprenorphine, cannabis, heroin and other opiates, inhalants, methadone, tobacco
	<p>Drug info clearinghouse  <a href="http://www.druginfo.adf.org.au/druginfo/fact_sheets/aod_pregnancy/aod_pregnancy.html">http://www.druginfo.adf.org.au/druginfo/fact_sheets/aod_pregnancy/aod_pregnancy.html</a></p>	Consumer information. Alcohol, other drugs and pregnancy: for women who are pregnant/considering pregnancy
	<p>Drug info clearinghouse  <a href="http://www.druginfo.adf.org.au/druginfo/fact_sheets/cannabis_factsheets/cannabis_pregnancy.html">http://www.druginfo.adf.org.au/druginfo/fact_sheets/cannabis_factsheets/cannabis_pregnancy.html</a></p>	Consumer information: Cannabis use in pregnancy
	<p>Better Health Channel  <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_drugs?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_drugs?open</a></p>	Consumer fact sheet: Pregnancy and drugs. Includes over the counter and vitamins
<b>Dental Health</b>		
	<p>Better Health Channel  <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Teeth_and_pregnancy?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Teeth_and_pregnancy?open</a></p>	Consumer fact sheet: Teeth and pregnancy

## ANTENATAL VISITS

The following information is a synopsis of the minimum routine antenatal visits for Shared Maternity Care. It includes brief descriptions of issues to consider at these visits. While there is considerable alignment between the four hospitals, the antenatal schedule does vary.

For further information on antenatal investigations, please see the [Initial Routine Investigations and TESTING IN PREGNANCY FOR FETAL ABNORMALITIES](#) sections of these Guidelines.

### Confirmation of Pregnancy

Women may present to their GP at any stage to confirm they are pregnant. It is best if this is done early in the pregnancy in order to facilitate preventative health interventions and offer appropriate counselling for prenatal screening.

In addition to the aims of a pre-pregnancy consultation, the aims of the early pregnancy consultation are to:

- confirm pregnancy
- refer to hospital
- refer for counselling of inheritable conditions where appropriate

The table below lists some of the issues that should be considered in an early pregnancy consultation.

### Confirmation of Pregnancy/GP Visit

When	Who	Aim	Clinical	Investigations
Usually at 4-10 weeks	GP	<ul style="list-style-type: none"> <li>• Confirm pregnancy</li> <li>• Ensure the women is in optimal health for pregnancy</li> <li>• Identify and manage potential problems for the fetus and mother based on personal and family history</li> <li>• Provide education about the health care system choices available</li> <li>• Develop rapport with the woman and her family</li> </ul>	<p><b>General history and examination including:</b></p> <ul style="list-style-type: none"> <li>• LNMP/EDC</li> <li>• Age</li> <li>• History: <ul style="list-style-type: none"> <li>- reproductive and obstetric</li> <li>- medical</li> <li>- nutritional</li> <li>- mental health</li> <li>- smoking</li> <li>- drug and alcohol</li> <li>- social and occupational</li> </ul> </li> <li>• Use of medicines</li> <li>• Family history of inheritable conditions</li> </ul>	<p>It is appreciated if initial investigations are ordered by the GP and copies of results are sent with the women to the first hospital visit</p> <p>Please note. The ordering provider is responsible for the follow-up of abnormal results</p> <p>For more information on initial investigations see the <a href="#">Initial Routine Investigations</a> section of these Guidelines</p> <p><b>Initial investigations recommended:</b></p> <ul style="list-style-type: none"> <li>• Blood group</li> <li>• Antibody screen</li> <li>• FBE (including MCV/MCH)</li> <li>• Hepatitis B screening for carrier status</li> <li>• Syphilis serology</li> <li>• Rubella antibodies</li> <li>• HIV serology</li> </ul>



			<p><b>Appropriate follow-up of identified problems including:</b></p> <ul style="list-style-type: none"> <li>• Referral for counselling of inheritable conditions</li> <li>• In pre-existing conditions, review medication and management. Consider early referral for specialist physician review.</li> </ul>	<ul style="list-style-type: none"> <li>• Urinalysis/MSU M&amp;C</li> </ul> <p><b>Consider:</b></p> <ul style="list-style-type: none"> <li>• Dating ultrasound</li> <li>• Ferritin (routine at RWH and SH)</li> <li>• Haemoglobin electrophoresis (routine at SH)/DNA analysis for Alpha Thalassaemia</li> <li>• Hepatitis C serology (routine at MHW, NH and SH)</li> <li>• Varicella antibodies</li> <li>• Chlamydia (urine or cervical swab)</li> <li>• Vitamin D level (routine at NH and SH)</li> <li>• Thyroid stimulating hormone (TSH)</li> <li>• Glucose tolerance test (GTT)</li> <li>• Pap test if due</li> </ul> <p><b>Discuss testing for fetal abnormalities:</b></p> <ul style="list-style-type: none"> <li>• Combined First Trimester Screening (this is not generally available via the hospitals)</li> </ul> <p>OR</p> <ul style="list-style-type: none"> <li>• Second Trimester Maternal Serum Screening</li> </ul> <ul style="list-style-type: none"> <li>• Fetal morphology ultrasound</li> </ul> <p><b>Consider tests for fetal abnormalities/genetic carrier status:</b></p> <ul style="list-style-type: none"> <li>• CVS/amniocentesis</li> <li>• Cystic Fibrosis testing</li> <li>• Fragile X testing</li> <li>• Others as relevant</li> </ul> <p>For more information on prenatal screening and testing, see the <u>TESTING IN PREGNANCY FOR FETAL ABNORMALITIES</u> section of these Guidelines</p>
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“Maternal alcohol consumption can harm the developing fetus or breastfeeding baby. For women who are pregnant or planning a pregnancy, not drinking is the safest option. For women who are breastfeeding, not drinking is the safest option.” - NHMRC (2009) ‘Australian Guidelines to Reduce Health Risks from Drinking Alcohol’.

Ask about family history of inheritable conditions on both sides of the family. Genetic Services are a resource for secondary advice, counselling and testing.

*‘Maternal alcohol consumption can harm the developing fetus or breastfeeding baby. For women who are pregnant or planning a pregnancy, not drinking is the safest option. For women who are breastfeeding, not drinking is the safest option.’*

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## **Shared Maternity Care at Our Hospitals**

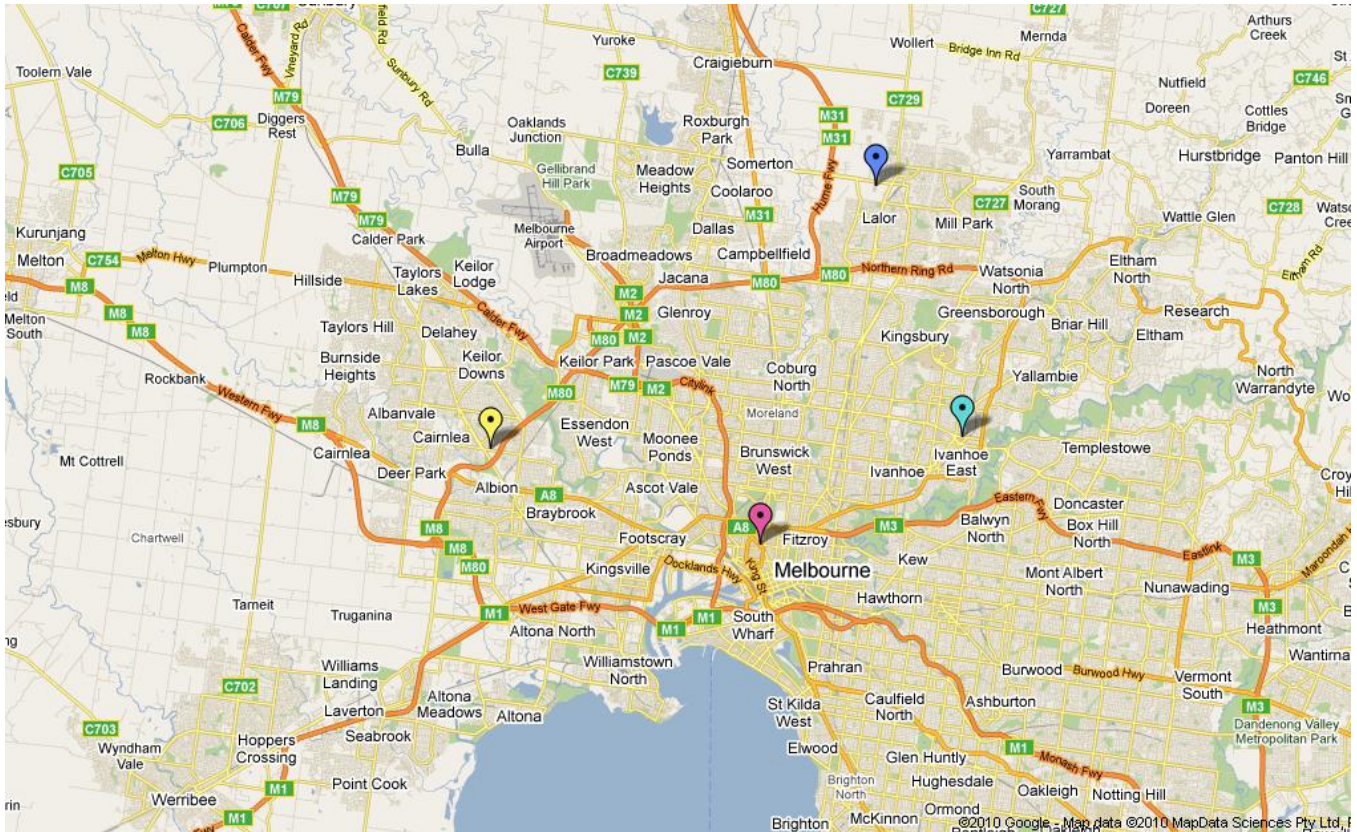
A summary of the models of maternity care and maternity care hospitals available in Victoria can be found on the “Having a Baby in Victoria”, Department of Health website: <http://www.health.vic.gov.au/maternity/>



The majority of pregnancies and births do not require tertiary care and can be managed at a woman’s nearest maternity hospital. To ensure all women can access the level of maternity care they require, women experiencing low-risk pregnancies should attend their nearest maternity hospital for their pregnancy care.

If a GP or SMCA thinks a woman needs to go to either of the tertiary centres (MHW or RWH), and they are not the woman’s nearest maternity hospital, her needs must be specified on the referral to MHW or RWH. In this instance, if MHW or RWH believe the woman is best served at her local hospital they will contact the referring Doctor so they can arrange another referral to that hospital.

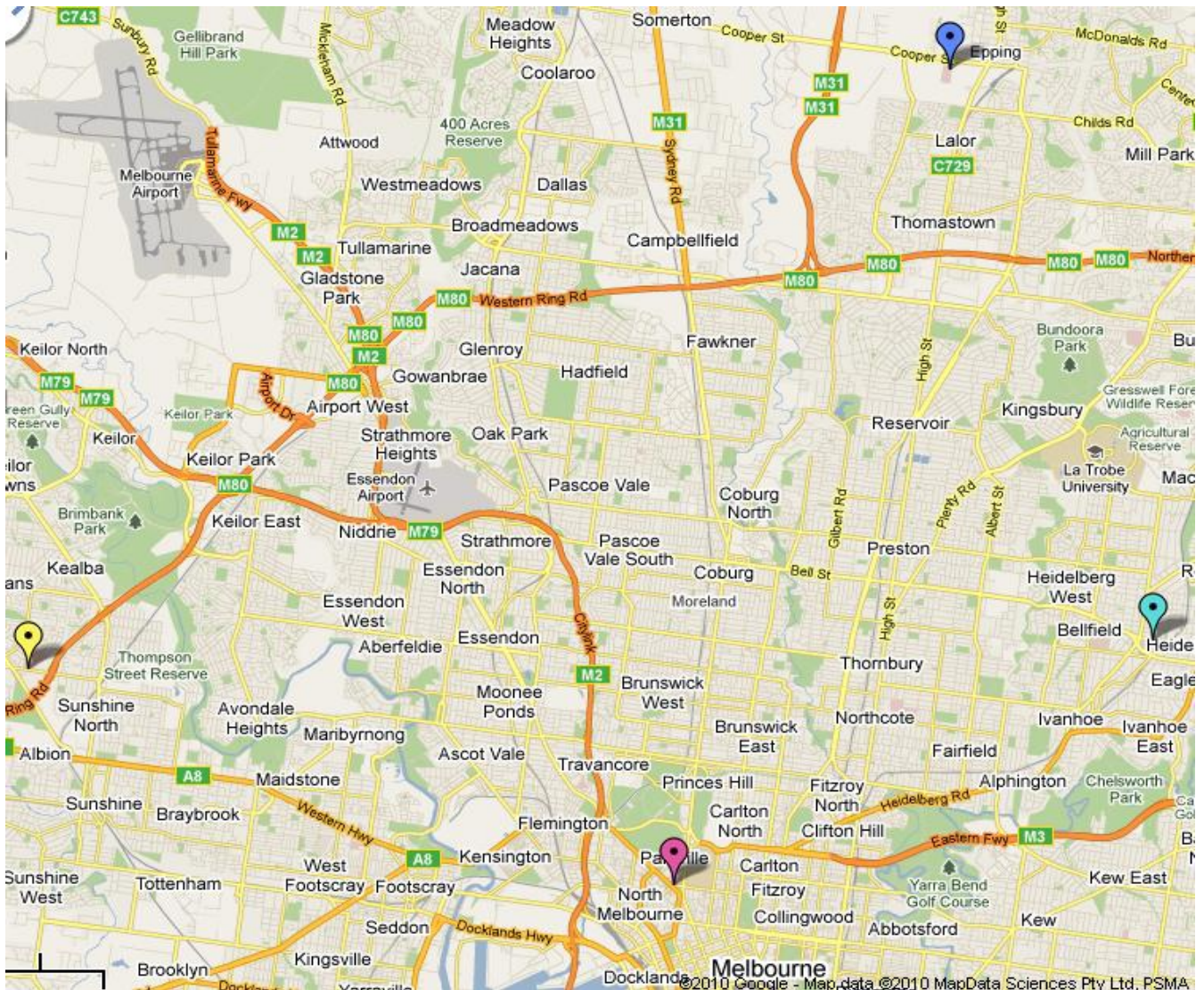
If at any time a woman’s pregnancy becomes complicated, or is considered to be high-risk, she can be referred by her local maternity hospital to MHW or RWH.

# Hospital location maps



-  [The Royal Women's Hospital](#)
-  [Mercy Hospital for Women](#)

-  [Sunshine Hospital](#)
-  [The Northern Hospital](#)



It is not necessary for women to have chosen a model of maternity care prior to their first hospital visit, although it is helpful if they have discussed their options, including Shared Maternity Care, with their GP.

It is important that both hospital and community providers are supportive of the Shared Maternity Care model; that they are respectful and professional in their approach to a woman’s decision to undertake shared care, and that they do not attempt to divert her into another model of care unless this is medically indicated.

## How to Refer for Shared Maternity Care

To refer women for maternity care at the hospitals, GPs or SMCA need to send a referral and relevant investigations as soon as practicable. Please provide as much relevant information as possible so women can be appropriately triaged. Doctors can refer women by using any referral letter or template. The ‘Victorian Statewide Referral Form (VSRF) + Maternity’ is designed to provide high quality information to facilitate referral and triage. As well as standard demographic and clinical information, the VSRF+ Maternity form includes medical and obstetric risk factors and pregnancy investigations/clinical checklist. In addition, some of the hospitals also have their own templates that SMCA are welcome to use or modify.

<b>Hospital Maternity Referral Details</b>			
<b>RWH</b>	<b>MHW</b>	<b>SH</b>	<b>NH</b>
Fax: 8345 3036	Fax: 8458 4205	Fax: 8345 1691	Fax: 8405 8761
Ph: 8345 2058	Ph: 8458 4100	Ph: 8345 1727	Ph: 8405 8335
<b>Both the woman and the referring GP will receive notification of the appointment details and location</b>			

## Satellite Clinics

All four hospitals have community satellite clinics in addition to the main hospital campus. If a woman prefers to attend one of these sites, GPs are advised to request this on the referral. Women are also able request this subsequently.

<b>RWH</b>	<b>MHW</b>	<b>SH</b>		<b>NH</b>
Fawkner	Ivanhoe	Footscray	Hoppers Crossing	Broadmeadows
Moonee Ponds	Preston	St Albans	Braybrook	Craigieburn
Kensington		Deer Park	Watergardens	
		Kingsville	Seabrook	

## Hospital Tours

Women and their families are welcome to arrange a tour at the hospital they have been booked to give birth at. Tours can be arranged via the hospital’s Childbirth/Parent Education Department (RWH and MHW), at the midwife antenatal preadmission appointment (SH), or via the maternity ward at (NH).

## Support Services

In addition to social work services, the hospitals provide additional support services for:

- young mothers
- women with alcohol and drug issues
- Aboriginal and Torres Straight Islander women
- women who have been circumcised
- women with intellectual disabilities and learning difficulties
- women with physical disabilities

Please indicate on the referral if additional support is required. The Shared Maternity Care Coordinator may also be able to arrange access to these services for women.

## Schedule of Visits

The tables below provide an overview of antenatal visits for Shared Maternity Care and are generally consistent with the “Three Centres Consensus Guidelines” and Victorian Maternity Record (VMR). This is the minimum routine schedule of visits for low-risk women. The schedule should be tailored to a woman’s individual needs.

*For low-risk women, irrespective of model of care, the traditional schedule of 14 visits may be safely reduced to between seven and ten visits without adversely affecting perinatal outcomes (Level I evidence) - 3 Centres*

*The number and timing of visits should be flexible to suit the needs of individual women. Additional visits should be provided if women or their midwife or doctor perceive a need, or as complications arise. (Level II evidence) - 3 Centres*

*It is important to establish each person’s expectations and understanding, as women may have a different perspective on the purpose and timing of antenatal visits. (Consensus opinion) - 3 Centres*

*The option and timing of additional visits, and a mechanism by which such visits may be accessed, should be discussed with all women. (Consensus opinion) - 3 Centres*

### Routine Antenatal Visits for Shared Maternity Care: Summary

This reflects minimum visits. Additional visits should be arranged as appropriate.

For more detail on antenatal visits, see the remainder of this section

Location	Timing (approximately)	Who sees	Notes
<b>1<sup>st</sup> Hospital Visit</b>	10-16 weeks	Midwife and Doctor (at <b>SH</b> women might only see a midwife)	<ul style="list-style-type: none"> <li>Antenatal check</li> <li>Investigations</li> <li>Doctor and Midwife components may be on different days</li> </ul>
<b>SMCA</b>	16 weeks		<ul style="list-style-type: none"> <li>Antenatal check</li> <li>Second Trimester Maternal Serum Screening discussed and organised or result checked</li> <li>Fetal morphology ultrasound appointment confirmed</li> </ul>
<b>SMCA</b>	22 weeks <b>NH</b> does not routinely have this 22 week visit <b>NH</b> has a 20 week hospital visit and a 24 week SMCA visit		<ul style="list-style-type: none"> <li>Fetal morphology ultrasound result checked</li> </ul>
<b>Hospital</b> For <b>SH</b> , this is a SMCA visit. If anti-D is required, women access this via <b>SH</b> Pregnancy Day Stay Unit	28 weeks	Midwife (+ Doctor review if required)	<ul style="list-style-type: none"> <li>Antenatal check</li> <li>Investigations (Gestational Diabetes test/FBE/antibodies)</li> <li>Anti-D (if required)</li> </ul>
<b>SMCA</b>	32 weeks <b>NH</b> has an additional 30 week SMCA visit		<ul style="list-style-type: none"> <li>Antenatal check</li> </ul>
<b>SMCA</b> This is replaced by a hospital visit for women requiring anti-D	34 weeks		<ul style="list-style-type: none"> <li>Anti-D (if required)</li> </ul>
<b>Hospital</b> This is a SMCA visit for women who attended the hospital at 34 weeks for anti-D	36 weeks	Doctor (At <b>SH</b> only midwife if shared care unless previous caesarean section)	<ul style="list-style-type: none"> <li>Antenatal check</li> <li>GBS swab</li> <li>For women with past history of caesarean section: discussion with the hospital Doctor and decision regarding vaginal birth after caesarean (VBAC) or elective caesarean is finalised at this visit</li> </ul>
<b>SMCA</b>	38 weeks <b>NH</b> has an additional 37 week SMCA visit		<ul style="list-style-type: none"> <li>Antenatal check</li> </ul>
<b>SMCA</b>	39 weeks Not routine at <b>RWH</b>		<ul style="list-style-type: none"> <li>Antenatal check</li> </ul>
<b>SMCA (RWH, SH)</b> <b>Hospital (MHW, NH)</b>	40 weeks	Doctor at <b>NH</b> and <b>MHW</b> SMCA at <b>RWH</b> and <b>SH</b>	<ul style="list-style-type: none"> <li>Antenatal check</li> </ul>
<b>Hospital</b>	41 weeks	Doctor	<ul style="list-style-type: none"> <li>Antenatal check</li> <li>Investigations</li> </ul>

For further information on antenatal investigations, please see the [Initial Routine Investigations](#) and [TESTING IN PREGNANCY FOR FETAL ABNORMALITIES](#) sections of these Guidelines.

Women also have a Midwife Antenatal Pre-admission (MAP) appointment during their pregnancy. This includes discussion about admission and discharge, labour and birth (including when to come to hospital and what to bring), breastfeeding and accessing community support services.

### First Hospital Antenatal Visit (Booking-in Visit and Antenatal Check)

All women have a detailed health and social assessment performed at the 'booking-in visit' by a Midwife. This provides the opportunity to explore many aspects of maternity care and for women to discuss models of care. At this visit the woman is officially booked for birth at the hospital. The woman then sees a Doctor for a detailed clinical assessment (except at SH where women with low-risk pregnancies are usually seen by a Midwife). As part of this process, a decision is made by the hospital as to whether Shared Maternity Care is appropriate.

Usually, the first antenatal visit and booking-in visit occur on the same day and take up to three hours.

Women who enrol in Shared Maternity Care are provided with written information by the hospital on Shared Maternity Care and their schedule of visits. The woman needs to make her own appointments with the SMCA. The SMCA is informed of the woman's enrolment into shared care by letter within 72 hours. If the woman does not attend the first SMCA visit, please notify the Shared Maternity Care Coordinator.

First trimester visits are primarily to assess maternal and fetal wellbeing; in particular to assess, the risk of complication, to date the pregnancy, take a comprehensive history, discuss smoking behaviour and establish care options. The visits are scheduled in order to offer screening tests.

*'First trimester visits are primarily to assess maternal and fetal wellbeing; in particular to assess, the risk of complication, to date the pregnancy, take a comprehensive history, discuss smoking behaviour and establish care options. The visits are scheduled in order to offer screening tests.'*

### First Hospital Visit

Timing	Who	Clinical	Investigations	Issues for Discussion (in addition to maternal concerns)
<b>All hospitals</b> <b>10-16 weeks</b>	<b>Midwife and Doctor</b> (at <i>SH</i> only Midwife if shared care)  These visits may or may not be concurrent	<b>Midwife and Obstetric Consultation</b> <ul style="list-style-type: none"> <li>Comprehensive medical, obstetric and social history</li> <li>Physical examination</li> <li>Appropriate referrals as required</li> <li>Decide on agreed</li> </ul>	It is preferable that initial investigations are ordered by the GP with copies of results sent with the woman to the first hospital visit. If investigations have not been done, they will be arranged at the first hospital visit.  For more information on initial investigations see the <a href="#">Initial Routine Investigations</a> section of these	<ul style="list-style-type: none"> <li>Ensure woman has hand held pregnancy record</li> <li>Models of care</li> <li>Schedule of visits</li> <li>Changes in pregnancy</li> <li>Smoking cessation</li> <li>Alcohol/other drugs</li> <li>Medicines (prescriptions, over the counter</li> </ul>

		<p>estimated date of confinement and document this in hand held pregnancy record</p> <ul style="list-style-type: none"> <li>Organise investigations that have not been done by GP</li> <li>Discuss/arrange prenatal tests that have not been done by GP</li> <li>Consider referral for prenatal diagnosis/counselling</li> <li>Arrange fetal morphology ultrasound if not organised by GP</li> <li>If Rhesus negative and no antibodies, discuss Rhesus (D) immunoglobulin (anti-D)</li> </ul>	<p>Guidelines</p> <p><b>Initial investigations recommended</b></p> <ul style="list-style-type: none"> <li>Blood group</li> <li>Antibody screen</li> <li>FBE (including MCV/MCH)</li> <li>Hepatitis B screening for carrier status</li> <li>Syphilis serology</li> <li>Rubella antibodies</li> <li>HIV serology</li> <li>Urinalysis/MSU M&amp;C</li> </ul> <p><b>Consider</b></p> <ul style="list-style-type: none"> <li>Dating ultrasound</li> <li>Ferritin (routine at RWH and SH)</li> <li>Haemoglobin electrophoresis (routine at SH)/DNA analysis for Alpha Thalassaemia</li> <li>Hepatitis C serology (routine at MHW, NH and SH)</li> <li>Varicella antibodies</li> <li>Chlamydia (urine or cervical swab)</li> <li>Vitamin D level (routine at NH and SH)</li> <li>Thyroid stimulating hormone (TSH)</li> <li>Glucose tolerance test (GTT). (Glucose challenge test (GCT) routine at NH)</li> <li>Pap test if due</li> </ul> <p><b>Discuss testing for fetal abnormalities</b></p> <ul style="list-style-type: none"> <li>Combined First Trimester Screening (this is not generally available via the hospitals)</li> </ul> <p>OR</p> <ul style="list-style-type: none"> <li>Second Trimester Maternal Serum Screening</li> <li>Fetal morphology ultrasound</li> </ul>	<p>medicines and vitamins)</p> <ul style="list-style-type: none"> <li>Diet and nutrition</li> <li>Listeria infection prevention</li> <li>Toxoplasmosis prevention</li> <li>Hospital and community supports (how and when to seek help)</li> <li>Childbirth education classes (booking in)</li> <li>Breastfeeding</li> <li>If Rhesus negative: indications for the use of Rh D immunoglobulin (anti-D)</li> <li>If previous caesarean section, options for birth</li> </ul>
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			<p><b>Consider tests for fetal abnormalities/genetic carrier status</b></p> <ul style="list-style-type: none"> <li>• CVS/amniocentesis</li> <li>• Cystic Fibrosis testing</li> <li>• Fragile X testing</li> <li>• Others as relevant</li> </ul> <p>For more information on prenatal screening and testing, see the <u>TESTING IN PREGNANCY FOR FETAL ABNORMALITIES</u> section of these Guidelines</p>	
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The Hospital should confirm agreed estimated date of confinement at 1<sup>st</sup> Hospital visit and document this on the hand held pregnancy record.

### The Standard Antenatal Examination

A standard antenatal examination referred to throughout the schedule includes:

- general wellbeing
- blood pressure check
- measurement of fundal height in centimetres
- fetal movements from 20 weeks
- fetal auscultation from 20 weeks
- checking fetal presentation from 30 weeks
- inspection of legs for oedema (a sign of preeclampsia and thromboembolic disease) and looking for other signs of thromboembolic disease
- consider urine testing

This should be documented in the hand held pregnancy record.

Second trimester visits are primarily scheduled to monitor fetal growth, maternal wellbeing and signs of pre-eclampsia.

*‘The Hospital should confirm agreed estimated date of confinement at the 1<sup>st</sup> Hospital visit and document this on the hand held pregnancy record.’*

*‘Second trimester visits are primarily scheduled to monitor fetal growth, maternal wellbeing and signs of pre-eclampsia.’*

### SMCA visit approximately 16 weeks

RWH	<ul style="list-style-type: none"> <li>• Standard antenatal examination</li> <li>• Review of pregnancy record entries</li> <li>• Ensure testing for Down Syndrome has been discussed/organised</li> <li>• Ensure fetal morphology ultrasound has been discussed/organised</li> </ul>
MHW	
SH	
NH	

### SMCA visit approximately 22 weeks

RWH	<ul style="list-style-type: none"> <li>• Standard antenatal examination</li> <li>• Review and document investigation results including fetal morphology ultrasound</li> </ul>
MHW	
SH	
NH	
NH has additional 20 week hospital visit and a 24 week SMCA visit	

Third trimester visits are primarily to monitor fetal growth, maternal wellbeing, signs of pre-eclampsia, and to assess and prepare women for admission, labour and going home. These visits include bacteriological screening for Group B Streptococcus.

*'Third trimester visits are primarily to monitor fetal growth, maternal wellbeing, signs of pre-eclampsia, and to assess and prepare women for admission, labour and going home. These visits include bacteriological screening for Group B Streptococcus.'*

### Hospital visit approximately 28 weeks

For women at **SH** this is a **SMCA** visit and the **SMCA** performs the antenatal examination and organises the investigations.

	Who	Clinical	Investigations	Issues for Discussion (in addition to maternal concerns)
RWH	<b>Midwife</b>	<ul style="list-style-type: none"> <li>• Standard antenatal examination</li> </ul>	<ul style="list-style-type: none"> <li>• GCT or GTT if high-risk (MHW does GTT for all women).</li> </ul>	<p>The following issues are discussed at the Midwife Antenatal Pre-admission (MAP) visit at all hospitals. At NH the MAP component is at 30 weeks.</p> <ul style="list-style-type: none"> <li>• Admission and discharge</li> <li>• Childbirth education</li> <li>• Previous birth experience</li> <li>• Labour and birth including:               <ul style="list-style-type: none"> <li>- signs of labour</li> <li>- when to come to hospital</li> <li>- where to go</li> <li>- birth plan</li> <li>- pain relief</li> <li>- monitoring</li> </ul> </li> </ul>
MWH	Medical review may be requested at any of the hospitals by SMCA if indicated, by contacting the Shared Maternity Care Coordinator or GP hotline (MHW)	<ul style="list-style-type: none"> <li>• Order investigations</li> <li>• Review of pregnancy record entries</li> </ul>	<ul style="list-style-type: none"> <li>• FBE</li> <li>• Antibody screen</li> <li>• Discuss and organise anti-D prophylaxis as indicated for Rhesus negative women</li> </ul>	
NH		<ul style="list-style-type: none"> <li>• Midwife Antenatal Pre-Admission (MAP) appointment (except SH where it is done at first</li> </ul>		

		hospital visit)		<ul style="list-style-type: none"> <li>- episiotomy</li> <li>- labour support</li> <li>- what to bring to hospital</li> <li>• Infant feeding (breastfeeding supported)</li> <li>• Community support services (including establishing a support network)</li> <li>• Neonatal screening test (Guthrie Test) <ul style="list-style-type: none"> <li>- PKU</li> <li>- Congenital hypothyroidism</li> <li>- Cystic Fibrosis</li> <li>- selected metabolic disorders</li> </ul> </li> <li>• Hearing screen</li> <li>• Vitamin K</li> <li>• Hepatitis B immunisation</li> <li>• Child safety/car restraints</li> <li>• Contraception</li> </ul>
<b>SH</b>	For women undertaking Shared Maternity Care at <b>SH this is a SMCA visit</b> and the <b>SMCA</b> performs the antenatal check and organises the investigations. If anti-D is required, this is given via Pregnancy Day Stay Unit at SH. This appointment is either arranged by SH or the woman can call the Pregnancy Day Stay Unit for an appointment.			

All hospitals arrange routine 28 and 34 week anti-D for women who are Rhesus negative with no antibodies. SMCA should send women who also require anti-D due to a sensitising event to the hospital's emergency department.

*'All hospitals arrange routine 28 and 34 week anti-D for women who are Rhesus negative with no antibodies. SMCA should send women who also require anti-D due to a sensitising event to the hospital's emergency department.'*

### SMCA visit approximately 32 weeks

RWH	<ul style="list-style-type: none"> <li>• Standard antenatal examination</li> <li>• Review and document investigation results</li> </ul>
MHW	
SH	
NH	
NH has an additional 30 week routine SMCA visit	

### SMCA visit approximately 34 weeks

This is a **hospital** visit for women requiring prophylactic anti-D and replaces the 36 week hospital visit

RWH	<ul style="list-style-type: none"> <li>• Standard antenatal examination</li> <li>• Review and document investigation results</li> </ul>
MHW	
SH	
NH	

### Hospital visit approximately 36 weeks

	Who	Clinical	Investigations	Issues for Discussion (in addition to maternal concerns)
RWH MHW SH NH	<b>Doctor</b> (at SH only Midwife unless previous caesarean section)	<ul style="list-style-type: none"> <li>Standard antenatal examination</li> <li>Review of pregnancy record entries</li> </ul>	<ul style="list-style-type: none"> <li>GBS screening</li> <li>Consider FBE/Ferritin</li> </ul>	<ul style="list-style-type: none"> <li>If previous lower uterine segment caesarean section (LUSCS), document decision on whether woman will attempt a vaginal birth after caesarean (VBAC) or have an elective LUSCS</li> <li>If elective caesarean, a pre-operative visit is be arranged by the hospital</li> </ul>

### SMCA visit approximately 38 weeks

RWH MHW SH NH	<ul style="list-style-type: none"> <li>Standard antenatal examination</li> <li>Review and document investigation results</li> </ul>
NH has an additional 37 week routine SMCA visit	

### SMCA visit approximately 39 weeks

Women undertaking Shared Maternity Care at RWH do not routinely have this visit

MHW SH NH	<ul style="list-style-type: none"> <li>Standard antenatal examination</li> <li>Review and document investigation results</li> </ul>
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### SMCA/hospital visit approximately 40 weeks

For women undertaking Shared Maternity Care at MHW and NH, this is a **hospital** visit

For women undertaking Shared Maternity Care at RWH and SH, this is a **SMCA** visit

RWH MWH SH NH	<ul style="list-style-type: none"> <li>Standard antenatal examination</li> <li>Review and document investigation results</li> </ul>
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## Hospital visit: approximately 41 weeks

	Who	Clinical	Investigations (organised and undertaken at hospital)	Issues for Discussion (in addition to maternal concerns)
RWH MHW SH NH	Doctor	<ul style="list-style-type: none"> <li>Standard antenatal examination</li> <li>Review of pregnancy record entries</li> </ul>	<ul style="list-style-type: none"> <li>Cardiotocograph (CTG)</li> <li>Amniotic Fluid Index (AFI)</li> </ul>	Further monitoring/arrangement of induction if applicable

## Shared Maternity Care Affiliate Discussion Points and Patient Information

During the pregnancy, it is ideal if health care providers (both hospital and SMCA) check that, when relevant, the following information has been discussed with the woman (in addition to maternal concerns). Resources (with hyperlinks) supporting these discussion points can be found in the resource section.

Throughout the Pregnancy	Early in Pregnancy	Later in Pregnancy	In the Final Weeks of Pregnancy
<ul style="list-style-type: none"> <li>Smoking cessation</li> <li>Breastfeeding</li> <li>Mental health and wellbeing</li> <li>Intimate partner violence</li> </ul>	<ul style="list-style-type: none"> <li>Models of care</li> <li>Folate supplementation</li> <li>Drug and alcohol use</li> <li>Medicines (prescription, over the counter, and vitamins including Vitamin A derivatives)</li> <li>Promote Shared Maternity Care</li> <li>Influenza vaccination</li> <li>Listeria prevention</li> <li>Toxoplasmosis prevention</li> <li>Diet and nutrition</li> <li>Calcium and pregnancy</li> <li>Common discomforts in pregnancy</li> <li>Anti-D</li> <li>Exercise</li> <li>Sex</li> <li>Working</li> <li>Travel</li> <li>Information sources</li> <li>Expectations of pregnancy/birth</li> <li>Dental care</li> </ul>	<ul style="list-style-type: none"> <li>Symptoms/signs of premature labour (discussed at hospital visit)</li> <li>Establishing support networks</li> <li>Review labour and birth including expectations (discussed at hospital visit)</li> <li>Vaginal birth after caesarean (discussed at hospital visit)</li> <li>Baby products and safety</li> </ul>	<ul style="list-style-type: none"> <li>Newborn care</li> <li>Baby immunisations</li> <li>Postpartum maternal immunisation <ul style="list-style-type: none"> <li>- Boostrix</li> <li>- Varicella</li> <li>- Rubella</li> </ul> </li> <li>Postnatal GP check for mother and baby</li> <li>Community maternal and child health services</li> </ul>

## Resources

Maternity Services and Models of Care (Victoria)		
	Victoria Department of Health <a href="http://www.health.vic.gov.au/maternity/">http://www.health.vic.gov.au/maternity/</a>	Consumer information on maternity services and models of care in Victoria
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_birth_choices?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_birth_choices?open</a>	Consumer information on birth choices
Hospital Shared Maternity Care		
Tools for shared maternity care	Victorian Department of Health <a href="http://www.health.vic.gov.au/maternitycare/downloads/vic_maternity_record_form.pdf">http://www.health.vic.gov.au/maternitycare/downloads/vic_maternity_record_form.pdf</a>	Victorian Maternity Record. The hand held pregnancy record used at RWH, MHW and SH
	Royal Women's Hospital <a href="http://www.thewomens.org.au/ReferralsOtherResources">http://www.thewomens.org.au/ReferralsOtherResources</a>	Pregnancy fast fax referral form for RWH. Either this form or VSRF+ Maternity can be used to refer for maternity care at RWH.
	General Practice Victoria <a href="http://www.gpv.org.au/content.asp?cid=11,137&amp;VSRF#get2009vsrf">http://www.gpv.org.au/content.asp?cid=11,137&amp;VSRF#get2009vsrf</a>	Victorian Statewide Referral Form (VSRF) + Maternity. Optional referral form for all pregnancy referrals
Hospital Shared Maternity Care websites	Royal Women's Hospital <a href="http://www.thewomens.org.au/SharedMaternityCareAffiliates">http://www.thewomens.org.au/SharedMaternityCareAffiliates</a>	RWH Shared Maternity Care information for affiliates
	Mercy Hospital for Women <a href="http://www.mercy.com.au/html/s02_article/article_view.asp?id=882&amp;nav_cat_id=207&amp;nav_top_id=84">http://www.mercy.com.au/html/s02_article/article_view.asp?id=882&amp;nav_cat_id=207&amp;nav_top_id=84</a>	MHW Shared Maternity Care information for affiliates
	Northern Health <a href="http://www.nh.org.au/antenatal-shared-care/w1/i1001234/">http://www.nh.org.au/antenatal-shared-care/w1/i1001234/</a>	NH Shared Maternity Care information for affiliates
	Western Health (Sunshine Hospital) <a href="http://www.wh.org.au/GP_Liaison/Shared_Care/Shared_Maternity_Care/index.aspx">http://www.wh.org.au/GP_Liaison/Shared_Care/Shared_Maternity_Care/index.aspx</a>	SH Shared Maternity Care information for affiliates
Standard antenatal check		
	Royal women's Hospital <a href="http://www.thewomens.org.au/StandardAntenatalCheck">http://www.thewomens.org.au/StandardAntenatalCheck</a>	Clinical practice guideline: standard antenatal check
Blood pressure measurement	Three Centres <a href="http://3centres.com.au/guidelines/routine-blood-pressure-measurement-in-pregnancy/">http://3centres.com.au/guidelines/routine-blood-pressure-measurement-in-pregnancy/</a>	Clinician information: 3 Centre Consensus Guidelines on Antenatal Care- Routine blood pressure measurement in pregnancy
Fundal height measurement	Three Centres <a href="http://3centres.com.au/guidelines/symphyseal-fundal-height-measurement/">http://3centres.com.au/guidelines/symphyseal-fundal-height-measurement/</a>	Clinician information: 3 Centre Consensus Guidelines on Antenatal Care- symphyseal fundal (S-F) height measurement
Urine testing	Three Centres <a href="http://3centres.com.au/guidelines/urinalysis-by-dipstick-for-proteinuria/">http://3centres.com.au/guidelines/urinalysis-by-dipstick-for-proteinuria/</a>	Clinician information: 3 Centre Consensus Guidelines on Antenatal Care- Urinalysis by dipstick for proteinuria

Fetal heart auscultation	Three Centres <a href="http://3centres.com.au/guidelines/auscultation-of-the-fetal-heart/">http://3centres.com.au/guidelines/auscultation-of-the-fetal-heart/</a>	Clinician information: 3 Centre Consensus Guidelines on Antenatal Care- auscultation of the fetal heart
	American Congress of Obstetricians and Gynaecologists <a href="http://www.acog.org/publications/patient_education/bp156.cfm">http://www.acog.org/publications/patient_education/bp156.cfm</a>	Consumer information: how your baby grows during pregnancy
<b>Medical History</b>		
Asthma	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Asthma_and_pregnancy?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Asthma_and_pregnancy?open</a>	Consumer fact sheet: Asthma and pregnancy
	National Asthma Council Australia <a href="http://www.nationalasthma.org.au/cms/images/stories/amh2006_web_5.pdf">http://www.nationalasthma.org.au/cms/images/stories/amh2006_web_5.pdf</a>	Clinical information: Asthma management handbook (p.101 Pregnancy and asthma)
	National Asthma Council Australia <a href="http://www.nationalasthma.org.au/content/view/291/655/">http://www.nationalasthma.org.au/content/view/291/655/</a>	Consumer information: Pregnancy and asthma
Diabetes	National Institute for Health and Clinical Excellence (UK) <a href="http://www.nice.org.uk/nicemedia/pdf/CG063Guidance.pdf">http://www.nice.org.uk/nicemedia/pdf/CG063Guidance.pdf</a>	Clinical guideline: Management of Diabetes and its complications from pre-conception to the postnatal period
	Australasian Diabetes in Pregnancy Society <a href="http://www.adips.org/images/stories/documents/adips_pregdm_guidelines.pdf">http://www.adips.org/images/stories/documents/adips_pregdm_guidelines.pdf</a>	Clinical guidelines: Management of patients with of Type 1 and Type 2 Diabetes in relation to pregnancy
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Gestational_diabetes?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Gestational_diabetes?open</a>	Consumer information: Gestational Diabetes
	Royal Women's Hospital <a href="http://www.thewomens.org.au/DiabetesMellitusManagementofPreexistingDiabetesMellitusinPregnancy">http://www.thewomens.org.au/DiabetesMellitusManagementofPreexistingDiabetesMellitusinPregnancy</a>	Clinical Practice Guideline: Pre-existing Diabetes in pregnancy
Epilepsy	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Epilepsy_lifestyle_issues">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Epilepsy_lifestyle_issues</a>	Consumer information: Epilepsy lifestyle issues
	Epilepsy Foundation of Victoria <a href="http://www.epinet.org.au/articles/epilepsy_and_your_lifestage/pregnancy/">http://www.epinet.org.au/articles/epilepsy_and_your_lifestage/pregnancy/</a>	Consumer information on epilepsy in pregnancy. Includes: pre-pregnancy counselling, pregnancy and anti-epileptic drugs, anti-epileptic drugs and the developing baby, pregnancy and seizures, labour, motherhood and breastfeeding
	American Academy of Neurology <a href="http://www.neurology.org/cgi/content/full/73/2/142">http://www.neurology.org/cgi/content/full/73/2/142</a>	Clinician information: Management issues for women with epilepsy. Focus on pregnancy: Vitamin K, folic acid, blood levels, and breastfeeding
Thyroid disease	The Endocrine Society (USA) <a href="http://www.endo-society.org/guidelines/Current-Clinical-Practice-Guidelines.cfm">http://www.endo-society.org/guidelines/Current-Clinical-Practice-Guidelines.cfm</a>	Clinical practice guideline: management of thyroid dysfunction during pregnancy and postpartum
	The Australian Thyroid Foundation <a href="http://www.thyroidfoundation.com.au/information/information.html">http://www.thyroidfoundation.com.au/information/information.html</a>	Consumer information: thyroid conditions and iodine deficiency
<b>Genetics</b>		
General	Genetic Health Services Victoria	Consumer information: Planning a

	<a href="http://www.genetichealthvic.net.au/sections/Patients/?docid=e5ac4a89-9f9c-4313-9bc0-9a9300b93ba8">http://www.genetichealthvic.net.au/sections/Patients/?docid=e5ac4a89-9f9c-4313-9bc0-9a9300b93ba8</a>	pregnancy
	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/your_health/egenetics/practitioners/gems.htm">http://www.nhmrc.gov.au/your_health/egenetics/practitioners/gems.htm</a>	Clinician information: Genetics in Family Medicine: The Australian Handbook for General Practitioners
	World Health Organisation (WHO) <a href="http://www.who.int/genomics/public/geneticdiseases/en/index2.html#ts">http://www.who.int/genomics/public/geneticdiseases/en/index2.html#ts</a>	WHO monogenic diseases information. Includes: <ul style="list-style-type: none"> <li>• Thalassaemia</li> <li>• Sickle cell anaemia</li> <li>• Haemophilia</li> <li>• Cystic Fibrosis</li> <li>• Tay Sachs disease</li> <li>• Fragile X syndrome</li> <li>• Huntington's disease</li> </ul>
	Genetic Health Services Victoria <a href="http://www.genetichealthvic.net.au">www.genetichealthvic.net.au</a>	Consumer and health professional information
Cystic Fibrosis	Genetic Health Services Victoria <a href="http://www.cfscreening.com.au/">http://www.cfscreening.com.au/</a>	Consumer and clinician information: Cystic fibrosis carrier screening program (population carrier screening)
	Genetic Health Services Victoria <a href="http://www.cfscreening.com.au/Documents/CF_brochure.pdf">http://www.cfscreening.com.au/Documents/CF_brochure.pdf</a>	Consumer brochure: Cystic Fibrosis carrier testing (population carrier screening)
	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practitioners/gems/sections/09%20-%20Cystic%20fibrosis%20WEB.pdf">http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practitioners/gems/sections/09%20-%20Cystic%20fibrosis%20WEB.pdf</a>	Clinician information. Genetics in Family Medicine: The Australian Handbook for General Practitioners. Cystic Fibrosis
	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practitioners/gems/fact_sheets/09%20-%20Cystic%20fibrosis%20WEB.pdf">http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practitioners/gems/fact_sheets/09%20-%20Cystic%20fibrosis%20WEB.pdf</a>	Consumer fact sheet from Genetics in Family Medicine: The Australian Handbook for General Practitioners. Cystic Fibrosis
Fragile X	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practitioners/gems/sections/11%20-%20Fragile%20X%20syndrome%20WEB.pdf">http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practitioners/gems/sections/11%20-%20Fragile%20X%20syndrome%20WEB.pdf</a>	Clinician information. Genetics in Family Medicine: The Australian Handbook for General Practitioners. Fragile X syndrome
	Fragile X Association of Australia <a href="http://www.fragilex.org.au/">http://www.fragilex.org.au/</a>	Consumer information: Fragile X
Tay Sachs disease	<a href="http://www.genetichealthvic.net.au/Documents/PDF/TaySachsBrochure.pdf">http://www.genetichealthvic.net.au/Documents/PDF/TaySachsBrochure.pdf</a>	Consumer and clinician information: Carrier Testing for Tay Sachs and related conditions. For people with Ashkenazi Jewish ancestry
<b>Medicine Use</b>		
	Mercy Hospital for Women <a href="http://www.mercy.com.au/files/NRR6CEQQCO/Psychotropic%20drugs%20%20pregnancy%202nd%20Edn.pdf">http://www.mercy.com.au/files/NRR6CEQQCO/Psychotropic%20drugs%20%20pregnancy%202nd%20Edn.pdf</a>	Clinician information: Psychotropic Medication in Pregnancy/Lactation
	Royal Women's Hospital Drug Information Line Ph: 8345 3190 Royal Women's Hospital Drug Information Email: <a href="mailto:drug.information@thewomens.org.au">drug.information@thewomens.org.au</a>	
	Royal Women's Hospital Pregnancy and Breastfeeding Medicines Guide Available from Pharmacy Department Ph: 8345 3190 E: <a href="mailto:rwh.pharmacy@thewomens.org.au">rwh.pharmacy@thewomens.org.au</a>	Clinician information: Pregnancy and Breastfeeding Medicines Guide
	Therapeutic Goods Administration	Clinician information: Prescribing Medicines in Pregnancy. An Australian categorisation



	<a href="http://www.tga.gov.au/docs/pdf/medpreg.pdf">http://www.tga.gov.au/docs/pdf/medpreg.pdf</a>	of risk of drug use in pregnancy
	Royal Women's Hospital <a href="http://www.thewomens.org.au/Herbalpreparationsinpregnancy">http://www.thewomens.org.au/Herbalpreparationsinpregnancy</a>	Consumer fact sheet: herbal preparations in pregnancy
<b>Vaccinations</b>		
General	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-specialrisk232">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-specialrisk232</a>	Clinician information: Vaccination of women planning pregnancy, pregnant or breastfeeding women, and preterm infants
Measles, mumps and rubella	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-measles">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-measles</a>	Clinician information: Measles immunisation
	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-mumps">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-mumps</a>	Clinician information: Mumps immunisation
	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-rubella">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-rubella</a>	Clinician information: Rubella immunisation
Varicella	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-varicella">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-varicella</a>	Clinician information: Varicella immunisation
Influenza	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-influenza">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-influenza</a>	Clinician information: Influenza immunisation
	Australian & State and Territory Governments <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/MM123-cnt/\$File/imm123-fs-2010.pdf">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/MM123-cnt/\$File/imm123-fs-2010.pdf</a>	Clinician fact sheet: influenza vaccination 2010
Diphtheria, tetanus, pertussis	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-diphtheria">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-diphtheria</a>	Clinician information: Diphtheria immunisation
	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-tetanus">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-tetanus</a>	Clinician information: Tetanus immunisation
	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-pertussis">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-pertussis</a>	Clinician information: Pertussis immunisation
<b>Lifestyle (general pregnancy)</b>		
	Royal Women's Hospital <a href="http://www.thewomens.org.au/Takingcareofyourselfinearlypregnancy">http://www.thewomens.org.au/Takingcareofyourselfinearlypregnancy</a>	Consumer fact sheet: Taking care of yourself in early pregnancy. Available in: English, Arabic, Chinese, Turkish and Vietnamese.
	Department of Health and Ageing <a href="http://www.health.gov.au/internet/quitnow/publishing.nsf/Content/lifescrpts">http://www.health.gov.au/internet/quitnow/publishing.nsf/Content/lifescrpts</a>	Clinician information: Pregnancy Lifescrpts: smoking, alcohol, nutrition
<b>Folate</b>		
	Food Standards Australia New Zealand <a href="http://www.foodstandards.gov.au/srcfiles/Fact%20Sheet%20">http://www.foodstandards.gov.au/srcfiles/Fact%20Sheet%20</a>	Clinician and consumer fact sheet: Mandatory folic acid fortification in

	<a href="#">%20Folic%20Acid%20(July%2009).pdf</a>	Australia
	Food Standards Australia New Zealand <a href="http://www.foodstandards.gov.au/consumerinformation/adviceforpregnantwomen/folicacidfolateandpr4598.cfm">http://www.foodstandards.gov.au/consumerinformation/adviceforpregnantwomen/folicacidfolateandpr4598.cfm</a>	Consumer information: Folic Acid/Folate
	Family Planning Victoria <a href="http://www.fpv.org.au/2_9_4.html">http://www.fpv.org.au/2_9_4.html</a>	Consumer information: Folic acid
	Royal Women's Hospital <a href="http://www.thewomens.org.au/FolateinPregnancy">http://www.thewomens.org.au/FolateinPregnancy</a>	Clinical Practice Guideline: Folate in Pregnancy
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Folate_for_women?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Folate_for_women?open</a>	Consumer fact sheet: Folate for Women
<b>Iodine</b>		
	Food Standards Australia New Zealand <a href="http://www.foodstandards.gov.au/_srcfiles/Fact%20Sheet%20-%20Iodine%20(July%2009).pdf">http://www.foodstandards.gov.au/_srcfiles/Fact%20Sheet%20-%20Iodine%20(July%2009).pdf</a>	Clinician and Consumer fact sheet: Mandatory iodine fortification
	Food Standards Australia New Zealand <a href="http://www.foodstandards.gov.au/consumerinformation/adviceforpregnantwomen/iodineandpregnancy.cfm">http://www.foodstandards.gov.au/consumerinformation/adviceforpregnantwomen/iodineandpregnancy.cfm</a>	Consumer information: Iodine advice for pregnant women
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Iodine_explained">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Iodine_explained</a>	Consumer fact sheet: Iodine explained
<b>Diet, Nutrition and Food Safety</b>		
General	Department of Health & Ageing <a href="http://www.healthyactive.gov.au/internet/healthyactive/publishing.nsf/Content/pregnant-women">http://www.healthyactive.gov.au/internet/healthyactive/publishing.nsf/Content/pregnant-women</a>	Consumer information: Healthy eating guidelines for pregnant women. Includes: general dietary advice and information on iron, folate, iodine, morning sickness, indigestion, listeria, mercury and caffeine.
	Royal Women's Hospital <a href="http://www.thewomens.org.au/Healthyeatingforpregnancy">http://www.thewomens.org.au/Healthyeatingforpregnancy</a>	Consumer fact sheet: Healthy eating for pregnancy
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_diet?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_diet?open</a>	Consumer fact sheet: Pregnancy and diet
	Royal Women's Hospital <a href="http://www.thewomens.org.au/Weightgaininpregnancy">http://www.thewomens.org.au/Weightgaininpregnancy</a>	Consumer fact sheet: Weight gain in pregnancy
Food safety	Royal Women's Hospital <a href="http://www.thewomens.org.au/Foodsafetyduringpregnancy">http://www.thewomens.org.au/Foodsafetyduringpregnancy</a>	Consumer fact sheet: Food safety in pregnancy
	Food Standards Australia & New Zealand <a href="http://www.foodstandards.gov.au/consumerinformation/adviceforpregnantwomen">http://www.foodstandards.gov.au/consumerinformation/adviceforpregnantwomen</a>	Consumer information: Food safety advice for pregnancy. Includes links to further information on folic acid, iodine, fish and mercury, listeria prevention, alcohol caffeine
	Food Standards Australia & New Zealand <a href="http://www.foodstandards.gov.au/_srcfiles/Listeria.pdf">http://www.foodstandards.gov.au/_srcfiles/Listeria.pdf</a>	Consumer brochure: Listeria and food-advice for people at risk
	Food Standards Australia & New Zealand <a href="http://www.foodstandards.gov.au/scienceandeducation/factsheets/fac">http://www.foodstandards.gov.au/scienceandeducation/factsheets/fac</a>	Clinician and consumer information: Listeria and food- commonly asked questions

	<a href="http://tsheets2005/listeriacommonlyaske3115.cfm">tsheets2005/listeriacommonlyaske3115.cfm</a>	
	Food Standards Australia & New Zealand <a href="http://www.foodstandards.gov.au/srcfiles/mercury_in_fish_brochure_lowres.pdf">http://www.foodstandards.gov.au/srcfiles/mercury_in_fish_brochure_lowres.pdf</a>	Consumer brochure: Mercury in fish
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Mercury_in_fish?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Mercury_in_fish?open</a>	Consumer fact sheet: Mercury in fish
Vegetarian and vegan diets	Royal Women's Hospital <a href="http://www.thewomens.org.au/Vegetarianeatingandpregnancy">http://www.thewomens.org.au/Vegetarianeatingandpregnancy</a>	Consumer fact sheet: Vegetarian eating and pregnancy
	Queensland Health <a href="http://www.health.qld.gov.au/nutrition/resources/antenatal_veget.pdf">http://www.health.qld.gov.au/nutrition/resources/antenatal_veget.pdf</a>	Consumer information: Healthy eating for vegetarian pregnant and breastfeeding mothers
	Queensland Health <a href="http://www.health.qld.gov.au/nutrition/resources/antenatal_vegan.pdf">http://www.health.qld.gov.au/nutrition/resources/antenatal_vegan.pdf</a>	Consumer information: Healthy eating for vegan pregnant and breastfeeding mothers
Vitamins and minerals	Royal Women's Hospital <a href="http://www.thewomens.org.au/Ironpregnancy">http://www.thewomens.org.au/Ironpregnancy</a>	Consumer fact sheet: Iron in pregnancy
	Royal Women's Hospital <a href="http://www.thewomens.org.au/VitaminDandpregnancy">http://www.thewomens.org.au/VitaminDandpregnancy</a>	Consumer fact sheet: Vitamin D and pregnancy
	Victorian Department of Health <a href="http://www.health.vic.gov.au/chiefhealthofficer/publications/low_vitamin_d_med.htm">http://www.health.vic.gov.au/chiefhealthofficer/publications/low_vitamin_d_med.htm</a>	Clinician information: Low Vitamin D in Pregnancy- Key Messages for Doctors, Nurses and Allied Health
	Royal Women's Hospital <a href="http://www.thewomens.org.au/VitaminDAntenatalScreening">http://www.thewomens.org.au/VitaminDAntenatalScreening</a>	Clinical practice guideline: Vitamin D antenatal screening
	Royal Australian and New Zealand College of Obstetricians and Gynaecologists (RANZCOG) <a href="http://www.ranzcog.edu.au/publications/statements/C-obs25.pdf">http://www.ranzcog.edu.au/publications/statements/C-obs25.pdf</a>	Clinician information: Vitamin and mineral Supplementation in pregnancy
	Royal Women's Hospital <a href="http://www.thewomens.org.au/VitaminB12inPregnancy">http://www.thewomens.org.au/VitaminB12inPregnancy</a>	Clinical Practice Guideline: Vitamin B12 in pregnancy
<b>Infections</b>		
Toxoplasmosis	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Toxoplasmosis_reducing_the_risks?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Toxoplasmosis_reducing_the_risks?open</a>	Consumer fact sheet: Toxoplasmosis-reducing the risk
Parvovirus	Australian Department of Health and Ageing <a href="http://www.health.gov.au/internet/main/publishing.nsf/Content/cda-pubs-cdi-2000-cdi2403s-cdi24msa.htm">http://www.health.gov.au/internet/main/publishing.nsf/Content/cda-pubs-cdi-2000-cdi2403s-cdi24msa.htm</a>	Clinician information: Parvovirus B19 infection and its significance in pregnancy
	Victorian Department of Health <a href="http://www.health.vic.gov.au/ideas/bluebook/erythema">http://www.health.vic.gov.au/ideas/bluebook/erythema</a>	Clinician information: Guidelines for the control of infectious diseases -Parvovirus
	Victorian Department of Health <a href="http://www.health.vic.gov.au/ideas/bluebook/erythema/erythema_pregnant_info">http://www.health.vic.gov.au/ideas/bluebook/erythema/erythema_pregnant_info</a>	Consumer information: Slapped cheek infection information for pregnant women
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Slapped_face_disease?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Slapped_face_disease?open</a>	Consumer fact sheet: Slapped cheek infection

Cytomegalovirus	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Cytomegalovirus_(cmv)">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Cytomegalovirus_(cmv)</a>	Consumer fact sheet: Cytomegalovirus
	Victorian Department of Health <a href="http://www.health.vic.gov.au/ideas/bluebook/cmv">http://www.health.vic.gov.au/ideas/bluebook/cmv</a>	Clinician information: Cytomegalovirus
Influenza	Royal Women's Hospital <a href="http://www.thewomens.org.au/Pregnancyandflu">http://www.thewomens.org.au/Pregnancyandflu</a>	Consumer fact sheet: Pregnancy and Flu-precautions
<b>Exercise</b>		
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_exercise?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_exercise?open</a>	Consumer fact sheet: Pregnancy and exercise
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_sport?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_sport?open</a>	Consumer fact sheet: Pregnancy and sport
	American Congress of Obstetricians and Gynaecologists <a href="http://www.acog.org/publications/patient_education/bp119.cfm">http://www.acog.org/publications/patient_education/bp119.cfm</a>	Consumer information: exercise during pregnancy
<b>Substance Use and Cessation</b>		
General	Department of Health and Ageing <a href="http://www.health.gov.au/internet/quitnow/publishing.nsf/Content/lifescrpts">http://www.health.gov.au/internet/quitnow/publishing.nsf/Content/lifescrpts</a>	Clinician information: Pregnancy Lifescrpts: smoking, alcohol, nutrition
Smoking	QUIT <a href="http://www.quit.org.au/article.asp?ContentID=pregnancy">http://www.quit.org.au/article.asp?ContentID=pregnancy</a>	Consumer information: Smoking and pregnancy
	QUIT <a href="http://www.quit.org.au/article.asp?ContentID=media_bkground_pregnancy">http://www.quit.org.au/article.asp?ContentID=media_bkground_pregnancy</a>	Consumer information: Common myths about smoking and pregnancy
	QUIT <a href="http://www.quit.org.au/browse.asp?ContainerID=pregnancy_nicotine_replacement">http://www.quit.org.au/browse.asp?ContainerID=pregnancy_nicotine_replacement</a>	Consumer information: Pregnancy, quitting smoking and nicotine replacement therapy
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_smoking?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_smoking?open</a>	Consumer information: Pregnancy and smoking
	Royal Women's Hospital <a href="http://www.thewomens.org.au/Tobacco">http://www.thewomens.org.au/Tobacco</a>	Consumer fact sheet: Tobacco in pregnancy
	Three Centres <a href="http://3centres.com.au/guidelines/provision-of-smoking-cessation-interventions-during-pregnancy/">http://3centres.com.au/guidelines/provision-of-smoking-cessation-interventions-during-pregnancy/</a>	Clinician information: 3 Centre Consensus Guidelines on Antenatal Care- Provision of smoking cessation interventions during pregnancy
Alcohol	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/publications/synopses/ds10syn.htm">http://www.nhmrc.gov.au/publications/synopses/ds10syn.htm</a>	Clinician information: Australian Guidelines to Reduce Health Risks from Drinking Alcohol (p. 67 Guideline 4: Pregnancy and Breastfeeding)
	Drug info clearinghouse <a href="http://www.druginfo.adf.org.au/druginfo/fact_sheets/aod_pregnancy/aod_pregnancy.html">http://www.druginfo.adf.org.au/druginfo/fact_sheets/aod_pregnancy/aod_pregnancy.html</a>	Consumer information: Alcohol, other drugs and pregnancy for women who are pregnant/considering pregnancy
	Better Health Channel	Consumer fact sheet: Fetal alcohol

	<a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Foetal_alcohol_syndrome?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Foetal_alcohol_syndrome?open</a>	syndrome
	Royal Women's Hospital <a href="http://www.thewomens.org.au/Alcohol">http://www.thewomens.org.au/Alcohol</a>	Consumer fact sheet: Effects on pregnancy, breastfeeding and infant development
Drug Use	New South Wales Department of Health <a href="http://www.health.nsw.gov.au/pubs/2006/pdf/ncg_druguse.pdf">http://www.health.nsw.gov.au/pubs/2006/pdf/ncg_druguse.pdf</a>	Clinician information: National clinical guidelines for the management of drug use during pregnancy, birth and the early development years of the newborn
	Royal Women's Hospital <a href="http://www.thewomens.org.au/AlcoholDrugsDuringPregnancy">http://www.thewomens.org.au/AlcoholDrugsDuringPregnancy</a>	Consumer fact sheets: Alcohol and drugs during pregnancy. Includes alcohol, amphetamines, benzodiazepines, buprenorphine, cannabis, heroin and other opiates, inhalants, methadone, tobacco
	Drug info clearinghouse <a href="http://www.druginfo.adf.org.au/druginfo/fact_sheets/aod_pregnancy/aod_pregnancy.html">http://www.druginfo.adf.org.au/druginfo/fact_sheets/aod_pregnancy/aod_pregnancy.html</a>	Consumer information: Alcohol, other drugs and pregnancy: for women who are pregnant/considering pregnancy
	Drug info clearinghouse <a href="http://www.druginfo.adf.org.au/druginfo/fact_sheets/cannabis_factheets/cannabis_pregnancy.html">http://www.druginfo.adf.org.au/druginfo/fact_sheets/cannabis_factheets/cannabis_pregnancy.html</a>	Consumer information: Cannabis use in pregnancy
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_drugs?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_drugs?open</a>	Consumer fact sheet: Pregnancy and drugs. Includes over the counter and vitamins
<b>Dental Health</b>		
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Teeth_and_pregnancy?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Teeth_and_pregnancy?open</a>	Consumer fact sheet: Teeth and pregnancy
<b>Mental Health</b>		
Adult mental health services. Including crisis assessment and treatment (CAT) teams	Victorian Department of Health <a href="http://www.health.vic.gov.au/mentalhealth/services/adult/index.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/index.htm</a>	24 hour psychiatric triage information, assessment and referral. Including crisis assessment and treatment (CAT) teams. Adult Mental Health Service Areas and Local Government Areas
Antenatal and Postnatal depression	Beyond Blue <a href="http://www.beyondblue.org.au/index.aspx?link_id=7.102&amp;tmp=FileDownload&amp;fid=1279">http://www.beyondblue.org.au/index.aspx?link_id=7.102&amp;tmp=FileDownload&amp;fid=1279</a>	Clinician information: Antenatal and Postnatal Depression - A Guide to management for health professionals
	Post and Antenatal Depression Association (PANDA) <a href="http://www.panda.org.au/images/stories/PDFs/Antenatal_Depression.pdf">http://www.panda.org.au/images/stories/PDFs/Antenatal_Depression.pdf</a>	Consumer fact sheet: Antenatal Depression
	Australian Government Department of Health and Ageing <a href="http://www.health.gov.au/internet/main/publishing.nsf/Content/mental-pubs-m-mangp-toc~mental-pubs-m-mangp-app~mental-pubs-m-mangp-app-12">http://www.health.gov.au/internet/main/publishing.nsf/Content/mental-pubs-m-mangp-toc~mental-pubs-m-mangp-app~mental-pubs-m-mangp-app-12</a>	Clinician information: Edinburgh Perinatal depression scale
Emotional health during pregnancy	Beyond Blue <a href="http://www.beyondblue.org.au/index.aspx?link_id=94.751&amp;tmp=FileDownload&amp;fid=1334">http://www.beyondblue.org.au/index.aspx?link_id=94.751&amp;tmp=FileDownload&amp;fid=1334</a>	Consumer brochure: Emotional health during pregnancy and early parenthood
<b>Intimate Partner Violence</b>		
	Domestic Violence and Incest Resource centre	Consumer and clinician information: Includes referral to specialist support

	<a href="http://www.dvirc.org.au/">http://www.dvirc.org.au/</a>	services helpful pamphlets and websites
	Women's Domestic Violence Crisis Service Ph: 9373 0123 or 1800 015 188	Statewide 24 hour crisis support and safe accommodation (refuges) for women and their children
	Immigrant Women's Domestic Violence Service 8413 6800 <a href="http://www.iwdvs.org.au">www.iwdvs.org.au</a>	Consumer information: Support to CALD women in their primary language
	VicHealth <a href="http://www.vichealth.vic.gov.au/en/Programs-and-Projects/Freedom-from-violence/Intimate-Partner-Violence.aspx">http://www.vichealth.vic.gov.au/en/Programs-and-Projects/Freedom-from-violence/Intimate-Partner-Violence.aspx</a>	Clinician information: 'The Health Costs of Violence' VicHealth burden of disease report on intimate partner violence
<b>Female Genital Mutilation (FGM)</b>		
FGM	Royal Women's Hospital <a href="http://www.thewomens.org.au/uploads/downloads/HealthProfessionals/FGM/FGM_Health_Professionals_Fact_Sheet_2009.pdf">http://www.thewomens.org.au/uploads/downloads/HealthProfessionals/FGM/FGM_Health_Professionals_Fact_Sheet_2009.pdf</a>	Clinician fact sheet
	Royal Women's Hospital <a href="http://www.thewomens.org.au/FemaleGenitalMutilationCutting">http://www.thewomens.org.au/FemaleGenitalMutilationCutting</a>	Clinical information Includes links to: FGM maternity clinical practice guideline, fact sheet for health professionals, caesarean section information and links to other useful resources
	Royal Women's Hospital <a href="http://www.thewomens.org.au/CaesareansectionissuesforwomenaffectedbyFGM">http://www.thewomens.org.au/CaesareansectionissuesforwomenaffectedbyFGM</a>	Clinician information: Caesarean section information for women affected by FGM
Family and Reproductive Rights Education Program (FARREP)	Royal Women's Hospital <a href="http://www.thewomens.org.au/FARREP">http://www.thewomens.org.au/FARREP</a>	Consumer and clinician information: Family and Reproductive Rights Education Program (FARREP). Includes information in Amharic, Arabic, Somali, and Tigrinya
<b>Common Discomforts of Pregnancy</b>		
	Royal Women's Hospital <a href="http://www.thewomens.org.au/CopingWithCommonDiscomfortsOfPregnancy">http://www.thewomens.org.au/CopingWithCommonDiscomfortsOfPregnancy</a>	Consumer information: Coping with common discomforts of pregnancy. Includes: morning sickness, constipation, food cravings, heartburn tiredness, haemorrhoids cramps, backache
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Carpal_tunnel_syndrome">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Carpal_tunnel_syndrome</a>	Consumer information: Carpal tunnel syndrome
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Restless_legs_syndrome">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Restless_legs_syndrome</a>	Consumer information: Restless legs
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Heartburn_is_a_form_of_indigestion">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Heartburn_is_a_form_of_indigestion</a>	Consumer information: Heartburn
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Morning_sickness?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Morning_sickness?open</a>	Consumer information: Morning sickness
	Royal Women's Hospital <a href="http://www.thewomens.org.au/Nauseaandvomitinginpregnancymorning">http://www.thewomens.org.au/Nauseaandvomitinginpregnancymorning</a>	Consumer information: Nausea and vomiting in pregnancy. Available in: English,

	<a href="#">ngsickness</a>	Arabic, Chinese, Somali, Turkish and Vietnamese.
	Continence Foundation of Australia <a href="http://www.continence.org.au/resources.php?keyword=&amp;topic%5B%5D=Pregnancy&amp;language=English&amp;type=&amp;submitted=Search">http://www.continence.org.au/resources.php?keyword=&amp;topic%5B%5D=Pregnancy&amp;language=English&amp;type=&amp;submitted=Search</a>	Consumer information: Pregnancy and incontinence
	American Congress of Obstetricians and Gynaecologists <a href="http://www.acog.org/publications/patient_education/bp115.cfm">http://www.acog.org/publications/patient_education/bp115.cfm</a>	Consumer information: easing back pain in pregnancy
	American Congress of Obstetricians and Gynaecologists <a href="http://www.acog.org/publications/patient_education/bp169.cfm">http://www.acog.org/publications/patient_education/bp169.cfm</a>	Consumer information: skin conditions during pregnancy
<b>Sex During and After Pregnancy</b>		
	Family Planning Victoria <a href="http://www.fpv.org.au/3_9_1.html">http://www.fpv.org.au/3_9_1.html</a>	Consumer information: Sex during and after pregnancy
<b>Travel During Pregnancy</b>		
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_travel?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_and_travel?open</a>	Consumer fact sheet: Pregnancy and travel
	Centre for Disease Control and Prevention <a href="http://wwwnc.cdc.gov/travel/yellowbook/2010/chapter-8/traveling-while-pregnant.aspx">http://wwwnc.cdc.gov/travel/yellowbook/2010/chapter-8/traveling-while-pregnant.aspx</a>	Clinician information: travelling while pregnant. Includes guidance on preparation for travel, air travel, high altitudes, Malaria, immunisation and travel kit.
	American Congress of Obstetricians and Gynaecologists <a href="http://www.acog.org/publications/patient_education/bp055.cfm">http://www.acog.org/publications/patient_education/bp055.cfm</a>	Consumer information: travel during pregnancy
<b>Labour and Childbirth</b>		
Stages of labour	Royal Women's Hospital <a href="http://www.thewomens.org.au/StagesOfLabour">http://www.thewomens.org.au/StagesOfLabour</a>	Consumer fact sheet: Stages of labour
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_stages_of_labour?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_stages_of_labour?open</a>	Consumer fact sheet: Stages of labour
Pain relief options	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Child_birth_pain_relief_options?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Child_birth_pain_relief_options?open</a>	Consumer fact sheet. Includes: Non drug pain relief, TENS, nitrous oxide, pethidine, epidural.
	American Congress of Obstetricians and Gynaecologists <a href="http://www.acog.org/publications/patient_education/bp086.cfm">http://www.acog.org/publications/patient_education/bp086.cfm</a>	Consumer information: pain relief during childbirth and labour
Medical interventions	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Child_birth_medical_interventions?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Child_birth_medical_interventions?open</a>	Consumer fact sheet. Includes: Induction, augmentation, episiotomy, forceps delivery, vacuum deliver, caesarean section
Caesarean	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Caesarean_section?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Caesarean_section?open</a>	Consumer fact sheet: Caesarean sections
	American Congress of Obstetricians and Gynaecologists <a href="http://www.acog.org/publications/patient_education/bp006.cfm">http://www.acog.org/publications/patient_education/bp006.cfm</a>	Consumer information: caesarean birth
Vaginal Birth After Caesarean (VBAC)	Royal Women's Hospital <a href="http://www.thewomens.org.au/VBACVaginalBirthafterCaesareanAntenatalManagement">http://www.thewomens.org.au/VBACVaginalBirthafterCaesareanAntenatalManagement</a>	Clinician information: Clinical Practice Guideline- VBAC antenatal management

	Royal Australian and New Zealand College of Obstetricians and Gynaecologists (RANZCOG) <a href="http://www.ranzcog.edu.au/publications/statements/C-obs38.pdf">http://www.ranzcog.edu.au/publications/statements/C-obs38.pdf</a>	Clinician information: planned vaginal birth after caesarean section
<b>Baby Products and Safety</b>		
Child safety restraints	VicRoads <a href="http://www.vicroads.vic.gov.au/Home/SafetyAndRules/SaferVehicles/ChildRestraints/">http://www.vicroads.vic.gov.au/Home/SafetyAndRules/SaferVehicles/ChildRestraints/</a>	Consumer information on choosing the correct child safety restraint
<b>Breastfeeding</b>		
	Australian Breastfeeding Association <a href="http://www.breastfeeding.asn.au/bfinfo/index.html">http://www.breastfeeding.asn.au/bfinfo/index.html</a>	Consumer information on breastfeeding including support and advice
	World Health Organisation <a href="http://www.who.int/topics/breastfeeding/en">http://www.who.int/topics/breastfeeding/en</a>	Clinician and consumer information: Breastfeeding
	Royal Women's Hospital <a href="http://www.thewomens.org.au/BreastfeedingBestPracticeGuidelines">http://www.thewomens.org.au/BreastfeedingBestPracticeGuidelines</a>	Clinical practice guideline: Breastfeeding best practice
<b>Newborn Care</b>		
	Victorian Department of Health <a href="http://www.health.vic.gov.au/maternity/yourpregnancy/ongoingcare.htm">http://www.health.vic.gov.au/maternity/yourpregnancy/ongoingcare.htm</a>	Consumer information: Having a baby in Victoria - Ongoing care after you have your baby. <ul style="list-style-type: none"> <li>• Postnatal domiciliary care</li> <li>• Victorian Child Health Record</li> <li>• Maternal and child health services</li> <li>• Six-week postnatal check for mother and baby</li> <li>• Contraception</li> <li>• Sex after pregnancy</li> <li>• Birth Registration</li> <li>• Infant car restraints</li> <li>• Crying baby</li> <li>• Sleep baby sleep</li> <li>• Immunisation program</li> <li>• Sudden infant death syndrome</li> </ul>
	Raising Children Network <a href="http://raisingchildren.net.au/">http://raisingchildren.net.au/</a>	Wide range of patient and health professional information about children and parenting



## ANTENATAL INVESTIGATIONS

The following section provides details of the routine and commonly considered antenatal tests offered and discussed. While there is considerable alignment between the four hospitals, routine antenatal investigations do vary. For information on prenatal tests see the 'Testing in Pregnancy for Fetal Abnormalities' section of these Guidelines.

Antenatal tests and prenatal tests (for fetal abnormalities) can be performed either in the community or at the hospital. If a test is performed in the community, a copy of the results (if available) should accompany the woman to her hospital visits.

As a woman's first hospital visit is often around 12-16 weeks, considering the time-sensitive nature of some investigations and the timely intervention for some conditions, it is preferable that investigations are performed by a woman's GP prior to her first hospital visit.

It is the primary responsibility of the provider ordering a test or noting any abnormal finding to ensure appropriate follow-up, communication and management. However, all providers should check that follow-up of any abnormal investigation has occurred.

*'It is the primary responsibility of the provider ordering a test or noting any abnormal finding to ensure appropriate follow-up, communication and management. However, all providers should check that follow-up of any abnormal investigation has occurred.'*

### Initial Routine Investigations

Test	Notes
FBE (including MCV/MCH for haemoglobinopathy screen)	<ul style="list-style-type: none"> <li>• General screen: Haemoglobin, platelets etc.</li> <li>• Also a basic Thalassaemia/haemoglobinopathy screen by examination of the Mean Cell Volume (MCV) and Mean Cell Haemoglobin concentration (MCH) <ul style="list-style-type: none"> <li>- Ferritin and haemoglobin electrophoresis is ordered if a low MCV/MCH is detected on FBE. Partner screening (FBE, Ferritin, Haemoglobin Electrophoresis) should also be considered at this stage</li> </ul> </li> <li>• Community providers should follow-up low Haemoglobin/MCV/MCH on FBE if this is performed in the community</li> </ul>
Blood group	<p>If a woman is Rhesus negative (Rh -ve) and has no Rh antibodies she should:</p> <ul style="list-style-type: none"> <li>• Be offered routine anti-D at 28 and 34 weeks (this is undertaken at the hospital)</li> <li>• In addition women should be referred to her closest maternity hospital's emergency department in the event of a sensitising event.</li> </ul> <p>Sensitising events include:</p> <ul style="list-style-type: none"> <li>• ectopic pregnancy</li> <li>• miscarriage</li> <li>• termination of pregnancy (medical or surgical)</li> <li>• following curettage</li> <li>• invasive prenatal diagnostic procedures (including chorionic villus sampling, amniocentesis and cordocentesis)</li> </ul>

	<ul style="list-style-type: none"> <li>• abdominal trauma considered sufficient to cause fetomaternal haemorrhage</li> <li>• external cephalic version</li> </ul> <p>The minimum period of gestation at which antibodies may be formed and anti-D should be given for a sensitising event is unknown. The RANZCOG recommendation states that 6 weeks is a reasonable minimum period of gestation <a href="http://manualtransfusioncomau.ozstaging.com/Pregnancy-and-anti-D/Frequently-asked-questions/Anti-D-Clinical-FAQs.aspx#g64">http://manualtransfusioncomau.ozstaging.com/Pregnancy-and-anti-D/Frequently-asked-questions/Anti-D-Clinical-FAQs.aspx#g64</a></p> <p>For threatened miscarriage in the first trimester, no anti-D is required.</p>
Antibody screen	This is recommended for every woman in every pregnancy as antibodies may develop over time, even if she is Rhesus positive
Urinalysis/MSU M & C	<p>Urine testing for asymptomatic bacteriuria</p> <ul style="list-style-type: none"> <li>• <i>All pregnant women should be offered screening for asymptomatic bacteriuria – 3 Centres</i></li> <li>• <i>It is recommended that a midstream urine (MSU) sample be sent to microscopy, culture and sensitivity (Level III-2 evidence) – 3 Centres</i></li> <li>• <i>When asymptomatic bacteriuria is detected it should be treated to improve outcomes with respect to pyelonephritis, preterm birth and low birth weight (Level 1 evidence) – 3 Centres</i></li> </ul>
Hepatitis B screening for carrier status	<i>All Women should be offered a screening test for hepatitis B virus at their first antenatal visit (Level IV evidence) – 3 Centres</i>
Syphilis serology	<p><i>Antenatal serological screening for syphilis should be offered to all pregnant women. (Level III-2 &amp; IV evidence) – 3 Centres</i></p> <p><i>Screening for syphilis should be undertaken at the first antenatal visit, ideally prior to 16 week's gestation. (Level IV evidence) – 3 Centres</i></p>
Rubella antibodies	If non-immune the hospital offers immunisation post delivery
HIV serology	<p><i>All pregnant women should be offered screening for HIV. (Level I evidence)</i></p> <p><i>Selective screening fails to identify a significant proportion of HIV positive women (consensus background) – 3 Centres</i></p>

## Initial Investigations to Consider

Based on the woman's particular history and examination

Consider	To Look For	Common Reasons to Order	Notes
Dating ultrasound	Estimated date of confinement	<ul style="list-style-type: none"> <li>• Unsure of dates</li> <li>• Elective lower uterine caesarean section planned and 12 week ultrasound not planned</li> </ul>	Optimal timing 7 to 10 weeks so crown rump length can be measured
Ferritin	Iron deficiency	<ul style="list-style-type: none"> <li>• Vegetarian/vegan</li> <li>• Low MCV/anaemia</li> </ul>	Offered to all women at RWH
Hepatitis C serology	Hepatitis carrier status	<ul style="list-style-type: none"> <li>• <i>Hepatitis C testing should be offered to pregnant women who believe that they are at increased risk of infection or exposure. Current</i></li> </ul>	Offered to all women at MHW and SH

		<p><i>evidence suggests that the detection of Hepatitis C Virus (HCV) during pregnancy does not assist with long term management. The reasons for testing are to:</i></p> <ul style="list-style-type: none"> <li>- <i>Provide ongoing advice</i></li> <li>- <i>Provide appropriate referral</i></li> <li>- <i>Follow-up babies of infected mothers</i></li> </ul> <p><i>The risk factors for HCV which should be considered during history taking are:</i></p> <p><b>High-Risk:</b></p> <ul style="list-style-type: none"> <li>- <i>Injecting drug use (IDU) (~ 40% of infected mothers)</i></li> <li>- <i>A history of migration from a country with a high rate of endemic HCV (Southern European, African and Asia/Pacific countries)</i></li> <li>- <i>A history of transfusion of blood products prior to HCV screening in 1990</i></li> <li>- <i>A period of incarceration (~67% of women in Victorian prisons are HCV positive)</i></li> </ul> <p><b>Low-Risk:</b></p> <ul style="list-style-type: none"> <li>- <i>Persons engaging in high-risk sexual activity</i></li> <li>- <i>Sexual partners of HCV positive individuals</i></li> <li>- <i>Household contact</i></li> </ul> <p><i>It is important to note that 40-50% of women infected with HCV have no identifiable risk factors. (Level IV evidence) – 3 Centres</i></p>	
Vitamin D level	Vitamin D deficiency	<ul style="list-style-type: none"> <li>• Dark skinned and non-Caucasian women</li> <li>• Veiled women</li> <li>• Women who have low sunlight exposure</li> </ul>	Offered to all women at NH and SH
Pap test	Screening for cervical cancer	If due	<ul style="list-style-type: none"> <li>• Do not use cytobrush</li> <li>• Pap smears can generally be undertaken during pregnancy to at least 28 weeks gestation</li> </ul>
Varicella antibodies	Varicella immunity	<ul style="list-style-type: none"> <li>• No known immunisation</li> <li>• No clear history of varicella</li> </ul>	If non-immune, women need to arrange immunisation post delivery

			with their GP (two doses required)
Chlamydia (urine test)	Chlamydia infection	<ul style="list-style-type: none"> <li>• Women &lt;25 years old</li> <li>• Previous Chlamydia infection</li> </ul>	
TSH	Thyroid function	<ul style="list-style-type: none"> <li>• Goitre</li> <li>• Past or family history of thyroid function problems or autoimmune disorders</li> </ul>	Offered to all women at NH
Early GTT	Diabetes	<ul style="list-style-type: none"> <li>• Previous gestational diabetes</li> <li>• Previous baby &gt;4kg</li> <li>• Polycystic ovarian syndrome</li> <li>• Glycosuria</li> <li>• Strong family history of diabetes</li> </ul>	<ul style="list-style-type: none"> <li>• Early GTT is looking for pre-existing diabetes and needs to be repeated at 26-28 weeks even if result is normal</li> <li>• GTT is performed after a 10-12 hour fast. Fasting plasma glucose is measured, and then 75 g glucose solution is drunk and the 2-hour plasma glucose measured</li> </ul>
Haemoglobin electrophoresis/ Ferritin	Abnormal haemoglobins including $\beta$ Thalassaemia and sickle cell carriers	<ul style="list-style-type: none"> <li>• MCV &lt; 80 OR MCH &lt; 27</li> <li>• History of anaemia</li> <li>• Family history of Thalassaemia or haemoglobinopathy</li> <li>• Partner has Thalassaemia or haemoglobinopathy</li> <li>• Woman or partner from a high-risk ethnic background: <ul style="list-style-type: none"> <li>- Mediterranean</li> <li>- Middle East</li> <li>- Africa (inc: America/Caribbean)</li> <li>- any Asian country including India, Sri Lanka, Pakistan, Bangladesh</li> <li>- Pacific Islands</li> <li>- South America</li> <li>- New Zealand Maori</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>• Offered to all women at SH</li> <li>• The aim of haemoglobinopathy testing is to identify couples at risk of having a fetus with a major haemoglobinopathy. This includes: <ul style="list-style-type: none"> <li>- B Thalassaemia major (Both parents with B Thalassaemia minor or with B/E haemoglobin)</li> <li>- Barts hydrops (4 gene alpha haemoglobin deletion (parents have alpha Thalassaemia minor with 2 gene deletion)</li> <li>- Sickle cell disease (parents heterozygous S and Beta, D or C)</li> </ul> </li> <li>• Partner screening (FBE, ferritin, haemoglobin electrophoresis) should also be considered at this stage. Indicate that woman is pregnancy and include her details on his pathology request</li> </ul>

			<ul style="list-style-type: none"> <li>Haemoglobin electrophoresis can yield a false negative for B Thalassaemia if a woman is iron deficient. Therefore, if a woman has iron deficiency anaemia and Thalassaemia cannot be excluded, partner screening is recommended. If the partner testing is normal, no further investigation is required</li> </ul>
DNA analysis	Alpha Thalassaemia	<ul style="list-style-type: none"> <li>If MCV and MCH low in the presence of normal Ferritin and no abnormal haemoglobin detected on electrophoresis</li> <li>If results of FBE/ferritin/Haemoglobin electrophoresis suggest alpha thalassaemia</li> </ul>	Partner screening (FBE, ferritin, haemoglobin electrophoresis) should also be considered at this stage
Cystic Fibrosis (CF) testing	For those with a family history	<ul style="list-style-type: none"> <li>Those with a family history of CF or whose relative carries a known CF mutation (testing is free in Victoria)</li> <li>Those whose partner is affected or is a known carrier of CF (testing is free in Victoria)</li> <li>This is consistent with Royal Australian College of General Practitioners “Guidelines for preventive activities in general practice (7<sup>th</sup> edition)”.</li> </ul>	<ul style="list-style-type: none"> <li>Ideally before pregnancy</li> <li>Diagnostic testing for those with a known family history</li> <li>Blood test which identifies particular gene alterations</li> <li>Options are: <ol style="list-style-type: none"> <li>Refer for investigation by doctor. Provide a description of family member (affected or carrier) relationship, name and date of birth. Also provide detail of the type of mutation if known or,</li> <li>Refer early in pregnancy to Genetic Services for investigation</li> </ol> </li> <li>Partner testing should also be undertaken at the same time</li> </ul>
Cystic Fibrosis (CF) population carrier screening	For those at increased risk due to population group	<ul style="list-style-type: none"> <li>Those patients who are from northern European, Ashkenazi Jewish background or who are consanguineous (ie. cousins married to each other) can access Cystic Fibrosis carrier testing through the population carrier screening program (no Medicare rebate available).</li> </ul>	<ul style="list-style-type: none"> <li>Ideally before pregnancy</li> <li>Population carrier screening is: <ul style="list-style-type: none"> <li>Available to everyone including people with no known family or partner history</li> <li>Buccal swab test identifies only <i>common</i> CFTR gene alterations. Overall coverage is approximately 80% ,but this</li> </ul> </li> </ul>

			<p>varies for different population groups</p> <ul style="list-style-type: none"> <li>- Out of pocket expenses are incurred (no Medicare rebate available)</li> <li>- Testing kits available from Genetic Health Services and can be accessed by individual women or GP clinics</li> <li>• All tests must be requested by a GP</li> </ul>
Fragile X testing		<ul style="list-style-type: none"> <li>• Women with a family history of Fragile X syndrome. These women can access Fragile X screening through their GP or a genetic counselling service. A Medicare rebate is available.</li> <li>• Women with a family history of intellectual disability, developmental delay and/or autism of unknown cause. These women can be referred to a genetic counselling service for consideration of Fragile X carrier testing.</li> <li>• Women with no family history of Fragile X syndrome who wish to pursue carrier testing for reproductive planning purposes.</li> </ul>	<ul style="list-style-type: none"> <li>• Ideally before pregnancy</li> <li>• Blood test can be ordered by GP, but for women who are already pregnant, consider early referral to Genetic Services</li> <li>• For patients with a family or personal history, a Medicare rebate is available for part of testing. If further testing is required, out of pocket expenses may be incurred</li> </ul>

When ordering investigations for genetic conditions (e.g. Thalassaemia, Cystic Fibrosis, Fragile X syndrome) for a pregnant woman and her partner, indicate on the referral form that the woman is pregnant (and her partner details if this is partner testing) so that the result and analysis can be expedited.

*'When ordering investigations for genetic conditions (e.g. Thalassaemia, Cystic Fibrosis, Fragile X syndrome) for a pregnant woman and her partner, indicate on the referral form that the woman is pregnant (and her partner details if this is partner testing) so that the result and analysis can be expedited.'*

## Second Trimester Investigations

Test	When	Notes
FBE	26-30 weeks	<ul style="list-style-type: none"> <li>RWH, MHW and NH ordered by hospital staff</li> <li>SH ordered by SMCA</li> </ul>
Antibody screen	26-30 weeks	<ul style="list-style-type: none"> <li>RWH, MHW and NH ordered by hospital staff</li> <li>SH ordered by SMCA</li> </ul>
Screening for Gestational Diabetes (Glucose challenge test (GCT) or glucose tolerance test (GTT))	<p>24-28 weeks</p> <p><i>If women agree to screening, it should be carried out between 24 to 28 weeks gestation (consensus opinion) – 3Centres</i></p>	<ul style="list-style-type: none"> <li>RWH, MHW and NH ordered by hospital staff</li> <li>SH ordered by SMCA (as a GCT, this can either be a 50g or 75g glucose load)</li> <li>At MHW GTT is routine</li> <li>At RWH, SH and NH a GTT is undertaken if high-risk and GCT is undertaken for all other women</li> <li>GCT does not require fasting</li> <li>GTT requires 10-12 hour fasting</li> </ul>

## Third Trimester Investigations

Test	When	Notes
Screening for Group B Streptococcus (GBS)	35-37 weeks	Performed at the hospital. Women are offered opportunity to take swab themselves
FBE/ferritin	36 weeks	Not done routinely. Consider if previous low haemoglobin or ferritin or clinical indication

## Resources

For further resources about testing in pregnancy for fetal abnormalities including Down syndrome screening and diagnostic tests refer to the TESTING IN PREGNANCY FOR FETAL ABNORMALITIES section of these Guidelines.

Routine Investigations		
Tests and Investigations general	3 Centres Collaboration <a href="http://3centres.com.au/consumers/">http://3centres.com.au/consumers/</a>	Consumer information: A guide to tests and investigations in uncomplicated pregnancies
	Royal Australian And New Zealand College of Obstetricians and Gynaecologists (RANZCOG) <a href="http://www.ranzcog.edu.au/publications/statements/C-obs3.pdf">http://www.ranzcog.edu.au/publications/statements/C-obs3.pdf</a>	Clinician information: pre-pregnancy counselling & antenatal screening tests
Thalassaemia and other haemoglobinopathies	Genetic Health Services Victoria <a href="http://www.genetichealthvic.net.au/sections/Patients/?docid=68dcb73b-9469-4db6-9064-9a9300d353ae">http://www.genetichealthvic.net.au/sections/Patients/?docid=68dcb73b-9469-4db6-9064-9a9300d353ae</a>	Consumer information: Thalassaemia screening
	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/files/nhmrc/file/your_health/egenetics/practioners/gems/sections/12%20-%20Haemoglobinopathies%20WEB.pdf">http://www.nhmrc.gov.au/files/nhmrc/file/your_health/egenetics/practioners/gems/sections/12%20-%20Haemoglobinopathies%20WEB.pdf</a>	Clinician information: Genetics in Family Medicine - The Australian Handbook for General Practitioners: Haemoglobinopathies chapter
	Royal Women's Hospital <a href="http://www.thewomens.org.au/ThalassaemiaandAbnormalHaemoglobinsinPregnancy">http://www.thewomens.org.au/ThalassaemiaandAbnormalHaemoglobinsinPregnancy</a>	Clinical practice guideline: Thalassaemia and abnormal haemoglobins in pregnancy. Covers Thalassaemia

		screening, referring for testing and counselling, investigations and treatment and specific considerations
	World Health Organisation (WHO) <a href="http://www.who.int/genomics/public/Maphaemoglobin.pdf">http://www.who.int/genomics/public/Maphaemoglobin.pdf</a>	Global distribution of haemoglobin disorders
	Thalassaemia Australia <a href="http://www.thalassaemia.org.au/">http://www.thalassaemia.org.au/</a>	Consumer fact sheets on: Beta Thalassaemia, Alpha Thalassaemia, Haemoglobin E, Sickle Cell Anaemia, family planning. Available in: Arabic, Cantonese, Greek, English, Italian, Mandarin, Nuer, Sinhalese, Tamil and Vietnamese
Antibody Screen	Royal Australian and New Zealand College of Obstetricians and Gynaecologists & Australian and New Zealand Society of Blood Transfusion <a href="http://www.ranzcog.edu.au/womenshealth/pdfs/ANZSBT-antenatal-guidelines.pdf">http://www.ranzcog.edu.au/womenshealth/pdfs/ANZSBT-antenatal-guidelines.pdf</a>	Guidelines for blood grouping and antibody screening in the antenatal and perinatal setting
Rhesus negative blood groups and Anti-D	Red Cross Blood Service <a href="http://manualtransfusioncomau.ozstaging.com/Pregnancy-and-Anti-D.aspx">http://manualtransfusioncomau.ozstaging.com/Pregnancy-and-Anti-D.aspx</a>	Transfusion medicine manual- Pregnancy and Anti-D. Includes: Guidelines for the use of Rh Immunoglobulin, Anti-D testing in pregnancy, frequently asked questions and educational support material
	Australian Red Cross Blood Service <a href="http://manualtransfusioncomau.ozstaging.com/admin/file/content2/c7/You%20and%20Your%20Baby%20brochure.pdf">http://manualtransfusioncomau.ozstaging.com/admin/file/content2/c7/You%20and%20Your%20Baby%20brochure.pdf</a>	Consumer information. You and your baby: important information for Rh (D) negative women
	Australian Red Cross Blood Service <a href="http://manualtransfusioncomau.ozstaging.com/admin/file/content2/c7/HDN%20brochure.pdf">http://manualtransfusioncomau.ozstaging.com/admin/file/content2/c7/HDN%20brochure.pdf</a>	Consumer information: Important information for Rh (D) Negative Women: Prevention of Haemolytic Disease of the Newborn. For women who experience early fetal loss
	National Blood Authority <a href="http://www.nba.gov.au/pubs/pdf/glines-anti-d.pdf">http://www.nba.gov.au/pubs/pdf/glines-anti-d.pdf</a>	Clinician information: Guidelines on the prophylactic use of Rh D immunoglobulin (anti-D) in obstetrics
	Royal Australian and New Zealand College of Obstetricians and Gynaecologists (RANZCOG) <a href="http://www.ranzcog.edu.au/publications/statements/C-obs6.pdf">http://www.ranzcog.edu.au/publications/statements/C-obs6.pdf</a>	Clinician information: guidelines for the use of Rh D Immunoglobulin (anti-D) in obstetrics in Australia
Bacteriuria	Three Centres <a href="http://3centres.com.au/guidelines/antenatal-screening-for-asymptomatic-bacteriuria/">http://3centres.com.au/guidelines/antenatal-screening-for-asymptomatic-bacteriuria/</a>	Clinician information: 3 Centre Consensus Guidelines on Antenatal Care- Antenatal Screening for Asymptomatic Bacteriuria
Hepatitis B	Three Centres <a href="http://3centres.com.au/guidelines/antenatal-screening-for-hepatitis-b-virus-hbv/">http://3centres.com.au/guidelines/antenatal-screening-for-hepatitis-b-virus-hbv/</a>	Clinician information: 3 Centre Consensus Guidelines on Antenatal Care- Antenatal screening for Hepatitis B virus (HBV)
Syphilis	Three Centres <a href="http://3centres.com.au/guidelines/antenatal-screening-for-syphilis/">http://3centres.com.au/guidelines/antenatal-screening-for-syphilis/</a>	Clinician information: 3 Centre Consensus Guidelines on Antenatal Care- antenatal screening for Syphilis
Rubella	Victorian Department of Health <a href="http://www.health.vic.gov.au/ideas/bluebook/rubella">http://www.health.vic.gov.au/ideas/bluebook/rubella</a>	Clinician information: guidelines for the control of infectious diseases –Rubella
	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/</a>	Clinician information: Rubella



	<a href="#">Handbook-rubella</a>	immunisation
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Rubella">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Rubella</a>	Consumer fact sheet: Rubella
Human Immunodeficiency Virus (HIV)	Three Centres <a href="http://3centres.com.au/guidelines/antenatal-screening-for-human-immunodeficiency-virus-hiv/">http://3centres.com.au/guidelines/antenatal-screening-for-human-immunodeficiency-virus-hiv/</a>	Clinician information:3 Centre Consensus Guidelines on Antenatal Care- antenatal screening for Human Immunodeficiency Virus (HIV)
Group B Streptococcus (GBS)	Three Centres <a href="http://3centres.com.au/guidelines/prevention-of-early-onset-group-b-streptococcal-disease-gbs/">http://3centres.com.au/guidelines/prevention-of-early-onset-group-b-streptococcal-disease-gbs/</a>	Clinician information:3 Centre Consensus Guidelines on Antenatal Care- prevention of Early Onset Group B Streptococcal Disease (EOGBS)
	Royal Australian and New Zealand College of Obstetricians and Gynaecologists (RANZCOG) <a href="http://www.ranzcog.edu.au/publications/statements/C-obs19.pdf">http://www.ranzcog.edu.au/publications/statements/C-obs19.pdf</a>	Clinician information: screening and treatment for Group B Streptococcus in pregnancy
<b>Investigations to Consider</b>		
Ferritin	Royal Women's Hospital <a href="http://www.thewomens.org.au/Ironpregnancy">http://www.thewomens.org.au/Ironpregnancy</a>	Consumer fact sheet: iron in pregnancy
	Royal Women's Hospital <a href="http://www.thewomens.org.au/IronDeficiencyinPregnancy">http://www.thewomens.org.au/IronDeficiencyinPregnancy</a>	Clinician information: Iron deficiency in pregnancy. Includes treatment and information on iron supplements
Hepatitis C	Three Centres <a href="http://3centres.com.au/guidelines/antenatal-screening-for-hepatitis-c-virus-hcv/">http://3centres.com.au/guidelines/antenatal-screening-for-hepatitis-c-virus-hcv/</a>	Clinician information:3 Centre Consensus Guidelines on Antenatal Care- antenatal testing for Hepatitis C virus (HBV)
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Hepatitis_C_the-facts">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Hepatitis_C_the-facts</a>	Consumer fact sheet: Hepatitis C
Vitamin D	Victorian Department of Health <a href="http://www.health.vic.gov.au/chiefhealthofficer/publications/low_vitamin_d_med.htm">http://www.health.vic.gov.au/chiefhealthofficer/publications/low_vitamin_d_med.htm</a>	Clinician information: Low Vitamin D in Pregnancy- Key Messages for Doctors, Nurses and Allied Health
	Royal Women's Hospital <a href="http://www.thewomens.org.au/VitaminDandpregnancy">http://www.thewomens.org.au/VitaminDandpregnancy</a>	Consumer fact sheet: vitamin D and pregnancy
	Royal Women's Hospital <a href="http://www.thewomens.org.au/VitaminDAntenatalScreening">http://www.thewomens.org.au/VitaminDAntenatalScreening</a>	Clinical practice guideline: vitamin D antenatal screening
Pap Test	Pap Screen Victoria <a href="http://www.papscreen.org.au">http://www.papscreen.org.au</a>	Consumer and clinician information on pap screening
Varicella antibodies	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Chickenpox">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Chickenpox</a>	Consumer fact sheet: Chickenpox
	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-varicella">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-varicella</a>	Clinician information: Varicella immunisation
Chlamydia	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Chlamydia">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Chlamydia</a>	Consumer fact sheet: Chlamydia
	Victorian Department of Health	Clinician and consumer information:

	<a href="http://www.health.vic.gov.au/ideas/diseases/chlam_facts">http://www.health.vic.gov.au/ideas/diseases/chlam_facts</a>	Chlamydia- the facts
	Melbourne Sexual Health Centre <a href="http://www.mshc.org.au/gpassist/emChlamydiaem/ManagementofChlamydiainPregnancy/tabid/92/Default.aspx">http://www.mshc.org.au/gpassist/emChlamydiaem/ManagementofChlamydiainPregnancy/tabid/92/Default.aspx</a>	Clinician information: management of Chlamydia in pregnancy
	Melbourne Sexual Health Centre <a href="http://www.mshc.org.au/gpassist/Chlamydia/tabid/70/Default.aspx">http://www.mshc.org.au/gpassist/Chlamydia/tabid/70/Default.aspx</a>	Clinician information: includes letter for partners, and DHS notification
	Melbourne Sexual Health Centre <a href="http://www.mshc.org.au/Portals/1/chlamydia_a4.pdf">http://www.mshc.org.au/Portals/1/chlamydia_a4.pdf</a>	Consumer fact sheet: Chlamydia
Thyroid function	The Endocrine Society (USA) <a href="http://www.endo-society.org/guidelines/Current-Clinical-Practice-Guidelines.cfm">http://www.endo-society.org/guidelines/Current-Clinical-Practice-Guidelines.cfm</a>	Clinical practice guideline: management of thyroid dysfunction during pregnancy and postpartum.
	The Australian Thyroid Foundation <a href="http://www.thyroidfoundation.com.au/information/information.html">http://www.thyroidfoundation.com.au/information/information.html</a>	Consumer information: thyroid conditions and iodine deficiency
Gestational Diabetes	Three Centres <a href="http://3centres.com.au/guidelines/screening-for-gestational-diabetes-mellitus-gdm/">http://3centres.com.au/guidelines/screening-for-gestational-diabetes-mellitus-gdm/</a>	Clinician information: 3 Centre Consensus Guidelines on Antenatal Care- screening for Gestational Diabetes Mellitus
	Royal Women's Hospital <a href="http://www.thewomens.org.au/DiabetesMellitusManagementofGestationalDiabetes">http://www.thewomens.org.au/DiabetesMellitusManagementofGestationalDiabetes</a>	Gestational Diabetes Clinical Practice Guideline
	Diabetes Australia <a href="http://www.diabetesvic.org.au/LinkClick.aspx?fileticket=hwxC07vLWuc%3d&amp;tabid=164">http://www.diabetesvic.org.au/LinkClick.aspx?fileticket=hwxC07vLWuc%3d&amp;tabid=164</a>	Gestational Diabetes Patient Fact sheet
	National Institute for Health and Clinical Excellence (UK) <a href="http://www.nice.org.uk/nicemedia/pdf/CG063Guidance.pdf">http://www.nice.org.uk/nicemedia/pdf/CG063Guidance.pdf</a>	Clinical guidelines: Management of Diabetes and it's complications from pre-conception to the postnatal period
	Australasian Diabetes in Pregnancy Society <a href="http://www.adips.org/images/stories/documents/adips_pregdm_guidelines.pdf">http://www.adips.org/images/stories/documents/adips_pregdm_guidelines.pdf</a>	Consensus guidelines for the management of patients with of type 1 and type 2 diabetes in relation to pregnancy
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Gestational_diabetes?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Gestational_diabetes?open</a>	Patient information: Gestational Diabetes
	Royal Australian and New Zealand College of Obstetricians and Gynaecologists (RANZCOG) <a href="http://www.ranzcog.edu.au/publications/statements/C-obs7.pdf">http://www.ranzcog.edu.au/publications/statements/C-obs7.pdf</a>	Clinician information: diagnosis of Gestational Diabetes Mellitus
<b>Genetics</b>		
	World Health Organisation (WHO) <a href="http://www.who.int/genomics/public/geneticdiseases/en/index2.html#ts">http://www.who.int/genomics/public/geneticdiseases/en/index2.html#ts</a>	WHO monogenic diseases information. Includes: <ul style="list-style-type: none"> <li>• Thalassaemia</li> <li>• Sickle cell anaemia</li> <li>• Haemophilia</li> <li>• Cystic Fibrosis</li> <li>• Tay Sachs disease</li> <li>• Fragile X syndrome</li> <li>• Huntington's disease</li> </ul>
	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/your_health/egenetics/practitioners/gems.htm">http://www.nhmrc.gov.au/your_health/egenetics/practitioners/gems.htm</a>	Clinician information: Genetics in Family Medicine - The Australian Handbook for General Practitioners
	Genetic Health Services Victoria	Consumer and health professional

	<a href="http://www.genetichealthvic.net.au">www.genetichealthvic.net.au</a>	information
Thalassaemia and other haemoglobinopathies	Genetic Health Services Victoria <a href="http://www.genetichealthvic.net.au/sections/Patients/?docid=68dcb73b-9469-4db6-9064-9a9300d353ae">http://www.genetichealthvic.net.au/sections/Patients/?docid=68dcb73b-9469-4db6-9064-9a9300d353ae</a>	Consumer information: Thalassaemia screening
	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/sections/12%20-%20Haemoglobinopathies%20WEB.pdf">http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/sections/12%20-%20Haemoglobinopathies%20WEB.pdf</a>	Clinician information: Genetics in Family Medicine - The Australian Handbook for General Practitioners: Haemoglobinopathies chapter
	Royal Women's Hospital <a href="http://www.thewomens.org.au/ThalassaemiaandAbnormalHaemoglobinsinPregnancy">http://www.thewomens.org.au/ThalassaemiaandAbnormalHaemoglobinsinPregnancy</a>	Clinical practice guideline: Thalassaemia and abnormal haemoglobins in pregnancy. Covers Thalassaemia screening, referring for testing and counselling, investigations and treatment and specific considerations
	World Health Organisation (WHO) <a href="http://www.who.int/genomics/public/Maphaemoglobin.pdf">http://www.who.int/genomics/public/Maphaemoglobin.pdf</a>	Global distribution of haemoglobin disorders
	Thalassaemia Australia <a href="http://www.thalassaemia.org.au/">http://www.thalassaemia.org.au/</a>	Consumer fact sheets on: Beta Thalassaemia, Alpha Thalassaemia, Haemoglobin E, Sickle Cell Anaemia, family planning. Available in: Arabic, Cantonese, Greek, English, Italian, Mandarin, Nuer, Sinhalese, Tamil and Vietnamese
Cystic Fibrosis testing	Genetic Health Services Victoria <a href="http://www.cfscreening.com.au/">http://www.cfscreening.com.au/</a>	Consumer and clinician information: Cystic fibrosis carrier screening program (population carrier screening)
	Genetic Health Services Victoria <a href="http://www.cfscreening.com.au/Documents/CF_brochure.pdf">http://www.cfscreening.com.au/Documents/CF_brochure.pdf</a>	Consumer brochure: Cystic Fibrosis carrier testing (population carrier screening)
	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/sections/09%20-%20Cystic%20fibrosis%20WEB.pdf">http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/sections/09%20-%20Cystic%20fibrosis%20WEB.pdf</a>	Clinician information. Genetics in Family Medicine: The Australian Handbook for General Practitioners. Cystic Fibrosis
	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/fact_sheets/09%20-%20Cystic%20fibrosis%20WEB.pdf">http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/fact_sheets/09%20-%20Cystic%20fibrosis%20WEB.pdf</a>	Consumer fact sheet from Genetics in Family Medicine: The Australian Handbook for General Practitioners. Cystic Fibrosis
Fragile X Genetic Screening	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/sections/11%20-%20Fragile%20X%20syndrome%20WEB.pdf">http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/sections/11%20-%20Fragile%20X%20syndrome%20WEB.pdf</a>	Clinician information. Genetics in Family Medicine: The Australian Handbook for General Practitioners. Fragile X syndrome
	Fragile X Association of Australia <a href="http://www.fragilex.org.au/">http://www.fragilex.org.au/</a>	Consumer information: Fragile X
Tay Sachs	<a href="http://www.genetichealthvic.net.au/Documents/PDF/TaySachsBrochure.pdf">http://www.genetichealthvic.net.au/Documents/PDF/TaySachsBrochure.pdf</a>	Consumer and clinician information: Carrier Testing for Tay Sachs and related conditions. For people with Ashkenazi Jewish ancestry

## TESTING IN PREGNANCY FOR FETAL ABNORMALITIES

Most babies are born healthy, but about 4% are born with a birth defect that may require medical care. There are a number of screening and diagnostic tests that are available to determine the risk of, or to diagnose, certain congenital problems in the fetus. However tests only have the capacity to screen for and diagnose some congenital problems.

It is important that if a woman or her partner has or is a carrier of a genetic condition, or there has previously been a congenital abnormality/genetic condition in another child, the woman is referred for genetic counselling as early as possible, preferably pre-pregnancy. This is because it can take considerable time to find the underlying gene mutations and to determine whether or not a prenatal test is available.

If a test is performed in the community, a copy of the results (if available) should accompany the woman to her first hospital visit.

*'It is important that if a woman or her partner has or is a carrier of a genetic condition, or there has previously been a congenital abnormality/genetic condition in another child, the woman is referred for genetic counselling as early as possible, preferably pre-pregnancy. This is because it can take considerable time to find the underlying gene mutations and to determine whether or not a prenatal test is available.'*

### Screening versus Diagnostic Tests

Screening tests can be performed to determine who may be at increased risk of having a baby with Down syndrome or some other chromosome abnormalities and neural tube defects. Low-risk screening test results do not exclude an abnormality, rather they indicate that the likelihood of a problem existing is low. If a screening test gives a comparatively high likelihood of a problem existing, a diagnostic test is offered.

Diagnostic tests can diagnose Down syndrome, most chromosomal abnormalities and certain genetic conditions and structural abnormalities.

*'If a test is performed in the community, a copy of the results (if available) should accompany the woman to her first hospital visit.'*

*Early in pregnancy, all women should receive appropriate written information concerning available screening (including potential risks and benefits, the difference between screening and diagnostic testing and possible costs to women). (Level II & IV evidence) – 3 Centres*

### Counselling

Community providers are encouraged to offer early advice and counselling around all tests but this is especially pertinent for screening and diagnostic tests for fetal abnormalities.

All parents should have the opportunity to consider these tests. SMCA should discuss the available routine tests, the nature of the test, the disease/s being tested for, the possibility of false positive and negative results, and the advantages and disadvantages of testing, taking into account maternal age, medical, family and pregnancy history.

Wherever possible, it is important that women are offered written material in their language and have knowledge of the local services and their cost.

Some reasons genetic counselling may be required or recommended are:

- If a woman wishes to discuss screening and testing further
- If a woman has a high-risk screening result
- If a woman or her partner has a genetic condition or a family history of a genetic condition that they wish to find out more about (including testing and the possible implications for pregnancy)
- Couples with a high risk of having a child with a genetic condition; for discussion about prenatal testing
- If a healthcare provider requires secondary advice

Further information and counselling for women, their families, SMCA and other healthcare providers is available from the Genetic Services at the hospitals and Genetic Health Services Victoria.

Genetic Services Contact Details				
RWH	MHW	SH	NH	Genetic Health Services Victoria
Ph: 8345 2180	Ph: 8458 4250	Ph: 8345 0346	NH does not provide in-house genetic services. SMCA should contact Genetic Services at RWH for information and advice	Ph: 8341 6201
Fax: 8345 2179	Fax: 8458 4254			Fax: 8341 6390

Maternal age is an important component of risk calculations in all screening tests.

A low-risk test result does not exclude an abnormality, rather it indicates the low likelihood of a problem existing.

Screening tests **do not diagnose** a condition.

### Down Syndrome and other Chromosomal Abnormalities

A woman's likelihood of having a fetus with Down syndrome and some other chromosomal abnormalities (such as Edwards (T18), Patau (T13)) increases with the age of the maternal eggs.

All women should be offered tests for Down syndrome.

*The offer of screening for Down syndrome should be made available to all pregnant women, irrespective of age. (Level III & IV evidence)- 3 Centres*

An 18-20 week fetal morphology ultrasound is a poor screen for Down syndrome.

*'Maternal age is an important component of risk calculations in all screening tests  
A low-risk test result does not exclude an abnormality, rather it indicates the low likelihood of a problem existing.  
Screening tests **do not diagnose** a condition.'*

*'All women should be offered tests for Down syndrome.'*

*'An 18-20 week fetal morphology ultrasound is a poor screen for Down syndrome.'*

## Risk by Age of Down Syndrome and other Chromosomal Abnormalities

Maternal age at delivery	*Chance of having a live born baby with Down Syndrome	**chance of having a live-born baby with a chromosomal abnormality
20-24 years	1 in 1411	1 in 506
25 years	1 in 1383	1 in 476
26 years	1 in 1187	1 in 476
27 years	1 in 1235	1 in 455
28 years	1 in 1147	1 in 435
29 years	1 in 1002	1 in 417
30 years	1 in 959	1 in 385
31 years	1 in 837	1 in 385
32 years	1 in 695	1 in 323
33 years	1 in 589	1 in 286
34 years	1 in 430	1 in 244
35 years	1 in 338	1 in 179
36 years	1 in 259	1 in 149
37 years	1 in 201	1 in 124
38 years	1 in 162	1 in 105
39 years	1 in 113	1 in 81
40 years	1 in 84	1 in 64
41 years	1 in 69	1 in 49
42 years	1 in 52	1 in 39
43 years	1 in 37	1 in 31
44 years	1 in 28	1 in 24
45 years	1 in 32	1 in 19

\* Morris JK, Mutton DE, and Alberman E (2002). Revised estimates of the maternal age specific live birth prevalence of Down syndrome. J Med Screen, 9, 2-6.

\*\* Hook EB (1981) Rates of chromosomal abnormalities. Obs Gyn 58 282-285

*'If a women decides to undertake screening for Down syndrome, only do one of Combined First Trimester Screening or Second Trimester Maternal Serum Screening.'*

*'Combined First Trimester Screening is not routinely available via the hospitals and needs to be ordered by the GP.'*

*'Ideally Combined First Trimester Screening blood test component is done in the 10<sup>th</sup> week and ultrasound done in the 12<sup>th</sup> week.'*

## Screening Tests for Down Syndrome

Screening						
Test	Timing	Tests for	Detection Rates	Costs	Results	Notes
Combined First Trimester Screening	Blood test component: between 9 weeks and 0 days and 13 weeks and 6 days	Screens for: <ul style="list-style-type: none"> <li>Down Syndrome (Trisomy 21)</li> <li>Edwards syndrome (Trisomy 18)</li> </ul> Calculates risk	Down syndrome <ul style="list-style-type: none"> <li>detection rate (sensitivity) is 90.5%</li> <li>false positive rate is 3.9%</li> <li>'Increased risk' threshold is <math>\geq 1</math> in 300</li> </ul> Edwards syndrome	Blood test component: <ul style="list-style-type: none"> <li>Medicare rebate is available however the woman is likely to have some out of pocket expenses</li> </ul>	Results are generally available within 7 days of the laboratory receiving the nuchal translucency screening report	<ul style="list-style-type: none"> <li>Offered to all women</li> <li>Only do one of Combined First Trimester Screening or Second Trimester Maternal Serum Screening</li> <li>Combined First Trimester Screening is not routinely available via the hospitals and needs to be ordered by the GP</li> <li>Ideally Combined First Trimester Screening blood test component is done in the 10<sup>th</sup> week and ultrasound done in the 12<sup>th</sup> week</li> <li>Combined First Trimester Screening requires coordination of the blood test component and ultrasound component.</li> </ul>
	Ultrasound component: between 11 weeks and 3 days and 13 weeks and 6 days	by measuring maternal free beta human chorionic gonadotrophin (free $\beta$ -hCG) and pregnancy associated plasma protein A (PAPP-A) and combining with maternal age and nuchal translucency measurement	Edwards syndrome <ul style="list-style-type: none"> <li>detection rate (sensitivity) is 67%</li> <li>False positive rate is 0.4%</li> <li>'Increased risk' threshold is <math>\geq 1</math> in 175</li> </ul>	Ultrasound component: <ul style="list-style-type: none"> <li>Medicare rebate is available however the woman is likely to have some out of pocket expenses</li> <li>Individual ultrasound services need to be contacted regarding costs</li> </ul>		
Second Trimester Maternal Serum Screening	15 weeks (can be done 14-20 weeks)	Screens for: <ul style="list-style-type: none"> <li>Down syndrome (Trisomy 21)</li> <li>Edwards syndrome</li> </ul>	Down syndrome: <ul style="list-style-type: none"> <li>detection rate (sensitivity) is 85%</li> <li>false positive rate is 6.8%</li> <li>'Increased risk'</li> </ul>	Medicare rebate is available, however the woman may have some out of pocket expenses	Results are generally available within 7 days of the laboratory receiving	Ultrasound results need to be faxed by the ultrasound service to the maternal serum screening laboratory in order for a result

		(Trisomy 18) <ul style="list-style-type: none"> <li>Neural tube defects</li> </ul> Calculates risk by measuring maternal Alpha fetoprotein (AFP), free beta human chorionic gonadotrophin (free $\beta$ -hCG), unconjugated estriol (uE3) and Inhibin A.	threshold $\geq 1$ in 250  Edwards syndrome: <ul style="list-style-type: none"> <li>detection rate (sensitivity) is 44%</li> <li>False positive rate is 0.5%</li> <li>'Increased risk' threshold <math>\geq 1</math> in 200</li> </ul> Neural tube defect: <ul style="list-style-type: none"> <li>detection rate (sensitivity) is 93%</li> <li>False positive rate is 3%</li> </ul>		the blood sample	to be generated <ul style="list-style-type: none"> <li>In view of this it is strongly suggested women are reviewed by the person who has ordered the test 1 week after the ultrasound to ensure a result has been generated</li> <li>For women enrolled in Shared Maternity Care, SMCA should indicate that the woman is a public patient to reduce out of pocket costs for the woman</li> </ul>
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<b>Maternal Serum Screening Laboratory Contact Details</b>
<b>Genetic Health Services Victoria</b>
Ph: 8341 6356
Fax: 8341 6389

*'Combined First Trimester Screening requires coordination of the blood test component and ultrasound component. Ultrasound results need to be faxed by the ultrasound service to the maternal serum screening laboratory in order for a result to be generated. In view of this it is strongly suggested women are reviewed by the person who has ordered the test 1 week after the ultrasound to ensure a result has been generated.'*



## Diagnostic Tests

Test	Timing	Indications	Miscarriage Risk	Results	Notes
Chorionic villus sampling (CVS)	Approximately 10-13 weeks (short window of time)	<p>Indications for diagnostic test:</p> <ul style="list-style-type: none"> <li>Screening shows increased risk of chromosome abnormality (e.g. Down Syndrome, Trisomy 18)</li> <li>Maternal age <math>\geq 37</math> years old at expected date of confinement</li> <li>Parental translocation</li> <li>Previous Trisomy</li> <li>Abnormal ultrasound findings</li> </ul>	1% to 3% additional risk of miscarriage (in addition to the risk of miscarriage for all pregnancies)	<ul style="list-style-type: none"> <li>CVS and Amniocentesis results are generally available within two weeks and results will be sent to the SMCA</li> </ul> <p><u>Fluorescent in situ hybridisation(FISH) analysis:</u></p> <ul style="list-style-type: none"> <li>Where there are strong indications of a fetal anomaly (eg. very high-risk screening result, fetal anomaly detected on T2 ultrasound) or late gestation, FISH analysis may also be performed to analyse samples collected by amniocenteses or CVS</li> <li>FISH gives a preliminary result in 48-72 hours but does not replace complete chromosomal analysis</li> </ul>	<ul style="list-style-type: none"> <li>CVS has a 1% risk of equivocal result (e.g. the risk of mosaicism – the presence of a mixture of cells with normal and abnormal karyotype - or maternal cell contamination of the sample</li> <li>If there is an indication for testing, there are no out of pocket costs for amniocentesis or CVS in the public system</li> <li>The choice between CVS and amniocentesis has implications if a woman later requests a termination of pregnancy (TOP) as an amniocentesis result is available later in pregnancy compared with a CVS result (surgical TOPs are usually only</li> </ul>
Amniocentesis	Ideally 15-16 weeks (can be done after 15 weeks gestation)	<ul style="list-style-type: none"> <li>Previous neural tube defects (diagnostic method of choice is specialised obstetric ultrasound)</li> <li>Disorders detected by DNA technology. For example Duchenne and Becker muscular dystrophy, myotonic dystrophy, fragile X, haemoglobinopathies and alpha and beta thalassaemia and sickle cell disease, haemophilia A or B, cystic fibrosis, Tay Sachs disease, neurological diseases such as spinal muscular atrophy, Huntington's disease</li> <li>Specific inborn errors of metabolism. There are many inborn errors of</li> </ul>	0.5% to 1% additional risk of miscarriage (in addition to the risk of miscarriage for all pregnancies)		

		metabolism diagnosable prenatally by chorionic villus sampling or amniocentesis, but an exact biochemical diagnosis is needed in the index case before such a prenatal test can be considered		<ul style="list-style-type: none"> <li>FISH analysis costs approximately \$175 and there is no Medicare rebate</li> <li>Patients requesting a preliminary result can also choose FISH analysis to get the quicker result.</li> </ul>	available up to approximately 18 weeks)
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### Arranging CVS and Amniocentesis

For follow-up of a high-risk screening test for Down syndrome or Edwards syndrome (Trisomy 18) a woman may choose to have a diagnostic test (chorionic villus sampling or amniocentesis) or have further counselling (and organise testing as decided) via genetic services. At RWH, MHW and SH, SMCA are able to arrange a diagnostic test directly with a hospital's ultrasound service as long as the woman has been adequately counselled (including advantages and disadvantages of diagnostic testing, the risks involved and implications of possible tests results). For women enrolled in pregnancy care at NH, this should be discussed with a senior obstetrician at the hospital. A woman's Rh status should be noted on the referral letter to ultrasound for CVS or amniocentesis.

<b>Ultrasound Services Contact Details</b> (to organise CVS/amniocentesis after adequate counselling has been provided)			
<b>RHW</b>	<b>MHW</b>	<b>SH</b>	<b>NH</b>
Ph: 8345 2250	Ph: 8458 4300/4328	Ph: 8345 1664	Ph: 8405 8000 (switchboard) and page Dr Andrew Ngu. If unavailable then page Obstetric Registrar
Fax: 8345 2259	Fax: 8458 4241	Fax: 8345 1665	

Referrals for amniocentesis and CVS can also be made via genetics services if discussion and further counselling is required or if a woman is unsure about whether to undertake diagnostic testing.

<b>Genetic Services Contact Details</b>				
<b>RWH</b>	<b>MHW</b>	<b>SH</b>	<b>NH</b>	<b>Genetic Health Services Victoria</b>
Ph: 8345 2180	Ph: 8458 4250	Ph: 8345 0346	NH does not provide in-house genetic services. SMCA should contact Genetic Services at RWH for information and advice	Ph: 8341 6201
Fax: 8345 2179	Fax: 8458 4254			Fax: 8341 6390

## Fetal Morphology Ultrasound (18-20 weeks)

Test	Timing	Indication	Looks For	Notes
Fetal Morphology Ultrasound	Routinely performed at 18-22 weeks	All pregnant women should be offered a fetal morphology ultrasound	<ul style="list-style-type: none"> <li>• Can detect some structural abnormalities including some neural tube, cardiac, gastrointestinal, limb, and central nervous system defects</li> <li>• Confirms the accuracy of the expected date of confinement</li> <li>• Looks at the location of the placenta</li> <li>• May also comment on cervical length (normal length &gt;2.5cm), ovaries and any uterine abnormalities</li> </ul>	<ul style="list-style-type: none"> <li>• If the placenta is found to be low-lying, a repeat ultrasound should be undertaken at about 32-34 weeks to identify a placenta praevia</li> <li>• Fetal morphology ultrasound is a poor screening test for Down Syndrome, with a sensitivity of only about 50%</li> <li>• Due to the limited capacity of the hospitals ultrasound services, preference is given to women with high-risk pregnancies. Therefore, a community ultrasound may need to be organised by a woman's SMCA and a copy of results should accompany the woman to her hospital visit</li> <li>• Costs may vary between community ultrasound providers and women may incur a cost for this service</li> <li>• If an abnormality is found on ultrasound in the community, follow-up or advice can be arranged by contacting the Genetics Service (MHW, RWH, SH) or Fetal Management Unit (RWH)/Perinatal Medicine Unit (MHW) or the Shared Care Coordinator who can facilitate this. This advice should be sought as soon as an abnormal result is reported</li> </ul>

## Access to Fetal Morphology Ultrasound

At NH routine fetal morphology ultrasounds are routinely arranged by the hospital Doctor at the first hospital visit.

At RWH, MHW and SH, routine fetal morphology ultrasounds are limited at the hospitals' own ultrasound departments. Therefore, at these hospitals, a community ultrasound may need to be organised by a woman's GP. Where a woman does not have a fetal morphology ultrasound organised either in the community or at the hospital by her first hospital visit, she will be advised to present to her GP to organise a community fetal morphology ultrasound referral.

As with all investigations, the referring practitioner is responsible for reviewing the result. A copy of results should accompany the woman to her next hospital visit.

If advice is required please contact the hospital (see section 'Management and Referral of Abnormal Findings').

*'At NH routine fetal morphology ultrasounds are routinely arranged by the hospital Doctor at the first hospital visit. At RWH, MHW and SH, routine fetal morphology ultrasounds are limited at the hospitals' own ultrasound departments. Therefore, at these hospitals, a community ultrasound may need to be organised by a woman's GP.'*

### Ultrasound Department Contact Details:

#### For Fetal Morphology Ultrasound

RHW	MHW	SH	NH Health Care Imaging
<ul style="list-style-type: none"> <li>External health providers are not able to directly access fetal morphology ultrasound bookings</li> <li>Department ultrasounds are allocated according to clinical and social need. This is based on the information provided in the GPs initial referral for pregnancy care</li> </ul>	GPs and obstetricians are able to organise ultrasounds by sending or faxing a written referral, however resources are limited and early booking is required.	<ul style="list-style-type: none"> <li>The capacity to perform fetal morphology ultrasounds at the hospital is very limited</li> <li>External health providers are not able to directly access fetal morphology ultrasound bookings</li> <li>Department ultrasounds are allocated according to clinical and social need. This is based on the information provided in the GPs initial referral for pregnancy care</li> <li>Consequently, many women will be advised to present to their GP for referral for a community ultrasound</li> </ul>	All women have this ultrasound organised by hospital Doctor at their first hospital visit
Ph: 8345 2250	Ph: 8458 4300 or 8458 4238	Ph: 8345 1664	Ph: 9408 2222
Fax: 8345 2259	Fax: 8458 4241	Fax: 8345 1665	Fax: 9408 2299

## “Soft Signs” on Ultrasound

Recent advances in ultrasound have led to the discovery of a growing number of minor abnormalities or “soft” markers such as choroid plexus cysts. When multiple anomalies are present then karyotyping of the fetus with amniocentesis should be discussed. The role of sonographically isolated “soft” markers on the other hand can be controversial, especially in younger women who have a low background risk of chromosomal abnormality. When such a “soft” marker is detected, the first priority is to exclude any associated abnormalities with a detailed anatomical survey of the mid-trimester fetus. At the hospitals this can be performed by specialist Obstetrician Gynaecologist Sonologist who will also direct any further investigations and follow-up. A Genetic Counselling Service is also available to provide the parents with information about the individual risks for that pregnancy, based on maternal age, other screening tests and the specific ultrasound finding or combination of findings.

## Resources

Prenatal screening and testing		
Prenatal screening and testing- general	Victorian Clinical Genetics Services Pathology <a href="http://www.vcgspathology.com.au/downloads/mss/Prenatal_Testing.pdf">http://www.vcgspathology.com.au/downloads/mss/Prenatal_Testing.pdf</a>	Consumer brochure: Prenatal Testing During Pregnancy (ultrasound, maternal serum screening, chorionic villus sampling, amniocentesis)
	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/sections/03%20-%20Testing%20and%20pregnancy%20WEB.pdf">http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/sections/03%20-%20Testing%20and%20pregnancy%20WEB.pdf</a>	Genetics in Family Medicine: The Australian Handbook for General Practitioners. Chapter 3: Testing and pregnancy
	National Health and Medical Research Council <a href="http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/fact_sheets/03%20-%20Testing%20if%20you%20are%20pregnant%20WEB.pdf">http://www.nhmrc.gov.au/files_nhmrc/file/your_health/egenetics/practioners/gems/fact_sheets/03%20-%20Testing%20if%20you%20are%20pregnant%20WEB.pdf</a>	Consumer information. Genetics in Family Medicine: The Australian Handbook for General Practitioners. Testing if you are pregnant. Includes screening and testing.
	Centre for Genetics Education (NSW Health) <a href="http://www.genetics.com.au/pdf/factsheets/fs17.pdf">http://www.genetics.com.au/pdf/factsheets/fs17.pdf</a>	Consumer fact sheet: Prenatal testing- an overview
	3 Centres <a href="http://3centres.com.au/guidelines/prenatal-screening-for-down-syndrome/">http://3centres.com.au/guidelines/prenatal-screening-for-down-syndrome/</a>	Clinician information:3 Centre Consensus Guidelines on Antenatal Care- Prenatal Screening for Down’s Syndrome
	Royal Australian and New Zealand College of Obstetricians and Gynaecologists (RANZCOG) <a href="http://www.ranzcog.edu.au/publications/statements/C-obs35.pdf">http://www.ranzcog.edu.au/publications/statements/C-obs35.pdf</a>	Clinician information: prenatal screening for fetal abnormalities
	Royal Australian and New Zealand College of Obstetricians and Gynaecologists (RANZCOG) <a href="http://www.ranzcog.edu.au/publications/statements/C-obs4.pdf">http://www.ranzcog.edu.au/publications/statements/C-obs4.pdf</a>	Clinician information: prenatal screening tests for trisomy 21 (Down syndrome), trisomy 18 (Edwards syndrome) and neural tube defects
Combined First Trimester Screening	Victorian Clinical Genetics Services Pathology <a href="http://www.vcgspathology.com.au/downloads/CombinedFirstTrimesterScreening.pdf">http://www.vcgspathology.com.au/downloads/CombinedFirstTrimesterScreening.pdf</a>	Consumer brochure and pathology request form: Combined First Trimester Screening
	Victorian Clinical Genetics Services Pathology <a href="http://www.vcgspathology.com.au/sections/MaternalSerumScreening/?docid=51a81179-f5d3-41ee-8892-992e00efe87d">http://www.vcgspathology.com.au/sections/MaternalSerumScreening/?docid=51a81179-f5d3-41ee-8892-992e00efe87d</a>	Links to consumer brochure and pathology request form: Combined First Trimester Screening. Available in: Arabic, Chinese, English, Somali, Turkish and Vietnamese

Second Trimester Maternal Serum Screening	Second Trimester Maternal Serum Screening patient information and pathology request forms are available by calling Victorian Clinical Genetic Services Pathology Ph: 8341 6303 or 8341 6357	
	Victorian Clinical Genetics Services Pathology <a href="http://www.vcgspathology.com.au/downloads/YourPregnancy-YourChoice.pdf">http://www.vcgspathology.com.au/downloads/YourPregnancy-YourChoice.pdf</a>	Consumer brochure on Second Trimester Maternal Serum Screening
Amniocentesis & CVS	Centre for Genetics Education (NSW Health) <a href="http://www.genetics.com.au/pdf/factsheets/fs17c.pdf">http://www.genetics.com.au/pdf/factsheets/fs17c.pdf</a>	Consumer fact sheet: Amniocentesis & CVS
	Royal Women's Hospital <a href="http://www.thewomens.org.au/Amniocentesis">http://www.thewomens.org.au/Amniocentesis</a>	Consumer information: amniocentesis
	Royal Women's Hospital <a href="http://www.thewomens.org.au/ChorionicVillusSamplingCVS">http://www.thewomens.org.au/ChorionicVillusSamplingCVS</a>	CVS patient information
Ultrasound	Royal Women's Hospital <a href="http://www.thewomens.org.au/Ultrasound">http://www.thewomens.org.au/Ultrasound</a>	Consumer fact sheet: ultrasound. Available in: Arabic, Chinese, Croation, English, Khmer, Serbian, Tigrinian, Turkish and Vietnamese
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_tests_ultrasound">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pregnancy_tests_ultrasound</a>	Consumer information: Ultrasound
	Centre for Genetics Education (NSW Health) <a href="http://www.genetics.com.au/pdf/factsheets/fs17a.pdf">http://www.genetics.com.au/pdf/factsheets/fs17a.pdf</a>	Consumer information: prenatal ultrasound
<b>Chromosomal abnormalities</b>		
Trisomy Disorders (Down syndrome, Edward syndrome, Patau syndrome)	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Birth_defects_trisomy_disorders">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Birth_defects_trisomy_disorders</a>	Consumer fact sheet: Trisomy disorders
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Down_syndrome_explained?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Down_syndrome_explained?open</a>	Consumer fact sheet: Down syndrome
	Centre for Genetics Education (NSW Health) <a href="http://www.genetics.com.au/pdf/factsheets/fs28.pdf">http://www.genetics.com.au/pdf/factsheets/fs28.pdf</a>	Consumer fact sheet: Down syndrome
	Centre for Genetics Education (NSW Health) <a href="http://www.genetics.com.au/pdf/factsheets/FS30.pdf">http://www.genetics.com.au/pdf/factsheets/FS30.pdf</a>	Consumer fact sheet: Edwards syndrome
	Centre for Genetics Education (NSW Health) <a href="http://www.genetics.com.au/pdf/factsheets/fs29.pdf">http://www.genetics.com.au/pdf/factsheets/fs29.pdf</a>	Consumer fact sheet: Patau syndrome
<b>Neural tube defects</b>		
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/BHCV2/bhcArticles.nsf/pages/Birth_defects_central_nervous_system?OpenDocument">http://www.betterhealth.vic.gov.au/BHCV2/bhcArticles.nsf/pages/Birth_defects_central_nervous_system?OpenDocument</a>	Consumer fact sheet: Birth defects - central nervous system Includes information on spina bifida, anencephaly and encephalocele
	Centre for Genetics Education (NSW Health) <a href="http://www.genetics.com.au/pdf/factsheets/fs59.pdf">http://www.genetics.com.au/pdf/factsheets/fs59.pdf</a>	Consumer fact sheet: Neural tube defects- spina bifida and anencephaly
<b>Terminations</b>		
Victorian Legislation <a href="http://www.legislation.vic.gov.au/Domino/Web_Notes/LDMS/PubStatbook.nsf/f932b66241ecf1b7ca256e9200e23be/BB2C8223617EB6A8CA2574EA001C130A/\$FILE/08-58a.pdf">http://www.legislation.vic.gov.au/Domino/Web_Notes/LDMS/PubStatbook.nsf/f932b66241ecf1b7ca256e9200e23be/BB2C8223617EB6A8CA2574EA001C130A/\$FILE/08-58a.pdf</a>		Abortion Law Reform Act 2008

## MANAGEMENT AND REFERRAL OF ABNORMAL FINDINGS

It is the primary responsibility of the provider ordering a test or noting any abnormal finding to ensure appropriate follow-up, communication and management. However, all providers should check that follow-up of any incomplete or abnormal investigation results or findings have occurred.

Community and hospital providers need to clearly document, date and sign, the following information in the hand held pregnancy record:

- investigations ordered
- results of investigations
- abnormal findings
- action taken

All providers must record routine examination findings in the hand held pregnancy record. This includes:

- blood pressure reading
- measurement of fundal height in centimetres
- fetal movements from 20 weeks
- fetal auscultation from 20 weeks
- checking fetal presentation from 30 weeks
- leg oedema if present
- consider urine testing for proteinuria

### Referral of Problems

All providers of Shared Maternity Care have a responsibility to appropriately assess, document and respond to problems that arise during a woman's pregnancy. In general, the community provider should consider referring the woman for hospital assessment at the Emergency Department or Pregnancy Assessment Service or for additional clinical consultation if the pregnancy deviates from normal.

This should be based on individual clinical assessment by the SMCA.

### The Shared Maternity Care Coordinator

The Shared Maternity Care Coordinator can assist in obtaining results, informing SMCA of management that has taken place and facilitating assistance for SMCA. This is appropriate for non-urgent situations.

The Shared Maternity Care Coordinator role varies between health services and, depending on the hospital, the Shared Maternity Care Coordinator may be able to assist with the following:

- organising extra appointments for additional clinical consultation with obstetric Doctors, allied health, psychiatry, genetics and physicians
- non-urgent reassessment of community ultrasound and other pathology results by the relevant department

*'It is the primary responsibility of the provider ordering a test or noting any abnormal finding to ensure appropriate follow-up, communication and management. However, all providers should check that follow-up of any incomplete or abnormal investigation results or findings have occurred.*

*Community and hospital providers need to clearly document, date and sign, the following information in the hand held pregnancy record:*

- *investigations ordered*
- *results of investigations*
- *abnormal findings*
- *action taken'*

Shared Maternity Care Coordinator Contact Details			
RWH	MHW	SH	NH
Ph: 8345 2129	Ph: 8458 4120	Ph: 8345 1616 Mob: 0466 130 457	Ph: 8405 8772
Fax: 8345 2130	Fax: 8458 4205	Fax: 8345 1691	Fax: 8405 8766
Email: <a href="mailto:sharedcare@thewomens.org.au">sharedcare@thewomens.org.au</a>	Email: <a href="mailto:sharedcare@mercy.com.au">sharedcare@mercy.com.au</a>	Email: <a href="mailto:maternitysharedcare@wh.org.au">maternitysharedcare@wh.org.au</a>	Email: <a href="mailto:maternitysharedcare@nh.org.au">maternitysharedcare@nh.org.au</a>

For more immediate clinical advice or review, refer to the Emergency Department, Pregnancy Day Assessment Service or contact the Registrar of the team/day via the hospital switchboard.

### Emergency Department Assessment (24 hours/day)

Each participating hospital's Emergency Department is available 24 hours a day for assessment of urgent antenatal or postnatal problems. Referral by phone or letter is expected and appreciated. SMCA will receive a letter/communication in the hand held pregnancy record within 48 hours of the woman's attendance at a hospital Emergency Department.

Referral to the hospital Emergency Department is recommended if the woman has:

- first trimester bleeding or pain that cannot be appropriately diagnosed and managed in the community
- threatened preterm labour ( $\leq 37$  weeks)
- undiagnosed abdominal pain
- preterm rupture of membranes
- antepartum haemorrhage
- unusual migraines, visual disturbances
- seizures
- problems usually seen in Pregnancy Assessment Services, out of hours
- a requirement for anti-D immunoglobulin following a sensitising event

The above list is not exhaustive.

Emergency Department Contact Details			
Telephone advice is also available 24 hours a day for SMCA, GPs and women			
RWH	MHW	SH	NH
Ph: 8345 3636 or 8345 3637	Ph: 8458 4000 or 8458 4005	Ph: 8345 1596 (For GP/SMCA use only)	Ph: 8405 2610 (For GP/SMCA use only)
Fax: 8345 3645	Fax: 8458 4205	Fax: 8345 1607	Fax: 8405 8944



## Pregnancy Assessment Services (business hours)

Each hospital has a Pregnancy Assessment Services that provides maternal and fetal assessment including:

- blood pressure monitoring and pathology
- cardiotocograph (CTG)
- ultrasound. May be to check:
  - amniotic fluid index (AFI) for assessment of placental function
  - systolic/diastolic ratio (SDR) for assessment of possible growth restriction
  - fetal presentation if non-cephalic presentation at  $\geq 36$  weeks
- external cephalic version (ECV) for management of breech presentation at  $\geq 36$  weeks
- obstetric assessment
- arrangement of ultrasound for fetal growth and wellbeing if indicated

*'Each hospital has a Pregnancy Assessment Services that provides maternal and fetal assessment. Hours vary between services but are generally within business hours.'*

Referral to the Pregnancy Assessment Service is recommended if the woman has:

- hypertension (when systolic BP is 140 mmHg and/or diastolic BP is 90 mmHg or there is an incremental rise of  $\geq 30$  mmHg systolic or 15 mmHg diastolic – 3 Centres)
- fundal height unusually large or small (2 cm more or less than for dates or significant deviation from growth pattern)
- intractable vomiting
- decrease in fetal movements
- jaundice or severe pruritis
- non-cephalic presentation  $\geq 36$  weeks gestation

The above list is not exhaustive and this service does not replace referral to the hospital Emergency Department for urgent problems. SMCA are encouraged to phone the service to discuss with a senior Midwife any concerns and how they are best managed. The outcome of each visit will be documented in a woman's hand held pregnancy record.

<b>Pregnancy Assessment Services Contact Details</b>				
Hours vary between services but are generally within business hours				
Outside of these times, women should be referred to the Emergency Department				
	<b>RWH</b> <b>Pregnancy Day Care</b> <b>Centre</b>	<b>MHW</b> <b>Mercy Perinatal Centre</b>	<b>SH</b> <b>Pregnancy Day</b> <b>Stay Unit</b>	<b>NH</b> <b>Pregnancy Assessment and Review</b> <b>Day Stay</b>
	Ph: 8345 2184	Ph: 8458 4267	Ph: 8345 1029	Ph: 8405 8205
Hours of operation	Mon-Fri: 9am-5pm Sat: 8am-12pm	Mon-Fri: 9am-5.30 pm Sat: 8am-4.30 pm (by appointment only on Sat)	Mon-Fri: 8am-5pm	Mon, Tues, Thurs: 8am-4pm
How to refer	SMCA are advised to refer via phone			Ph: 8405 8000 (switchboard) and ask for Labour Ward Registrar

## The Registrar (24 hours/day)

The Registrar of the team caring for the woman, or the on-call Obstetric Registrar, can be contacted directly to discuss urgent or complex clinical issues. To contact the Registrar, phone the hospital switchboard and ask for the Obstetric Registrar. Alternatively, for non-urgent queries during business hours, SMCA can contact the Shared Maternity Care Coordinator.

Hospital Switchboard Contact Details			
RWH	MHW	SH	NH
Ph: 8345 2000	Ph: 8458 4444	Ph: 8345 6666	Ph: 8405 8000

## Abnormal Results: Test for Fetal Abnormalities

Management of screening tests (e.g. Combined First Trimester Screening, Second Trimester Maternal Serum Screening) requires great vigilance from both community and hospital providers. It is important that women are counselled and the results are documented, communicated and followed up adequately. The Combined First Trimester Screen requires coordination of the blood component and ultrasound component of the investigation. To generate a result, ultrasound findings need to be faxed by the ultrasound service to Genetic Health Services Victoria's maternal serum screening laboratory. In the event of any concerns or abnormal results, Genetics Services at the hospital can be contacted to facilitate further advice

It is strongly suggested that women are reviewed by the person who has ordered the Combined First Trimester Screen one week after the ultrasound to ensure a result has been generated.

For follow-up of a high-risk screening test for Down syndrome or Edwards syndrome (Trisomy 18) a woman may choose to have a diagnostic test (chorionic villus sampling (CVS) or amniocentesis) and or have further counselling via genetic services. At RWH, MHW and SH, SMCA are able to arrange a diagnostic test directly with a hospital's ultrasound service as long as the woman has been adequately

counselled. For women enrolled in pregnancy care at NH, this should be discussed with a senior obstetrician at the hospital. A woman's Rh status should be noted on the referral letter to ultrasound for CVS or amniocentesis.

For follow up of a high risk result for neural tube defects a tertiary centre ultrasound is required for diagnosis. Tertiary ultrasounds can be facilitated by contacting the Shared Maternity Care Coordinator, the Obstetric Registrar or the ultrasound department.

For more information, refer to the [TESTING IN PREGNANCY FOR FETAL ABNORMALITIES](#) section of these Guidelines.

*'It is strongly suggested that women are reviewed by the person who has ordered the Combined First Trimester Screen one week after the ultrasound to ensure a result has been generated'*

<b>Ultrasound Services Contact Details</b> (to organise CVS/amniocentesis or tertiary ultrasound after adequate counselling has been provided)			
<b>RHW</b>	<b>MHW</b>	<b>SH</b>	<b>NH</b>
Ph: 8345 2250	Ph: 8458 4300/4328	Ph: 8345 1664	Ph: 8405 8000 (switchboard) and page Dr Andrew Ngu. If unavailable then page Obstetric Registrar
Fax: 8345 2259	Fax: 8458 4241	Fax: 8345 1665	

## Genetics Services

Genetics services are available at RWH and MHW with a limited service at SH. NH does not provide in-house genetics services. For women enrolled in pregnancy care at NH, SMCA should contact Genetic Services at RWH. These services can be contacted during business hours to facilitate advice, counselling, referral or management of abnormal test results. At SH, the Shared Maternity Care Coordinator can assist in organising a genetic counselling appointment. SMCA will be informed regarding the outcome of a woman's appointment.

Genetic Health Services Victoria also has genetic counselling/advice service for both families and health professionals.

<b>Genetic Services Contact Details</b>				
<b>RWH</b>	<b>MHW</b>	<b>SH</b>	<b>NH</b>	<b>Genetic Health Services Victoria</b>
Ph: 8345 2180	Ph: 8458 4250	Ph: 8345 0346	NH does not provide in-house genetic services. SMCA should contact Genetic Services at RWH for information and advice	Ph: 8341 6201
Fax: 8345 2179	Fax: 8458 4254			Fax: 8341 6390

## Abnormality on Ultrasound

In non-urgent situations, appropriate follow-up for an abnormality found on an ultrasound organised by a SMCA can be facilitated by the Shared Maternity Care Coordinator. This includes when a SMCA is unsure of the interpretation of findings on an ultrasound they have ordered, if a tertiary ultrasound is required or if further counselling or consultation is required.

Please contact the Shared Maternity Care Coordinator with the appropriate patient and ultrasound information to facilitate follow-up. The Registrar, Genetics Service or hospital ultrasound department can also be contacted for advice (contact details above).

## High-Risk Pregnancies

As tertiary maternity centres, RWH and MHW have units that manage pregnancies involving significant fetal abnormalities or women with complicated pregnancies due to high-risk conditions (eg. significant heart disease). If a fetal abnormality has been detected on ultrasound, these units can be contacted for advice.

High-Risk Pregnancy Units Contact Details	
<b>RWH</b> <b>Fetal Management Unit</b>	<b>MHW</b> <b>Perinatal Medicine Unit</b>
Ph: 8345 2158	Ph: 8458 4248
Fax: 8345 2139	Fax: 8458 4504

## Termination of Pregnancy

When termination of pregnancy is to be considered for any reason, referral should be made as early as possible, even if the diagnosis is uncertain and/or the woman is not yet sure of her decision. This allows for completing any diagnostic work-up and specialist advice as soon as possible, so that if termination of pregnancy is the eventual decision it may be done as early as possible, to maximise treatment options. When antenatal diagnosis is indicated, some women may prefer CVS to amniocentesis, so that an earlier result may be obtained and abortion undertaken earlier if warranted.

RWH, SH and NH provide termination services; they are not available at MHW. MHW provides the full range of screening and investigations for fetal abnormality, but refer women elsewhere for advice and counselling if they wish to consider pregnancy termination for any reason.

In the public system, surgical abortion and abortion for “psychosocial” indications is available only prior to 18 weeks gestation. Abortion may be performed after this gestation and even after 24 weeks if a fetal abnormality or other serious condition is diagnosed; in these cases referral should be made via the relevant hospital’s antenatal or genetics service.

The Abortion Law Reform Act 2008 provides that termination of pregnancy may be performed after 24 weeks under certain conditions, including the need for a second opinion and the woman’s circumstances to be taken into account. The Act also describes a Doctor’s statutory duties relating to referral in instances where they may hold a conscientious objection.

*‘The Abortion Law Reform Act 2008 provides that termination of pregnancy may be performed after 24 weeks under certain conditions, including the need for a second opinion and the woman’s circumstances to be taken into account. The Act also describes a Doctor’s statutory duties relating to referral in instances where they may hold a conscientious objection.’*

## Other Abnormal Findings

### Gestational Diabetes

If a Glucose Challenge Test (GCT) result is positive, a Glucose Tolerance Test (GTT) is usually required to diagnose Gestational Diabetes. If a SMCA diagnoses Gestational Diabetes, the Shared Maternity Care Coordinator needs to be informed in order to make appropriate hospital appointments with Diabetes Educators and an Obstetrician. If Gestational Diabetes develops, Shared Maternity Care is usually ceased (unless individual arrangement is made between SMCA and the hospital).

*'If a Glucose Challenge Test (GCT) result is positive, a Glucose Tolerance Test (GTT) is usually required to diagnose Gestational Diabetes'.*

### Group B Streptococcus (GBS)

If the GBS swab result is positive and the woman is asymptomatic, antenatal treatment is not required and the hospital will administer intravenous antibiotic treatment (usually Penicillin) at the onset of labour. SMCA should remind women with a positive GBS screen result to present to hospital early in labour.

### Infectious Diseases in Pregnancy

Each hospital has access to infectious disease physician advice. For urgent assessment of an infectious illness or exposure to an infectious disease, women should be referred to the Emergency Department or the Registrar of the day should be contacted for advice. If a non-urgent infectious disease appointment is required, contact the Shared Maternity Care Coordinator to arrange.

### Varicella exposure and infection

Fetal effects: "Varicella infection during the first trimester of pregnancy confers a small risk of miscarriage. Maternal infection before 20 weeks may rarely result in the fetal varicella zoster syndrome, with the highest risk (2%) occurring at 13–20 weeks. Clinical manifestations include growth retardation, cutaneous scarring, limb hypoplasia and cortical atrophy of the brain. Intrauterine infection can also result in herpes zoster in infancy. This occurs in less than 2% of infants. The highest risk is associated with infection in late pregnancy. In the third trimester, maternal varicella may precipitate the onset of premature labour. Severe maternal varicella and pneumonia at any stage of pregnancy can cause fetal death." (1)

Maternal effects: Pregnant women who are not immune are at high-risk of severe disease and complications

SMCA should refer susceptible pregnant women who have been exposed to varicella during pregnancy for specialist obstetric advice by referring the women to the Emergency Department. Women may be offered zoster immune globulin (VZIG) and antivirals (famciclovir, valaciclovir or aciclovir), especially where delivery is imminent. Where varicella develops in pregnancy, early medical review within 24 hours of rash onset is indicated via the Emergency Department.

## Human Parvovirus B19 (Slapped Cheek) exposure and infection

Parvovirus infection in the first 20 weeks of pregnancy can cause fetal anaemia with hydrops fetalis. Fetal death occurs in less than ten per cent of these cases. (2)

“Pregnant women who have been exposed to parvovirus infection should be offered serological testing for parvovirus-specific IgG to determine their susceptibility. The diagnosis of parvovirus infection is usually made, serologically, by demonstration of IgG seroconversion and/or the presence of parvovirus IgM. IgM is usually detectable within 1-3 weeks of exposure and lasts for 2-3 months.” (3) Repeat testing in 10-14 days may be required.

If diagnosed with Parvovirus, women should be referred for prompt ultrasound and obstetric review. This may be facilitated by the Shared Maternity Care Coordinator. If further management is required, including serial ultrasound, this will be arranged by the hospital and Shared Maternity Care would usually be ceased (unless an individual arrangement is made between SMCA and the hospital).

## References:

- 1 The blue book: guidelines for the control of infectious diseases Communicable Diseases Section, Victorian Department of Human Services, 2005. P. 25
- 2 The blue book: guidelines for the control of infectious diseases Communicable Diseases Section, Victorian Department of Human Services, 2005. P. 53
- 3 Gilbert, GL. Parvovirus B19 infection and its significance in pregnancy. Communicable Diseases Intelligence. 24, 2000.

## Resources

The resources section below includes clinical practice guidelines for a range of other abnormal findings during pregnancy such as red cell antibodies in pregnancy, iron deficiency and vitamin D deficiency.

Medicines in Pregnancy	Mercy Hospital for Women <a href="http://www.mercy.com.au/files/NRR6CEQQCO/Psychotropic%20drugs%20%20pregnancy%202nd%20Edn.pdf">http://www.mercy.com.au/files/NRR6CEQQCO/Psychotropic%20drugs%20%20pregnancy%202nd%20Edn.pdf</a>	Psychotropic Medication in Pregnancy/Lactation
	Royal Women’s Hospital Pregnancy and Breastfeeding Medicines Guide Available from Pharmacy Department Ph: 9345 3190 E: <a href="mailto:rwph.pharmacy@thewomens.org.au">rwph.pharmacy@thewomens.org.au</a>	
	Note: In 2011, a Psychotropic Medicines resources website and phone line will be introduced at RWH as a statewide service	
	Therapeutic Goods Administration <a href="http://www.tga.gov.au/docs/pdf/medpreg.pdf">http://www.tga.gov.au/docs/pdf/medpreg.pdf</a>	Clinician information: Prescribing medicines in pregnancy. An Australian categorisation of risk of drug use in pregnancy
Gestational Diabetes	Royal Women’s Hospital <a href="http://www.thewomens.org.au/DiabetesMellitusManagementofGestationalDiabetes">http://www.thewomens.org.au/DiabetesMellitusManagementofGestationalDiabetes</a>	Gestational Diabetes Clinical Practice Guideline
	Diabetes Australia <a href="http://www.diabetesvic.org.au/LinkClick.aspx?fileticket=hwxcO7vLWuc%3d&amp;tabid=164">http://www.diabetesvic.org.au/LinkClick.aspx?fileticket=hwxcO7vLWuc%3d&amp;tabid=164</a>	Gestational Diabetes Patient Fact sheet

	National Institute for Health and Clinical Excellence (UK) <a href="http://www.nice.org.uk/nicemedia/pdf/CG063Guidance.pdf">http://www.nice.org.uk/nicemedia/pdf/CG063Guidance.pdf</a>	Clinical guidelines: Management of Diabetes and its complications from pre-conception to the postnatal period
	Australasian Diabetes in Pregnancy Society <a href="http://www.adips.org/images/stories/documents/adips_pregdm_guidelines.pdf">http://www.adips.org/images/stories/documents/adips_pregdm_guidelines.pdf</a>	Consensus guidelines for the management of patients with of type 1 and type 2 diabetes in relation to pregnancy
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Gestational_diabetes?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Gestational_diabetes?open</a>	Patient information: Gestational Diabetes
	Royal Australian and New Zealand College of Obstetricians and Gynaecologists (RANZCOG) <a href="http://www.ranzcog.edu.au/publications/statements/C-obs7.pdf">http://www.ranzcog.edu.au/publications/statements/C-obs7.pdf</a>	Clinician information: diagnosis of Gestational Diabetes Mellitus
Group B Streptococcus (GBS)	Royal Women's Hospital <a href="http://www.thewomens.org.au/GBSColonisationAntenatalIntrapartumStrategiestoPreventEarlyOnsetNeonatalSepsis">http://www.thewomens.org.au/GBSColonisationAntenatalIntrapartumStrategiestoPreventEarlyOnsetNeonatalSepsis</a>	GBS Clinical Practice Guideline
	Royal Australian and New Zealand College of Obstetricians and Gynaecologists (RANZCOG) <a href="http://www.ranzcog.edu.au/publications/statements/C-obs19.pdf">http://www.ranzcog.edu.au/publications/statements/C-obs19.pdf</a>	Clinician information: screening and treatment for Group B Streptococcus in pregnancy
Varicella	Victorian Department of Health <a href="http://www.health.vic.gov.au/ideas/bluebook/chicken_pox">http://www.health.vic.gov.au/ideas/bluebook/chicken_pox</a>	Guidelines for the control of infectious diseases (Blue Book)- Varicella
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Chickenpox?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Chickenpox?open</a>	Consumer information: Varicella
Parvovirus	Australian Department of Health and Ageing <a href="http://www.health.gov.au/internet/main/publishing.nsf/Content/cda-pubs-cdi-2000-cdi2403s-cdi24msa.htm">http://www.health.gov.au/internet/main/publishing.nsf/Content/cda-pubs-cdi-2000-cdi2403s-cdi24msa.htm</a>	Clinician information: Parvovirus B19 infection and its significance in pregnancy
	Victorian Department of Health and Ageing <a href="http://www.health.vic.gov.au/ideas/bluebook/erythema">http://www.health.vic.gov.au/ideas/bluebook/erythema</a>	Guidelines for the control of infectious diseases (Blue Book)- Parvovirus
	Victorian Department of Health and Ageing <a href="http://www.health.vic.gov.au/ideas/bluebook/erythema/erythema_pregnant_info">http://www.health.vic.gov.au/ideas/bluebook/erythema/erythema_pregnant_info</a>	Consumer information: Slapped cheek infection information sheet for pregnant women
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Slapped_face_disease?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Slapped_face_disease?open</a>	Consumer fact sheet: Slapped cheek infection
Red Cell antibodies and Rh D immunoglobulin (anti-D)	Royal Women's Hospital <a href="http://www.thewomens.org.au/RedCellAntibodyTestingInPregnancy">http://www.thewomens.org.au/RedCellAntibodyTestingInPregnancy</a>	Clinician information: A guide to red cell antibody screening
	Royal Women's Hospital <a href="http://www.thewomens.org.au/RhDImmunoglobulinObstetrics">http://www.thewomens.org.au/RhDImmunoglobulinObstetrics</a>	Guides the administration of anti-D to Rh D negative pregnant women including antenatal administration for sensitising events and antenatal prophylaxis
	Red Cross Blood Service	Transfusion medicine manual- Pregnancy and Anti-D. Includes:

	<a href="http://manualtransfusioncomau.ozstaging.com/Pregnancy-and-Anti-D.aspx">http://manualtransfusioncomau.ozstaging.com/Pregnancy-and-Anti-D.aspx</a>	Guidelines for the use of Rh Immunoglobulin, Anti-D testing in pregnancy, frequently asked questions and educational support material
	Australian Red Cross Blood Service <a href="http://manualtransfusioncomau.ozstaging.com/admin/file/content2/c7/You%20and%20Your%20Baby%20brochure.pdf">http://manualtransfusioncomau.ozstaging.com/admin/file/content2/c7/You%20and%20Your%20Baby%20brochure.pdf</a>	Consumer information. You and your baby: important information for Rh (D) negative women
	Australian Red Cross Blood Service <a href="http://manualtransfusioncomau.ozstaging.com/admin/file/content2/c7/HDN%20brochure.pdf">http://manualtransfusioncomau.ozstaging.com/admin/file/content2/c7/HDN%20brochure.pdf</a>	Consumer information: Important information for Rh (D) Negative Women: Prevention of Haemolytic Disease of the Newborn. For women who experience early fetal loss
	National Blood Authority <a href="http://www.nba.gov.au/pubs/pdf/glines-anti-d.pdf">http://www.nba.gov.au/pubs/pdf/glines-anti-d.pdf</a>	Clinician information: Guidelines on the prophylactic use of Rh D immunoglobulin (anti-D) in obstetrics
	Royal Australian and New Zealand College of Obstetricians and Gynaecologists (RANZCOG) <a href="http://www.ranzcog.edu.au/publications/statements/C-obs6.pdf">http://www.ranzcog.edu.au/publications/statements/C-obs6.pdf</a>	Clinician information: guidelines for the use of Rh D Immunoglobulin (anti-D) in obstetrics in Australia
Iron deficiency	Royal Women's Hospital <a href="http://www.thewomens.org.au/IronDeficiencyinPregnancy">http://www.thewomens.org.au/IronDeficiencyinPregnancy</a>	Clinical Practice Guideline: Information on when to treat and supplementation information
	Royal Women's Hospital <a href="http://www.thewomens.org.au/Ironpregnancy">http://www.thewomens.org.au/Ironpregnancy</a>	Consumer fact sheet: Iron in pregnancy
Vitamin B12	Royal Women's Hospital <a href="http://www.thewomens.org.au/VitaminB12inPregnancy">http://www.thewomens.org.au/VitaminB12inPregnancy</a>	Clinical Practice Guideline: Includes when to check Vitamin B12 levels and algorithm for management of low or indeterminate vitamin B12 levels
Vitamin D	Victorian Department of Health <a href="http://www.health.vic.gov.au/chiefhealthofficer/publications/low_vitamin_d_med.htm">http://www.health.vic.gov.au/chiefhealthofficer/publications/low_vitamin_d_med.htm</a>	Clinician information: Low Vitamin D in Pregnancy- Key Messages for Doctors, Nurses and Allied Health
	Vitamin D - antenatal screening <a href="http://www.thewomens.org.au/VitaminDAntenatalScreening">http://www.thewomens.org.au/VitaminDAntenatalScreening</a>	Information on Vitamin D deficiency, screening and treatment
	Royal Women's Hospital <a href="http://www.thewomens.org.au/VitaminDandpregnancy">http://www.thewomens.org.au/VitaminDandpregnancy</a>	Consumer fact sheet: Vitamin D and pregnancy
Terminations	Victorian Legislation <a href="http://www.legislation.vic.gov.au/Domino/Web_Notes/LDMS/PubStatbook.nsf/f932b66241ecf1b7ca256e9200e23be/BB2C8223617EB6A8CA2574EA001C130A/\$FILE/08-58a.pdf">http://www.legislation.vic.gov.au/Domino/Web_Notes/LDMS/PubStatbook.nsf/f932b66241ecf1b7ca256e9200e23be/BB2C8223617EB6A8CA2574EA001C130A/\$FILE/08-58a.pdf</a>	Abortion Law Reform Act 2008



## MENTAL HEALTH AND WELLBEING

For mental health issues, there are a number of pathways and services that can be accessed to support SMCA and women depending on urgency. For women who require psychiatric care during pregnancy (for example, women with bipolar disorder, schizophrenia, severe depression or currently taking antipsychotic medication or mood stabilisers), referral pre-pregnancy or early in pregnancy is recommended, noting current and past psychiatric history.

Adult mental health services operate a range of services, both urgent and non-urgent, including Crisis Assessment and Treatment (CAT) Teams and Primary Mental Health Teams. Most services are delivered on an area basis, depending on where a patient lives.

### **Crisis Assessment and Treatment (CAT) Teams (urgent)**

CAT teams operate 24 hours a day and provide urgent community-based assessment and short-term treatment interventions to people in psychiatric crisis. CAT services have a key role in deciding the most appropriate treatment option and in screening all potential inpatient admissions.

CAT teams are a component of adult mental health services and can be accessed by anyone (contact details below). CAT teams are also attached to most Emergency Departments.

### **Primary Mental Health Teams (non urgent)**

In non urgent situations, Primary Mental Health Teams provide consultation for women (including psychiatric assessment, feedback and development of a treatment plan) and advice to primary health services such as GPs and community health centres. They do not provide case management. Primary Mental Health Services are a component of adult mental health services (contact details on following page).

*'Adult mental health services operate a range of services, both urgent and non-urgent, including Crisis Assessment and Treatment (CAT) Teams and Primary Mental Health Teams. CAT teams operate 24 hours a day and provide urgent community-based assessment and short-term treatment interventions to people in psychiatric crisis.'*

<b>Adult Mental Health Service Areas and Local Government Areas</b> 24 hour psychiatric triage information, assessment and referral Includes CAT Teams and Primary Mental Health Teams			
<b>Mental Health Service</b>	<b>Local Government Areas</b>	<b>Ph:</b>	<b>Website</b>
Northern	Whittlesea Darebin	1300 874 243 (1300 TRIAGE)	<a href="http://www.health.vic.gov.au/mentalhealth/services/adult/northern-a.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/northern-a.htm</a>
North West	Hume Moreland		<a href="http://www.health.vic.gov.au/mentalhealth/services/adult/northwest-a.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/northwest-a.htm</a>
Mid West	Melton Brimbank		<a href="http://www.health.vic.gov.au/mentalhealth/services/adult/midwest-a.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/midwest-a.htm</a>
Inner West	Moonee Valley Melbourne		<a href="http://www.health.vic.gov.au/mentalhealth/services/adult/inwest-a.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/inwest-a.htm</a>
Inner Urban East	Yarra Boroondara	1300 558 862	<a href="http://www.health.vic.gov.au/mentalhealth/services/adult/inurbaneast-a.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/inurbaneast-a.htm</a>
South West	Wyndham Hobsons Bay Maribyrnong	1300 657 259	<a href="http://www.health.vic.gov.au/mentalhealth/services/adult/southwest-a.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/southwest-a.htm</a>
North East	Nillumbik Banyule	1300 859 789	<a href="http://www.health.vic.gov.au/mentalhealth/services/adult/northeast-a.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/northeast-a.htm</a>

This table does not include all adult mental health service areas in Victoria. For more services, access Victoria's adult specialist mental health services website which includes maps of each region: <http://www.health.vic.gov.au/mentalhealth/services/adult/index.htm>

### **Inpatient Psychiatric Services**

Should a woman require inpatient admission for a psychiatric illness during pregnancy, this is usually arranged at other hospitals (e.g. Melbourne Health, Austin Health, St Vincent's Health and Werribee Mercy Hospital) by the referring hospitals' psychiatric teams or crisis assessment and treatment (CAT) teams. Please note: there are inpatient beds onsite at NH however they are managed by Melbourne Health. Similarly, inpatient beds at SH are managed by Mid West Mental Health Service.

### **Hospital Mental Health Services (non-urgent)**

RWH and MHW have mental health services that can assess and manage women undertaking pregnancy care at those hospitals in non-urgent situations. To access these:

- The Shared Maternity Care Coordinator can facilitate an appointment for non-urgent psychiatric consultation for women enrolled in Shared Maternity Care.
- For advice during business hours, GPs and SMCA are encouraged to contact the psychiatric team via the hospital switchboard or the relevant hospital psychiatric service directly (contact details below)

Mental Health/Psychiatry Contact Details			
RWH	MHW	SH	NH
Ph: 8345 2000 (switchboard) and ask for the <ul style="list-style-type: none"> <li>Psychiatric Consultation Liaison Nurse</li> </ul> Or <ul style="list-style-type: none"> <li>Psychiatry Registrar</li> </ul>	Ph: 8458 4444 (switchboard) and ask for the Psychiatry Registrar Or Contact Perinatal Mental Health Ph: 8458 4843	While psychiatric services exist at SH, they are usually only accessible for inpatient liaison consultations  For urgent care or assessment contact CAT team	While psychiatric services exist at NH, they are usually only accessible for inpatient liaison consultations  For urgent care or assessment contact CAT team

Referring a woman directly to a private provider (psychiatrist or psychologist) is also an option that SMCA may consider when caring for a pregnant woman with mental health issues.

In the postnatal period both public and private mother and baby services and early parenting centres provide clinical and support services for parents experiencing difficulties (including mental health problems). Where there are concerns about the wellbeing of a child or family, Child FIRST is the referral point for family services in Victoria. Please see the POSTNATAL CARE section of these Guidelines for more information and contact details.

### Alcohol and Drug Services

Each hospital has services to support women with alcohol and drug issues during pregnancy and postpartum and to provide advice to GPs and SMCA. They work closely with the hospital's social work and mental health services.

Alcohol and Drug Service Contact Details			
RWH	MHW	SH	NH
Women's Alcohol & Drug Service Ph: 8345 3931 Fax: 9344 2719 email: <a href="mailto:wads@thewomens.org.au">wads@thewomens.org.au</a> Women are able to self refer to this service	Transitions Clinic Ph: 8458 4100 (GP Hotline) Or Ph: 8458 4201 (coordinating midwife) Fax: 8458 4206 Women are able to self refer to this service	Maternity Outreach and Support Service Clinic Ph: 8345 1727 Fax 8345 1691	SMCA are advised to discuss management of individual cases with the hospital obstetric team.  This can be done by contacting the Shared Maternity Care Coordinator.

### Intimate Partner Violence

Sadly, intimate partner violence is responsible for more ill-health and premature death in Victorian women under the age of 45 than any other of the well-known preventable risk factors, including high blood pressure, obesity and smoking. Findings from VicHealth's 2004 study "The Health Costs of Violence: Measuring the burden of disease caused by intimate partner violence" demonstrate the seriousness and prevalence of intimate partner violence.

Intimate partner violence has wide ranging and persistent effects on women’s physical and mental health and contributes 8.8% to the total disease burden in Victorian women aged 15 to 44. Direct health consequences for women exposed to violence include depression, anxiety and phobias, suicide attempts, chronic pain syndromes, psychosomatic disorders, physical injury, gastrointestinal disorders, irritable bowel syndrome and a variety of reproductive consequences. The influence of the abuse can persist long after the abuse has stopped and the more severe it is, the greater its impact on a woman’s physical and mental health.

One in five Australian women report being subjected to violence at some stage in their adult lives, increasing their risk of mental health problems, behavioural and learning difficulties. The risk is higher in pregnant women and in the period following the birth of a child. Young women who have been exposed to this type of violence are more likely to have an unplanned pregnancy, a termination or a miscarriage. They are slower to make contact with medical services for antenatal care than women who are not exposed to violence and their babies are more likely to have a problem diagnosed after birth. In addition, it is estimated that one in four Victorian children has witnessed intimate partner violence, increasing their risk of mental health problems, behavioural and learning difficulties. (7)

*‘One in five Australian women report being subjected to violence at some stage in their adult lives, increasing their risk of mental health problems, behavioural and learning difficulties. The risk is higher in pregnancy women and in the period following the birth of a child.’*

Intimate Partner Violence Crisis Service Contact Details	
Women’s Domestic Violence Crisis Service Ph: 9373 0123 or 1800 015 188	Immigrant Women’s Domestic Violence Service Ph: 8413 6800
Statewide 24 hour crisis support and safe accommodation (refuges) for women and their children	Support to women from culturally and linguistically diverse (CALD) backgrounds in their primary language

## Resources

Mental Health	Beyond Blue <a href="http://www.beyondblue.org.au/index.aspx?link_id=7.102&amp;tmp=FileDownload&amp;fid=1279">http://www.beyondblue.org.au/index.aspx?link_id=7.102&amp;tmp=FileDownload&amp;fid=1279</a>	Antenatal and Postnatal Depression - A Guide to management for health professionals
	Beyond Blue <a href="http://www.beyondblue.org.au/index.aspx?link_id=94.751&amp;tmp=FileDownload&amp;fid=1334">http://www.beyondblue.org.au/index.aspx?link_id=94.751&amp;tmp=FileDownload&amp;fid=1334</a>	Emotional Health During Pregnancy and Early Parenthood booklet
	Post and Antenatal Depression Association (PANDA) <a href="http://www.panda.org.au/images/stories/PDFs/Antenatal_Depression.pdf">http://www.panda.org.au/images/stories/PDFs/Antenatal_Depression.pdf</a>	Consumer fact sheet: Antenatal Depression
	Australian Government Department of Health and Ageing <a href="http://www.health.gov.au/internet/main/publishing.nsf/Content/mental-pubs-m-mangp-toc~mental-pubs-m-mangp-app~mental-pubs-m-mangp-app-12">http://www.health.gov.au/internet/main/publishing.nsf/Content/mental-pubs-m-mangp-toc~mental-pubs-m-mangp-app~mental-pubs-m-mangp-app-12</a>	Edinburgh Perinatal depression scale
	Victorian Department of Health <a href="http://www.health.vic.gov.au/mentalhealth/services/adult/index.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/index.htm</a>	Adult Mental Health Service Areas and Local Government Areas. 24 hour psychiatric triage information, assessment and referral (including CAT teams)

Medicines in Pregnancy	<p>Mercy Hospital for Women  <a href="http://www.mercy.com.au/files/NRR6CEQQCO/Psychotropic%20drugs%20%20pregnancy%202nd%20Edn.pdf">http://www.mercy.com.au/files/NRR6CEQQCO/Psychotropic%20drugs%20%20pregnancy%202nd%20Edn.pdf</a></p>	Psychotropic Medication in Pregnancy/Lactation
	<p>Royal Women's Hospital  Pregnancy and Breastfeeding Medicines Guide  Available from Pharmacy Department  Ph: 9345 3190  E: <a href="mailto:rwh.pharmacy@thewomens.org.au">rwh.pharmacy@thewomens.org.au</a></p>	
	<p>Note: In 2011, a Psychotropic Medicines resources website and phone line will be introduced at RWH as a statewide service</p>	
	<p>Therapeutic Goods Administration  <a href="http://www.tga.gov.au/docs/pdf/medpreg.pdf">http://www.tga.gov.au/docs/pdf/medpreg.pdf</a></p>	Clinician information: Prescribing medicines in pregnancy. An Australian categorisation of risk of drug use in pregnancy

# POSTNATAL CARE

## Immediate Postnatal Care

The average hospital stay after the birth of a baby is 1-2 days for a vaginal birth and 3 days for a caesarean section. A hospital discharge summary is sent to the SMCA and nominated GP within 48 hours of discharge. In the case of a fetal or neonatal death or significant complications or problems, the GP and SMCA will be contacted by the Registrar or Consultant.

*Hospitals should ensure that consistent information is given to women (regarding care after hospital stay) and that shared care providers are included in planning (Level IV evidence) – 3 Centres*

Immediate postnatal care is undertaken at the hospital. This includes:

- physical assessment of mother and baby
- wound/perineal/breast care
- emotional wellbeing and parenting
- supporting parents in caring for their baby
- breastfeeding/infant feeding: initiation and support
- contraception education
- routine newborn screening test for Hypothyroidism, PKU, Cystic Fibrosis, some metabolic disorders (Guthrie test)
- routine newborn Hearing Screening

## Newborn Screening Test (Guthrie Test)

The newborn screening test is carried out on a blood sample obtained by a heel prick and placed on pre-printed filter paper (Guthrie cards). All tests are processed at Genetic Health Services Victoria's Newborn Screening Laboratory located at The Royal Children's Hospital. Newborn screening identifies babies with an increased risk of having Hypothyroidism, PKU, Cystic Fibrosis, and over 20 additional metabolic disorders.

The newborn screening test is performed when the baby is between 48 and 72 hours of age. More false positives and negatives occur when the

screening is done before 48 hours. As the period of hospitalisation provides the only certain opportunity for testing, if a baby is discharged before 48 hours, the newborn screening test is carried out before the baby leaves hospital, and then again in the community as soon after 48 hours as possible (by the domiciliary midwife). The hospital of birth is responsible for ensuring all babies have the newborn screening test. This includes babies who are transferred to other hospitals or domiciliary midwifery programs.

About 0.1% of babies tested will be diagnosed with a condition as a result of newborn screening. All hospitals receive a weekly report of results, and parents of babies whose test results indicate an increased risk of any of the disorders are contacted and confirmatory diagnostic testing organised. Notification is also made to the paediatrician/GP or hospital shown on the newborn screening test.

*'Newborn screening identifies babies with an increased risk of having Hypothyroidism, PKU, Cystic Fibrosis, and over 20 additional metabolic disorders.'*

Newborn Screening Test Contact Details – Victorian Clinical Genetics Services	
Laboratory Ph: 8341 6272 Fax: 8341 6339 Email: <a href="mailto:screeninglab@ghsv.org.au">screeninglab@ghsv.org.au</a>	Newborn Screening Counselling Ph: 8341 6201

## Newborn Hearing Screening

As part of the Victorian Infant Hearing Screening Program (VIHSP), all babies born at RWH, MHW, SH and NH undergo a routine hearing screen and risk factor assessment, prior to discharge. Any baby who has not been screened prior to discharge is called back by VIHSP for an outpatient screen.

Screening results are documented in the baby's Child Health Record ('Blue Book') and where a pass result is not obtained, VIHSP organises a diagnostic audiology referral which is followed up by both VIHSP and the Maternal Child Health Nurse.

If a pass result is obtained but risk factor/s have been identified, this is documented in the Child Health Record and flagged for follow-up by the Maternal Child Health Nurse who will refer for diagnostic audiology if required at the 2 week and/or 6-8 month check, or in response to parental concern.

If a GP identifies risk factors not already identified and followed up by Maternal Child Health Service or there is concern about a baby's hearing, a GP can also refer for diagnostic audiology.

Hearing loss risk factors include:

- family history of congenital hearing impairment
- rubella, cytomegalovirus, or toxoplasmosis during pregnancy
- admitted to neonatal intensive care or admitted to special care nursery for 2 or more days
- Apgar score of less than 4 at five minutes of age
- birth weight <1500g
- severe jaundice
- congenital abnormalities of the head and neck
- bacterial meningitis
- later risk factors, eg. developmental delay, head injury

*'All babies born at RWH, MHW, SH and NH undergo a routine hearing screen and risk factor assessment, prior to discharge.'*

*'If a GP identifies risk factors not already identified and followed up by Maternal Child Health Service or there is concern about a baby's hearing, a GP can also refer for diagnostic audiology.'*

The Victorian Infant Hearing Screening Program can be contacted for details of infant diagnostic audiology providers.

Victorian Infant Hearing Screening Program Contact Details
The Royal Children's Hospital Centre for Community Child Health
Ph: 9345 4941
Fax: 9345 5049
Email: <a href="mailto:email.vihsp@rch.org.au">email.vihsp@rch.org.au</a>

## Domiciliary Care

In addition to immediate postnatal care in hospital, the hospitals offer at least one domiciliary Midwife visit for all women in the first week after discharge. In addition, the hospital notifies the local Maternal Child Health Service of the woman's discharge and a home visit by a Maternal Child Health Nurse within the first few weeks of a woman's discharge is arranged. In addition, there is capacity for enhanced services if required, see 'Maternal Child Health Services' under Community Postnatal Care below.

*'The hospitals offer at least one domiciliary Midwife visit for all women in the first week after discharge.'*

## The Child Health Record ("Blue Book")

All parents are given a Child Health Record for their baby in hospital. It is used by Maternal Child Health Nurse and GPs as a record of a child's health and development including growth immunisations and development milestones. It is the main communication tool between parents, the Maternal Child Health Nurse, GPs and other health professionals and is a record of all Maternal Child Health Nurse visits.

## Community Postnatal Care

Most postnatal care is undertaken in the community by GPs in conjunction with Maternal Child Health Services. Infants in Australia have a higher percentage of GP visits during the first year of life than in any other year of life. (4) Unfortunately, there are high levels of postnatal morbidity at 6 months postpartum (see table below) and low levels of maternal satisfaction with hospital postnatal care in Victoria. (5)

The hospitals encourage all women and their babies to attend their GP for a postnatal check at 6 weeks, or earlier if needed. If a woman does not have GP, the hospitals will assist her to find one prior to discharge from hospital.

*'...there are high levels of postnatal morbidity at 6 months postpartum'*

## Common Postnatal problems in the 6-7 months after childbirth\*

PROBLEM	PRIMIPARAS (%)	MULTIPARAS (%)
Backache	44	43
Bowel problems	10	11
Constantly reliving baby's birth	7	5
Contraception	8	9
Depression	19	20
Haemorrhoids	26	24
Mastitis (if breastfeeding)	16	18
More coughs and colds than usual	9	13
No health problems	5	6
Other	7	8
Pain from a caesarean wound	63+	60
Painful perineum	31	15
Relationship with partner	19	18
Sex	31	24
Tiredness/exhaustion	68	70

+Includes only women who had a caesarean section (n+1336) \*Adapted from (6)



In light of the above, the following is recommended:

- that every woman has postnatal care provided by her GP
- the timing of visits should be individualised and reflect a woman's needs
- at the postnatal check-up, both the mother and child should be assessed
- a woman-centred approach should be taken so that a woman is able to direct the GP to areas of most relevance to her

Areas to address as part of a postnatal check include:

- physical assessment of mother and baby, including feeding and settling
- developmental assessment of the baby
- emotional wellbeing of mother and baby
- relationship and social supports
- health promotion
- opportunity for parents to express concerns

*'Areas to address as part of a postnatal check include:*

- *physical assessment of mother and baby, including feeding and settling*
- *developmental assessment of the baby*
- *emotional wellbeing of mother and baby*
- *relationship and social supports*
- *health promotion*
- *opportunity for parents to express concerns'*

### Postnatal GP Visit Guide: Mother

Aim of Visit	Physical	Investigations and Immunisations	Issues for Discussion / Health Promotion
<ul style="list-style-type: none"> <li>• physical assessment</li> <li>• emotional assessment</li> <li>• parenting assessment</li> <li>• promote breastfeeding</li> <li>• relationship and social assessment</li> <li>• opportunity to express concerns</li> </ul>	<ul style="list-style-type: none"> <li>• follow-up complications of pregnancy (eg. hypertension, pre-eclampsia, gestational diabetes)</li> <li>• check wounds</li> <li>• check for fever, anaemia and vaginal loss</li> <li>• assess for breastfeeding difficulties</li> <li>• ask about urinary and faecal continence</li> <li>• ask about perineal symptoms and intercourse</li> <li>• maintain awareness of postnatal depression</li> <li>• maintain awareness of intimate partner violence</li> <li>• maintain awareness of parenting, including child mistreatment</li> </ul>	<ul style="list-style-type: none"> <li>• consider haemoglobin if previous anaemia or postpartum haemorrhage</li> <li>• If gestational diabetes, confirm postnatal GTT has been arranged</li> <li>• If gestational diabetes, discuss and establish ongoing screening and recall systems (generally 2 yearly GTT if normal GTT and yearly GTT if impaired GTT)</li> <li>• Pap smear if due</li> <li>• MMR immunisation if rubella antibody titre low (and not given in hospital prior to discharge)</li> <li>• Varicella immunisation if non-immune (2 doses required)</li> <li>• Pertussis ('Boostrix')</li> </ul>	<ul style="list-style-type: none"> <li>• physical wellbeing</li> <li>• breastfeeding/infant feeding</li> <li>• emotional wellbeing and parenting</li> <li>• postnatal depression/adjustment</li> <li>• parenting supports</li> <li>• relationship and social wellbeing</li> <li>• contraception, sexuality and relationship issues</li> <li>• exercise including pelvic floor</li> <li>• maternal nutrition</li> <li>• sleep and rest</li> <li>• smoking, drugs and alcohol</li> <li>• vitamin D supplementation if mother was vitamin D deficient during pregnancy (baby and mother and other family members)</li> <li>• liaison with other community services (in particular recent migrants, mothers from Aboriginal and Torres Strait Islander background, adolescent</li> </ul>

		immunisation of mother and other close family contacts if not undertaken prior to pregnancy	mothers, mothers with alcohol and drug problems)
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<b>Postnatal GP Visit Guide: Baby</b>			
<b>Aim of visit</b>	<b>Physical</b>	<b>Investigations and Immunisations</b>	<b>Issues for discussion / Health Promotion</b>
<ul style="list-style-type: none"> <li>physical assessment</li> <li>developmental assessment</li> <li>health promotion</li> <li>opportunity for parents to express concerns</li> </ul>	<ul style="list-style-type: none"> <li>follow-up on any complications, or parental concerns</li> <li>follow-up on any relevant tests</li> <li>assessment of growth – height, weight and head circumference</li> <li>check if smiling and following</li> <li>general physical examination especially: assess for jaundice, tone assessment, heart, testes, hips, squint, eyes (red reflex)</li> <li>identify risk of hearing problems</li> </ul>	<ul style="list-style-type: none"> <li>follow-up on investigation results (e.g. fetal hydronephrosis)</li> <li>follow up abnormal clinical findings (e.g. prolonged jaundice, heart murmurs)</li> <li>screening hip ultrasound for babies at risk of hip dysplasia (breech, talipes, family history)</li> <li>confirm baby born to a mother who is a Hepatitis B carrier has received 2 injections post birth (Hepatitis B Immunoglobulin and Hepatitis B paediatric formulation (Engerix-B paediatric or H-B-VAX II (paediatric)) and reinforce need for full immunisation and testing between 9-15 months of age</li> </ul>	<ul style="list-style-type: none"> <li>appropriate feeding and weight gain</li> <li>immunisation</li> <li>vitamin D supplementation if mother was vitamin D deficient during pregnancy (eg. 'Pentavite') at least while exclusively breastfeeding</li> <li>settling and sleep</li> <li>Sudden Infant Death Syndrome (SIDS) prevention</li> <li>dangers of passive smoking</li> <li>car safety and other injury prevention</li> <li>sun protection</li> <li>dental health</li> <li>community and other support and resources</li> </ul>

### Maternal Child Health Services

There is a capacity for an enhanced Maternal Child Health service if needed. This may include additional home support and Maternal Child Health Nurse visits. GPs, the hospital, and women can contact the woman's local Maternal Child Health service to discuss this.

<b>Maternal Child Health Services Contact Details</b>	
Directory of Maternal Child Health services with postcode search function: <a href="http://www.eduweb.vic.gov.au/mch/t_centrelist.asp">http://www.eduweb.vic.gov.au/mch/t_centrelist.asp</a>	Maternal Child Health Line - 24 hours Ph: 13 22 29 Both GPs and families can use this service

**Enhanced Maternal Child Health Services: a component of Child and Family Information, Referral and Support Teams (Child FIRST)**

Child FIRST includes enhanced Maternal Child Health services and other support services (e.g. social work, housing, legal, drug and alcohol services) and can be contacted when a health professional feels a family requires additional support. This may be for issues including:

- young women
- isolation and/or unsupported families
- parenting problems that may affect the child's development
- social or economic disadvantage that may adversely impact on a child’s care or development
- family conflict, including family breakdown
- families under pressure due to a family member’s physical or mental illness, substance abuse, disability or bereavement

*‘Child FIRST includes enhanced Maternal Child Health services and other support services (e.g. social work, housing, legal, drug and alcohol services) and can be contacted when a health professional feels a family requires additional support.’*

Referral to Child FIRST services does not replace mandatory reporting of child of abuse to Child Protection Services.

Child FIRST Contact Details					
Monash	Nillumbik	Brimbank	Hume	Hobson’s Bay	Kingston
Whitehorse	Whittlesea	Melton	Moreland	Maribyrnong	Bayside
Manningham	Banyule			Melbourne	Glen Eira
Boroondara	Yarra			Moonee Valley	Stonnington
	Darebin			Wyndham	Port Phillip
Ph: 1300762 125	Ph: 9450 0955	Ph: 1300 138 180	Ph: 1300 786 433	Ph 1300 775 160	Ph: 1300 367 441
Services are delivered on an area basis depending on where a family lives. This table does not include all Child FIRST areas in Victoria. For the full list of referral numbers, access the Child FIRST website: <a href="http://www.cyf.vic.gov.au/quick-help/first-child-and-family-information-referral-and-support-teams">http://www.cyf.vic.gov.au/quick-help/first-child-and-family-information-referral-and-support-teams</a>					
Access to enhanced MCHS often occurs via the woman’s usual Maternal Child Health service. GPs are encouraged to contact the Maternal Child Health service if they feel additional support may be beneficial					

**Mandatory Reporting Requirements for Health Professionals**

The Children and Young Persons Act 1989 Section 64 (1C) states that certain professionals (including GPs, obstetricians and midwives) must report to Child Protection Services, when, in the course of their professional duty:

- “[they] form the belief on reasonable grounds that a child is in need of protection[because] the child has suffered, or is likely to suffer significant harm as a result of physical injury and the child’s parents have not protected or are unlikely to protect, the child from harm of that type

Or

*‘The Children and Young Persons Act 1989 Section 64 (1C) states that certain professionals (including GPs, obstetricians and midwives) must report to Child Protection Services under certain circumstances.’*

- the child has suffered, or is likely to suffer, significant harm as a result of sexual abuse and the child’s parents have not or are unlikely to protect, the child from harm of that type”

To make a notification of child abuse, contact the regional Child Protection Service.

Child Protection Services Contact Details For reporting of suspected child abuse			
Eastern	Southern	Western and Northern	Child Protection Crisis Line
Ph: 1300 360 391	Ph: 1300 655 795	Ph:1300 664 977	Ph: 131 278 (for emergency child protection matters outside of normal business hours)

## Mental Health and Wellbeing in the Postnatal Period

In the postnatal period, there are a number of services women can access for mental health issues. Adult mental health services operate a range of services, both urgent and non-urgent including Crisis Assessment and Treatment (CAT) Teams and Primary Mental Health Teams. Most services are delivered on an area basis, depending on where a patient lives.

In addition, for non-urgent assessment, parents experiencing difficulties (including mental health problems, settling issues) support services are available via early parenting centres.

Referring a woman directly to a private provider (psychiatrist or psychologist) is also an option that GPs may consider when caring for a woman with mental health issues in the postnatal period.

### Crisis Assessment and Treatment (CAT) Teams (urgent)

CAT teams operate 24 hours a day and provide urgent community-based assessment and short-term treatment interventions to people in psychiatric crisis. CAT services have a key role in deciding the most appropriate treatment option and in screening all potential inpatient admissions (includes access to inpatient mother and baby units).

CAT teams are a component of adult mental health services and can be accessed by anyone (contact details below). CAT teams are also attached to most Emergency Departments.

*‘In the postnatal period, there are a number of services women can access for mental health issues. Adult mental health services operate a range of services, both urgent and non-urgent including Crisis Assessment and Treatment (CAT) Teams and Primary Mental Health Teams.’*

### Primary Mental Health Teams (non-urgent)

In non urgent situations, Primary Mental Health Teams provide consultation for women (including psychiatric assessment, feedback and development of a treatment plan) and advice to primary health services such as GPs and community health centres. They do not provide case management. Primary Mental Health Services are a component of adult mental health services (contact details on next page).

### Adult Mental Health Service Areas and Local Government Areas

24 hour psychiatric triage information, assessment and referral

Includes CAT Teams and Primary Mental Health Teams

Mental Health Service	Local Government Areas	Ph:	Website
Northern	Whittlesea Darebin	1300 874 243 (1300 TRIAGE)	<a href="http://www.health.vic.gov.au/mentalhealth/services/adult/northern-a.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/northern-a.htm</a>
North West	Hume Moreland		<a href="http://www.health.vic.gov.au/mentalhealth/services/adult/northwest-a.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/northwest-a.htm</a>
Mid West	Melton Brimbank		<a href="http://www.health.vic.gov.au/mentalhealth/services/adult/midwest-a.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/midwest-a.htm</a>
Inner West	Moonee Valley Melbourne		<a href="http://www.health.vic.gov.au/mentalhealth/services/adult/inwest-a.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/inwest-a.htm</a>
Inner Urban East	Yarra Boroondara	1300 558 862	<a href="http://www.health.vic.gov.au/mentalhealth/services/adult/inurbaneast-a.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/inurbaneast-a.htm</a>
South West	Wyndham Hobsons Bay Maribyrnong	1300 657 259	<a href="http://www.health.vic.gov.au/mentalhealth/services/adult/southwest-a.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/southwest-a.htm</a>
North East	Nillumbik Banyule	1300 859 789	<a href="http://www.health.vic.gov.au/mentalhealth/services/adult/northeast-a.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/northeast-a.htm</a>

This table does not include all adult mental health service areas in Victoria. For more services, access Victoria's adult specialist mental health services website which includes maps of each region: <http://www.health.vic.gov.au/mentalhealth/services/adult/index.htm>

### Mother and Baby Services

The three public mother and baby inpatient services in Victoria are located at the Austin Hospital, Werribee Mercy Hospital and Monash Medical Centre. These mother and baby services provide specialist assessment and management of women with mental illness in the postnatal period. Generally, infants up to 12 months of age are admitted with their mothers.

SMCA can refer a woman via the woman's local adult mental health service (above) and an intake worker will assess the woman and arrange admission to the appropriate service.

Public Mother and Baby Units in Victoria Contact Details		
Inpatient Services		
Austin Health - Heidelberg	Monash Medical Centre - Clayton	Werribee Mercy Hospital - Werribee
Ph: 9496 6406 Fax: 9496 4366 AH: 9496 5000	Ph: 9594 1414 Fax: 9594 6615	Ph: 9216 8465 Fax: 9216 8470

### Early Parenting Centres

Early Parenting Centres provide help and support for families with children 0 to 3 years who have difficulties adjusting to, or establishing, feeding, sleeping and other early childhood routines. Families can stay at the centres or attend day stay programs. SMCA are able to refer directly to these services, and women are also able to self-refer.

Early Parenting Centres in Melbourne Contact Details		
Tweddle Child and Family Health Service - Footscray	O'Connell Family Centre - Canterbury	Queen Elizabeth Centre, Noble Park
Ph: 9689 1577 Fax: 9689 1922 <a href="http://www.tweddle.org.au/">http://www.tweddle.org.au/</a>	Ph: 8416 7600 Fax: 9816 9729 <a href="http://www.mercy.com.au/html/s02_article/article_view.asp?id=200&amp;nav_cat_id=215&amp;nav_top_id=84">http://www.mercy.com.au/html/s02_article/article_view.asp?id=200&amp;nav_cat_id=215&amp;nav_top_id=84</a>	Ph: 9549 2777 Fax: 9549 2779 <a href="http://www.gec.org.au/">http://www.gec.org.au/</a>

Private facilities with both mother and baby units and parenting centres are also available. To refer, SMCA should contact the facilities directly.

Private Hospitals with Mother and Baby Units in Melbourne Contact Details			
All provide both day and inpatient programs			
North Park – Bundoora	Mitcham Private - Mitcham	Albert Road Clinic - Melbourne	Masada - St Kilda East
Ph: 9467 6022 <a href="http://www.healthscopehospitals.com.au/info/general/Hospital/get/1565/itemId/">http://www.healthscopehospitals.com.au/info/general/Hospital/get/1565/itemId/</a>	Ph: 92103134 <a href="http://www.mitchamprivate.com.au/mbu/introduction.asp">http://www.mitchamprivate.com.au/mbu/introduction.asp</a>	Ph: 9256 8322 <a href="http://www.albertroadclinic.com.au/services/parent_infant.asp">http://www.albertroadclinic.com.au/services/parent_infant.asp</a>	Ph: 9038 1413 <a href="http://www.masadaprivate.com.au/mbu/Baby_Unit.asp">http://www.masadaprivate.com.au/mbu/Baby_Unit.asp</a>

## Breastfeeding

The World Health Organisation states that: *'exclusive breastfeeding is recommended up to 6 months of age, with continued breastfeeding along with appropriate complementary foods up to two years of age or beyond'* (WHO). In Victoria, exclusive breastfeeding rates have not increased in the last seven years and the percentage of infants fully breastfed remain at approximately 50% at 3 months and 38% at 6 months (8).

It is widely accepted that breastfeeding positively influences the physical and emotional health of both mother and infant. It provides nutrition for normal growth and development of infant and provides protection against many diseases and infections for both mother and baby.

The hospitals strongly encourage breastfeeding with support and education available at each hospital for all women in the antenatal and postnatal period. Breastfeeding is discussed and encouraged by hospital staff at both antenatal visits and childbirth education sessions. In the immediate postnatal period, Lactation Consultants are available to inpatients.

Outpatient hospital assistance is available:

- for women experiencing breastfeeding problems up to 3 months postpartum

- antenatally for women who have risk factors for breastfeeding difficulties (e.g. have had poor breastfeeding experiences, breast surgery, multiple pregnancies)
- for women who require additional support

GPs and SMCA are able to contact breastfeeding support services at the hospitals for advice or referral. Women are also able to contact the hospital breastfeeding services directly.

In addition to hospital breastfeeding services, many MCH Services provide assessment and support, as do early parenting centres and organisations such as the Australian Breastfeeding Association.

A range of clinical practice guidelines relating to breastfeeding can be found in the resource section.

<b>Hospital Breastfeeding Support Contact Details</b>			
<b>Women are able to self-refer to the hospital they are booked into or have given birth in</b>			
<b>RWH Breastfeeding Education and Support Services (BESS)</b>	<b>MHW Breastfeeding Support Centre</b>	<b>SH Breastfeeding Centre</b>	<b>NH Specialist Breastfeeding Service</b>
Ph: 8345 2000 (switchboard) and ask to have the lactation consultant paged or Ph: 8345 2496 and leave a message	Ph: 8458 4677 or 8458 4676	Ph: 8345 1049 to leave a message Service only available Monday and Thursday at this time. Contact the maternity ward if the matter is urgent Ph: 8345 1727	Ph: 8405 8000 (switchboard) and ask to have the lactation consultant paged or Ph: 8405 8202 Day stay program also available

### **Gestational Diabetes**

For women who have had Gestational Diabetes, the hospital will arrange for the woman to have a GTT performed around six weeks after the birth. GPs are encouraged to ensure this has been done. Even if the result of this initial postnatal GTT is normal, women are at increased risk of developing diabetes later in life with a 30 to 50% chance of development within 15 years after a pregnancy with Gestational Diabetes. Therefore these women require counselling and minimisation of risk factors for diabetes and vascular disease and regular retesting (e.g. 2 yearly GTT if normal GTT and yearly GTT if impaired GTT).

### **Hepatitis B Carriers**

For babies born to mothers who are Hepatitis B carriers, GPs are encouraged to confirm that the baby has received two injections post birth (both Hepatitis B Immunoglobulin and Hepatitis B paediatric formulation (Engerix-B paediatric or H-B-VAX II (paediatric))). The baby requires full Hepatitis B immunisation and testing for carrier status between 9 and 15 months. In addition, as in the usual management of people who are Hepatitis B carriers, other family contacts should be immunised and their immunity confirmed and Hepatitis B surveillance for the mother undertaken (9).

## References

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- 5 Brown S, Davey M, Bruinsma F. Women's views and experiences of postnatal hospital care in the Victorian Survey of Recent Mothers 2000. *Midwifery*; 21, 109-126, 2005
- 6 Brown S, Lumley J. Maternal health after childbirth: results of an Australian population based survey. *British Journal of Obstetrics and Gynaecology*; 105: 156-161, 1998
- 7 VicHealth. *The Health Costs of Violence: Measuring the burden of disease caused by intimate partner violence*. VicHealth, 2004
- 8 Victorian Department of Education and Early Childhood Development.  
<http://www.education.vic.gov.au/researchinnovation/vcams/children/2-1breastfed.htm> Accessed 12/8/2010
- 9 The Australian Immunisation Handbook, 9<sup>th</sup> Ed. Australian Department of Health and Ageing, 2008.

## Resources

Postnatal Care– General		
	Having a baby in Victoria- Ongoing care after you have your baby <a href="http://www.health.vic.gov.au/maternity/yourpregnancy/ongoingcare.htm">http://www.health.vic.gov.au/maternity/yourpregnancy/ongoingcare.htm</a>	Consumer information including: <ul style="list-style-type: none"> <li>• Postnatal domiciliary care</li> <li>• Victorian Child Health Record</li> <li>• Maternal and child health services</li> <li>• Six-week postnatal check for mother and baby</li> <li>• Contraception</li> <li>• Sex after pregnancy</li> <li>• Birth Registration</li> <li>• Infant car restraints</li> <li>• Crying baby</li> <li>• Sleep baby sleep</li> <li>• Immunisation program</li> </ul> Sudden infant death syndrome
	Raising Children Network <a href="http://raisingchildren.net.au/">http://raisingchildren.net.au/</a>	Consumer information: comprehensive website with large range of information about babies, children, families and parenting including health, development and safety
	Children, Youth and Child Health Service (South Australia) <a href="http://www.cyh.com/SubDefault.aspx?p=98">http://www.cyh.com/SubDefault.aspx?p=98</a>	Parenting and Child Health website
Child Health Record “The Blue Book”		
	Victorian Department of Education and Early Childhood Development <a href="http://www.education.vic.gov.au/ecsmangement/mch/childhealthrecord/default.htm">http://www.education.vic.gov.au/ecsmangement/mch/childhealthrecord/default.htm</a>	Information about the child health record including child health and development, growth charts, immunisation and useful contacts
	Victorian Department of Education and Early Childhood Development <a href="http://www.education.vic.gov.au/ecsmangement/mch/childhealthrecord/language.htm">http://www.education.vic.gov.au/ecsmangement/mch/childhealthrecord/language.htm</a>	Basic information on how to use the child health record. Available in Arabic, Chinese, English, Polish, Spanish, Turkish and Vietnamese
Newborn Screening		
Newborn Screening Test	Victorian Department of Health <a href="http://www.health.vic.gov.au/nbs/">http://www.health.vic.gov.au/nbs/</a>	Consumer information on Newborn Screening Test
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Newborn_scr">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Newborn_scr</a>	Consumer information on Newborn Screening Test



	<a href="#">eening?open</a>	
	Victoria Clinical Genetics Service <a href="http://www.genetichealthvic.net.au/Documents/PDF/Newborn_Screening_Brochure.pdf">http://www.genetichealthvic.net.au/Documents/PDF/Newborn_Screening_Brochure.pdf</a>	Consumer fact sheet on Newborn Screening Test
Victorian Infant Hearing Screening	Royal Children's Hospital <a href="http://www.rch.org.au/vihsp/index.cfm?doc_id=7461">http://www.rch.org.au/vihsp/index.cfm?doc_id=7461</a>	Frequently asked questions about Infant Hearing Screening in Victoria
<b>Community services and supports</b>		
Maternal Child Health Services	Victorian Department of Education and Early Childhood Development <a href="http://www.eduweb.vic.gov.au/mch/t_centrelist.asp">http://www.eduweb.vic.gov.au/mch/t_centrelist.asp</a>	Directory of Maternal and Child Health Centre with postcode search function
Child protection	Victorian Department of Human Services- Children, Youth and Families <a href="http://www.cyf.vic.gov.au/quick-help/first-child-and-family-information-referral-and-support-teams">http://www.cyf.vic.gov.au/quick-help/first-child-and-family-information-referral-and-support-teams</a>	Referral and support teams directory
	Victorian Department of Human Services- Children, Youth and Families <a href="http://www.cyf.vic.gov.au/_data/assets/pdf_file/0010/334963/responding-to-child-abuse.pdf">http://www.cyf.vic.gov.au/_data/assets/pdf_file/0010/334963/responding-to-child-abuse.pdf</a>	Responding to Child Abuse. For professionals working with children includes information on mandatory reporting
<b>Breastfeeding</b>		
Breastfeeding (General)	Australian Breastfeeding Association <a href="http://www.breastfeeding.asn.au/bfinfo/index.html">http://www.breastfeeding.asn.au/bfinfo/index.html</a>	Large variety of consumer information on breastfeeding including support and advice
	World Health Organisation <a href="http://www.who.int/topics/breastfeeding/en">http://www.who.int/topics/breastfeeding/en</a>	General breastfeeding information
	Royal Women's Hospital <a href="http://www.thewomens.org.au/BreastfeedingBestPracticeGuidelines">http://www.thewomens.org.au/BreastfeedingBestPracticeGuidelines</a>	Clinician information: breastfeeding best practice guidelines
Breastfeeding Clinical Practice Guidelines	Royal Women's Hospital <a href="http://www.thewomens.org.au/LowBreastmilkSupply">http://www.thewomens.org.au/LowBreastmilkSupply</a>	Clinical Practice Guideline: low breast milk supply. Includes: assessment, signs and management of low milk supply
	Royal Women's Hospital <a href="http://www.thewomens.org.au/MedicationsandHerbalPreparationstoIncreaseBreastmilkProductionGalactagogues">http://www.thewomens.org.au/MedicationsandHerbalPreparationstoIncreaseBreastmilkProductionGalactagogues</a>	Clinical Practice Guideline: medications and herbal preparations to increase breast milk production (galactagogues). Includes: commonly available galactagogues (Domperidone and Metoclopramide) and herbal preparations
	Royal Women's Hospital <a href="http://www.thewomens.org.au/MastitisLactational">http://www.thewomens.org.au/MastitisLactational</a>	Clinical Practice Guideline: mastitis. Includes: signs, symptoms, investigations and management and mastitis clinical algorithm
	Royal Women's Hospital <a href="http://www.thewomens.org.au/NippleEczemaDermatitis">http://www.thewomens.org.au/NippleEczemaDermatitis</a>	Clinical Practice Guideline: nipple eczema dermatitis. Includes: assessment, management and treatment
	Royal Women's Hospital <a href="http://www.thewomens.org.au/NippleorBreastPainLactationAlgorithm">http://www.thewomens.org.au/NippleorBreastPainLactationAlgorithm</a>	Clinical Practice Guideline: nipple or breast pain (lactation) algorithm. To assess for possible mastitis, nipple eczema dermatitis, bacterial infection and thrush

	Royal Women's Hospital <a href="http://www.thewomens.org.au/ThrushinLactation">http://www.thewomens.org.au/ThrushinLactation</a>	Clinical Practice Guideline: thrush in lactation Includes: signs, symptoms and treatment of both nipple and breast thrush
	Royal Women's Hospital <a href="http://www.thewomens.org.au/TongueTieManagement">http://www.thewomens.org.au/TongueTieManagement</a>	Clinical Practice Guideline: tongue-tie management
Other infant feeding	Raising Children Network <a href="http://raisingchildren.net.au/articles/how_to_bottle-feed.html/context/203">http://raisingchildren.net.au/articles/how_to_bottle-feed.html/context/203</a>	Consumer information on how to bottle feed safely
<b>Medical</b>		
Gestational Diabetes	Diabetes Australia <a href="http://www.diabetesvic.org.au/LinkClick.aspx?fileticket=hwxC07vLWuc%3d&amp;tabid=164">http://www.diabetesvic.org.au/LinkClick.aspx?fileticket=hwxC07vLWuc%3d&amp;tabid=164</a>	Consumer fact sheet on Gestational Diabetes
Hepatitis B	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-hepatitisb">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-hepatitisb</a>	Clinician information: Hepatitis B
	Royal Children's Hospital <a href="http://www.rch.org.au/intranet/fraccp_resources/?doc_id=1338">http://www.rch.org.au/intranet/fraccp_resources/?doc_id=1338</a>	Hepatitis immunisation for babies. Information including if mother is a Hepatitis B carrier
Postnatal medical care-mother	Royal Women's Hospital <a href="http://www.thewomens.org.au/PostpartumCareObstetricbasedCare">http://www.thewomens.org.au/PostpartumCareObstetricbasedCare</a>	Post partum assessment clinical practice guideline. Includes: febrile illness, secondary post partum haemorrhage, mastitis, anaemia, perineum, urinary problems, constipation and haemorrhoids, thyroid, pap smear, vitamin supplementation Post partum counselling including: physiological changes, contraception, post delivery discussion and postnatal depression
	Royal Women's Hospital <a href="http://www.thewomens.org.au/ThirdandFourthDegreeTearsManagement">http://www.thewomens.org.au/ThirdandFourthDegreeTearsManagement</a>	Third and fourth degree tears clinical practice guideline Definition, associated risk factors, repair techniques, post repair management and follow-up
	Royal Women's Hospital <a href="http://www.thewomens.org.au/ImprovingyourrecoveryafterbirthPhysiotherapyadvice">http://www.thewomens.org.au/ImprovingyourrecoveryafterbirthPhysiotherapyadvice</a>	Consumer fact sheet: improving your recovery after birth. Includes: after a caesarean birth, pelvic floor exercises, healthy bladder and bowel habits, back care and correct lifting techniques. Available in: Arabic, Chinese, Hindi, Somali, Turkish, Vietnamese
	Royal Women's Hospital <a href="http://www.thewomens.org.au/GoinghomeafterhavinganEpiduralSpinal">http://www.thewomens.org.au/GoinghomeafterhavinganEpiduralSpinal</a>	Consumer fact sheet: Going home after having an epidural/spinal
	Continence Foundation of Australia <a href="http://www.continence.org.au/resources.php?keyword=&amp;topic%5B%5D=Pregnancy&amp;language=English&amp;type=&amp;submitted=Search">http://www.continence.org.au/resources.php?keyword=&amp;topic%5B%5D=Pregnancy&amp;language=English&amp;type=&amp;submitted=Search</a>	Consumer brochure: 1 in 3 Women Who Have Ever Had a Baby Wet Themselves
	Family Planning Victoria	Consumer information: postnatal

	<a href="http://www.fpv.org.au/pdfs/PostNatalContraceptionAugust05%20.pdf">http://www.fpv.org.au/pdfs/PostNatalContraceptionAugust05%20.pdf</a>	contraception
	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pelvic_floor?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Pelvic_floor?open</a>	Consumer fact sheet: pelvic floor
<b>Vaccinations</b>		
	Australian Immunisation Handbook <a href="http://www.immunise.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-home">http://www.immunise.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-home</a>	9th Edition Australian Immunisation Handbook, 2008 Clinical guidelines for health professionals on the safest and most effective use of vaccines in their practice. These recommendations are developed by the Australian Technical Advisory Group on Immunisation (ATAGI) and endorsed by the National Health and Medical Research Council (NHMRC)
	Victorian Department of Health <a href="http://www.health.vic.gov.au/immunisation">http://www.health.vic.gov.au/immunisation</a>	Victorian Government Immunisation fact sheets
	Victorian Department of Health <a href="http://www.health.vic.gov.au/immunisation/fact-sheets/language">http://www.health.vic.gov.au/immunisation/fact-sheets/language</a>	Immunisation fact sheets in: Arabic, Bosnian, Chinese, Croatian, Dari, Greek, Indonesian, Italian, Karen, Khmer/Cambodian, Macedonian, Maltese, Polish, Russian, Serbian, Sinhalese, Somali, Spanish, Turkish, Vietnamese
Measles, mumps & rubella	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-measles">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-measles</a>	Clinician information: Measles immunisation
	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-mumps">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-mumps</a>	Clinician information: Mumps immunisation
	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-rubella">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-rubella</a>	Clinician information: Rubella immunisation
Varicella	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-varicella">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-varicella</a>	Clinician information: Varicella immunisation
Influenza	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-influenza">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-influenza</a>	Clinician information: Influenza immunisation
	Australian & State and Territory Governments <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/IMM123-cnt/\$File/imm123-fs-2010.pdf">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/IMM123-cnt/\$File/imm123-fs-2010.pdf</a>	Clinician fact sheet: influenza vaccination 2010
Pertussis	Australian Immunisation Handbook <a href="http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-pertussis">http://www.health.gov.au/internet/immunise/publishing.nsf/Content/Handbook-pertussis</a>	Clinician information: Pertussis immunisation
<b>Mental Health</b>		
Postnatal depression	Beyond Blue <a href="http://www.beyondblue.org.au/index.aspx?link_id=7.102&amp;tmp=FileDownload">http://www.beyondblue.org.au/index.aspx?link_id=7.102&amp;tmp=FileDownload</a>	Antenatal and Postnatal Depression - A Guide to management for health

	<a href="#">&amp;fid=1279</a>	professionals
	Beyond Blue <a href="http://www.beyondblue.org.au/index.aspx?link_id=94.751&amp;tmp=FileDownload&amp;fid=1334">http://www.beyondblue.org.au/index.aspx?link_id=94.751&amp;tmp=FileDownload&amp;fid=1334</a>	Emotional Health During Pregnancy and Early Parenthood booklet
	Post and Antenatal Depression Association (PANDA) <a href="http://www.panda.org.au/index.php?option=com_content&amp;view=article&amp;id=11&amp;Itemid=31">http://www.panda.org.au/index.php?option=com_content&amp;view=article&amp;id=11&amp;Itemid=31</a>	Range of consumer fact sheets on antenatal and postnatal depression
	Australian Government Department of Health and Ageing <a href="http://www.health.gov.au/internet/main/publishing.nsf/Content/mental-pubs-m-mangp-toc~mental-pubs-m-mangp-app~mental-pubs-m-mangp-app-12">http://www.health.gov.au/internet/main/publishing.nsf/Content/mental-pubs-m-mangp-toc~mental-pubs-m-mangp-app~mental-pubs-m-mangp-app-12</a>	Edinburgh Perinatal depression scale
	Victorian Department of Health <a href="http://www.health.vic.gov.au/mentalhealth/services/adult/index.htm">http://www.health.vic.gov.au/mentalhealth/services/adult/index.htm</a>	Adult Mental Health Service Areas and Local Government Areas. 24 hour psychiatric triage information, assessment and referral (including CAT teams)
Early parenting centres	Tweddle <a href="http://www.tweddle.org.au/">http://www.tweddle.org.au/</a>	
	O'Connell Family Centre <a href="http://www.mercy.com.au/html/s02_article/article_view.asp?id=200&amp;nav_cat_id=215&amp;nav_top_id=84">http://www.mercy.com.au/html/s02_article/article_view.asp?id=200&amp;nav_cat_id=215&amp;nav_top_id=84</a>	
	Queen Elizabeth Centre <a href="http://www.qec.org.au/">http://www.qec.org.au/</a>	
Private Hospitals with Mother & Baby Units in Melbourne	Northpark Private Hospital <a href="http://www.healthscopehospitals.com.au/info/general/Hospital/get/1565/itemId/">http://www.healthscopehospitals.com.au/info/general/Hospital/get/1565/itemId/</a>	
	Mitcham Private Hospital <a href="http://www.mitchamprivate.com.au/mbu/introduction.asp">http://www.mitchamprivate.com.au/mbu/introduction.asp</a>	
	Albert Road Clinic <a href="http://www.albertroadclinic.com.au/services/parent_infant.asp">http://www.albertroadclinic.com.au/services/parent_infant.asp</a>	
	Masada Private Hospital <a href="http://www.masadaprivate.com.au/mbu/Baby_Unit.asp">http://www.masadaprivate.com.au/mbu/Baby_Unit.asp</a>	
<b>Intimate partner violence</b>		
	Domestic Violence and Incest Resource centre <a href="http://www.dvirc.org.au/">http://www.dvirc.org.au/</a>	Information and referral to specialist support services helpful pamphlets and websites
	Women's Domestic Violence Crisis Service Ph: 9373 0123 or 1800 015 188	Statewide 24 hour crisis support and safe accommodation (refuges) for women and their children
	Immigrant Women's Domestic Violence Service Ph: 8413 6800 <a href="http://www.iwdvs.org.au">www.iwdvs.org.au</a>	Support to CALD women in their primary language
	VicHealth <a href="http://www.vichealth.vic.gov.au/en/Programs-and-Projects/Freedom-from-violence/Intimate-Partner-Violence.aspx">http://www.vichealth.vic.gov.au/en/Programs-and-Projects/Freedom-from-violence/Intimate-Partner-Violence.aspx</a>	The Health Costs of Violence' VIC Health burden of disease report on intimate partner violence
<b>Baby health, growth and development</b>		
General	Royal children's Hospital <a href="http://www.rch.org.au/kidsinfo/index.cfm?doc_id=3665">http://www.rch.org.au/kidsinfo/index.cfm?doc_id=3665</a>	Consumer information: 'Kids Health Info' - medical information

		written for parents. A-Z search function
	Raising Children Network <a href="http://raisingchildren.net.au/">http://raisingchildren.net.au/</a>	Consumer information: comprehensive website with large range of information about babies, children, families and parenting including health, development and safety
Sleep	Raising children Network <a href="http://raisingchildren.net.au/articles/newborn_sleep_nutshell.html/context/13">http://raisingchildren.net.au/articles/newborn_sleep_nutshell.html/context/13</a>	Consumer information 'Newborn sleep in a nutshell'
Growth charts	World Health Organisation <a href="http://www.who.int/childgrowth/standards/en/">http://www.who.int/childgrowth/standards/en/</a>	Clinician information: WHO child growth standards
	Raising Children Network <a href="http://raisingchildren.net.au/articles/what_is_growth.html/context/745">http://raisingchildren.net.au/articles/what_is_growth.html/context/745</a>	Consumer information: growth charts
Vitamin D	Victorian Department of Health <a href="http://www.health.vic.gov.au/chiefhealthofficer/publications/low_vitamin_d_med.htm">http://www.health.vic.gov.au/chiefhealthofficer/publications/low_vitamin_d_med.htm</a>	Clinician information: low vitamin D in pregnancy- key messages for doctors, nurses and allied health
Birthmarks	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Birthmarks">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Birthmarks</a>	Consumer information: birthmarks
Hip dysplasia	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcArticles.nsf/pages/Developmental_hip_dysplasia_explained?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcArticles.nsf/pages/Developmental_hip_dysplasia_explained?open</a>	Consumer information: developmental hip dysplasia explained
Jaundice	Royal Women's Hospital <a href="http://www.thewomens.org.au/Jaundicehyperbilirubinaemiaintheterminfantonthepostnatalwardorinthecommunity">http://www.thewomens.org.au/Jaundicehyperbilirubinaemiaintheterminfantonthepostnatalwardorinthecommunity</a>	Jaundice in the healthy term infant clinical practice guideline. Assessment, investigations, management and algorithms
Sudden Infant Death Syndrome (SIDS)	Better Health Channel <a href="http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Sudden_infant_death_syndrome_(SIDS)_explained?open">http://www.betterhealth.vic.gov.au/bhcv2/bhcarticles.nsf/pages/Sudden_infant_death_syndrome_(SIDS)_explained?open</a>	Consumer information: SIDS explained
	SIDS and Kids <a href="http://www.sidsandkids.org/safe-sleeping/health-professionals/">http://www.sidsandkids.org/safe-sleeping/health-professionals/</a>	Health Professionals Information. Includes: babies head shape, home monitoring, pacifier dummy use, room sharing, room temperature, second hand mattress use, sleeping with baby, smoking, toxic gas, wrapping
	SIDS and Kids <a href="http://www.sidsandkids.org/safe-sleeping/other-languages/">http://www.sidsandkids.org/safe-sleeping/other-languages/</a>	Consumer information: safe sleeping fact sheet in English and many other languages
Safety	Raising children Network <a href="http://raisingchildren.net.au/safety/babies_safety.html">http://raisingchildren.net.au/safety/babies_safety.html</a>	Consumer information: includes first aid, equipment safety, care safety, indoors and outdoors safety
	VicRoads <a href="http://www.vicroads.vic.gov.au/Home/SafetyAndRules/SaferVehicles/ChildRestraints/">http://www.vicroads.vic.gov.au/Home/SafetyAndRules/SaferVehicles/ChildRestraints/</a>	Consumer information on choosing the correct child safety restraint

## APPENDIX 1: LEVELS OF EVIDENCE

The evidence for intervention questions presented in 'The 3 Centres Consensus Guidelines on Antenatal Care' was systematically assessed and classified according to the NHMRC's 'A Guide to the Development, Implementation and Evaluation of Clinical Practice Guidelines (1998)'. Evidence for other questions was generally given the equivalent of Level IV status by consensus of the steering group and clinical epidemiologist.

**Level I Evidence** is obtained from systematic review of all relevant randomised controlled trials

**Level II Evidence** is obtained from at least one properly designed randomised controlled trial

**Level III-1 Evidence** is obtained from well-designed pseudo-randomised controlled trials (with alternate allocation or some other method)

**Level III-2 Evidence** is obtained from comparative studies with concurrent controls and allocation not randomised (cohort studies), case control studies or interrupted time series with a control group

**Level III-3 Evidence** is obtained from comparative studies with historical controls, two or more single arm studies or interrupted time series without a parallel control group

**Level IV Evidence** is obtained from case series, opinions of respected authorities, descriptive studies, reports of expert committees and case studies

## Women's Voices

*"Shared Care is the best kept secret"*

*"It's been great bringing my baby back to the doctor who looked after me when I was pregnant"*

*"My doctor was there throughout the hole (sic) thing which will be my baby's doctor"*

*"We speak same language"*

*"If my GP wasn't able to assist, she sourced the necessary person at the hospital to guide and assist me"*

*"Was great for my GP (and I felt comfortable) to see my progress and if I needed medical attention she was just a phone call away"*

*"Had a good long term relationship with GP...will be baby's doctor"*

*"...convenient for my lifestyle"*

*"I have 3 children so not having to go to the hospital all the time was great"*

*"Helped set up a great relationship for my whole family with our local GP"*

*"...I could see a doctor I knew, liked and trusted"*

*"Shared care was a brilliant process and I would recommend it"*

