> King Edward Memorial Hospital

Reproductive Medicine Clinic

INFORMATION BOOKLET



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Overview of services

King Edward Memorial Hospital (KEMH) runs the only publicly funded fertility clinic in Western Australia.

If you wish to be referred to this clinic you must obtain a referral from your general practitioner (GP) with all relevant information, including:

- · Name, age and date of birth.
- Partner's name and their date of birth. If you are being referred as a single person, the referral should state this.
- Special needs, such as an interpreter.

Please note for referral to Reproductive Medicine, it is essential that a couple have the same GP. If you are a private patient please ensure that you do not access private and public services at the same time.

The Reproductive Medicine Clinic operates every Monday, except public holidays, from 1.00pm to 4.30pm and during this time both new and follow up couples and/or single people will be seen. Patients seeking advice on fertility following a diagnosis of cancer are also seen.

Accceptance to the Reproductive Medicine Clinic assumes that the individual/couple adhere to the protocols of the reproductive program. This involves taking responsibility for completing the investigations required and taking medication as prescribed. Failure to do so may jeopardise your health and/or your involvement in this program.

Please be aware that **King Edward Memorial Hospital** (KEMH), as a publicly funded service, is currently unable to offer fertility treatment to:

- Women 41 years of age and over, before the first appointment.
- Those requesting reversal of sterilization for either women or men.
- Those with infertility due to voluntary sterilisation.
- Women who have a Body Mass Index of higher than 35 (GP can calculate).
- Couples who have children from their current relationship are not eligible. for Assisted Reproductive Technology (ART) i.e. IVF.
- Individuals/couples using illicit drugs (this may be checked at the clinic).
- · Anyone currently in prison.
- Women and/or partner who are not covered by Medicare.

An understanding of the English language is required. Tracking and advice/information is conducted via the telephone.

Individuals/couples attending the Reproductive Medicine Clinic are expected to take responsibility for cancelling and rescheduling the appointments they cannot keep at least one week prior to that date.

General Information

Clinic time: Monday 1.30pm to 4.30pm

The two fertility nurses may deal with issues between

clinic days.

Staff involved: Professor Roger Hart

Lead Clinician for Reproductive Medicine

Dr Lucy Williams Gynaecologist Fertility Specialist Dr Roger Perkins Gynaecologist Fertility Specialist

Ms I Rodino

Infertility Counsellor Reproductive Fellow Senior Registrar

Registrar Resident

Co-ordinator Reproductive Medicine Clinic

Reproductive Medicine Nurse

Ward Clerk Dietician Social worker

Interpreters: KEMH offers a Language Service.

If an interpreter is required for your clinic appointment please advise staff when your first appointment is made.

Contact times: Monday 8.00am to 5.00pm and Tuesday to Friday 1pm to

4pm on (08) 9340 2222 ask to page 3304

Preconception information

Primary infertility is defined as inability to achieve a pregnancy after one year of regular intercourse (approximately two or three times a week).

Secondary infertility is having conceived previously, but now unable conceive after one year of regular intercourse (approximately two or three times a week).

Approximately one in six couples will have trouble conceiving.

Important issues relating to fertility

Patients who are attending this clinic will be expected to be responsible for their general health by maintaining normal weight and a healthy lifestyle. This can be achieved with the support of their GP and the many services which are available in the general community.

It is increasingly recognised that lifestyle choices affect a woman's ability to fall pregnant.

- Body weight, tobacco smoking, alcohol intake, illicit drug use, or the taking of some prescription medications affects the fertility of both men and women.
- Men and women who are overweight or women who are underweight are much less likely to conceive.
- Men and women who smoke tobacco reduce their chances of the woman falling pregnant.
- Women who drink more than four measures of alcohol (per week) and men who drink more than eight measures of alcohol (per week) significantly reduce their chances of conceiving.
- Men and women who take illicit (recreational) drugs or substances will
 markedly reduce the chances of conceiving and risk causing severe harm
 to their growing baby.

We recommend all women planning conception take a regular Folate (folic acid) supplement, 500mcg is appropriate on a daily basis.

Discuss with your GP if there is any family history of neural tube defects.

It is also important to ensure that early access to antenatal care is sought, once you are pregnant, in order to maximise the health of both the baby and mother.

Diet to improve fertility

Being overweight or obese are considered serious problems that will reduce the chance of conceiving, increase the risk of miscarriage, reduce the choice of fertility treatments and increase the possibility of complication in pregnancy. Sedentary lifestyle and an inappropriate diet are the main causes.

KEMH is unable to offer fertility treatment to couples where the woman has a Body Mass Index (BMI) greater than 35.

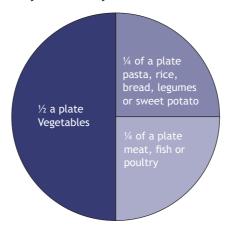
BMI is calculated by: Weight
Height (in metres) × Height (in metres)

Many studies have now shown that overweight women who have difficulty becoming pregnant can increase fertility after a moderate weight loss.

Weight loss is a challenge for many women but it is achievable with a combination of healthy diet and regular exercise and support.

What type of eating plan should I follow?

- Eat a wide variety of nutritious foods and base meals on vegetables with moderate amounts of whole grains and protein.
- Choose low glycemic index carbohydrates and try to have one of these at each meal. For example legumes, pasta, wholegrain breads and cereals, basmati rice, sweet potato and some fruits and vegetables. Follow this plate model to limit your carbohydrate intake.



- Avoid foods high in saturated fat and trans fat. These can be replaced by 'healthy fats' particularly monounsaturated fat. For example nuts and nut oils, avocado, olive oil, canola oil and margarines based on olive and canola oil.
- How food is prepared will also affect the fat content, e.g. steamed instead of deep fried.
- Choose lean protein foods which are low in saturated fat. This includes
 fish at least two times a week. For example fresh or canned fish in
 brine/water, chicken with the skin removed, pork with the fat removed,
 lean red meat (without fat marbled through the meat) with visible fat
 removed, eggs, nuts and legumes. Limit fatty meats including sausages
 and delicatessen meats such as salami and polony.
- Eat at least two serves of fruit and five serves of vegetables each day.
- Make sure you are consuming at least three serves of foods high in calcium, for example low fat milk, yoghurt, cheese or calcium fortified soy milk.
- Make sure you are consuming enough foods high in iron, for example lean meat, fish, poultry and iron fortified cereals.
- Balance your overall food intake with physical activity to maintain a
 healthy weight. Aim to do 30 minutes of moderate intensity activity
 such as walking, cycling or swimming at least five days per week. Make
 exercise a daily habit and try not to go longer than two days without
 exercise as improvements can be lost.

For an individualised meal plan and personal support you can see the dietician at your fertility appointment.

Useful website for healthy eating/meal plan ideas: www.csiro.au/science/health

Women and smoking

Tobacco smoking reduces fertility and increases the risk of ectopic pregnancy. Passive smoking is also harmful to conception.

- Women who smoke may experience menopause earlier than non-smokers.
- Smoking appears to accelerate the loss of eggs and reproductive function and may in fact advance menopause by several years.
- Components in cigarette smoke have been shown to interfere with the ability of the cells in the ovary to make oestrogen. This can result in genetic abnormalities which may increase the risk of spontaneous miscarriage and possible ectopic pregnancy.
- Nearly twice as many IVF attempts are required for tobacco smokers to conceive.
- Older women who smoke tobacco have a reduction in natural fertility which may not be overcome with IVF or other fertility treatments.
- Research has shown that stopping smoking prior to IVF improves the chances of pregnancy.
- Pregnant women who smoke are more likely to have low birth weight babies and premature births.
- There is also an increased incidence of sudden infant death syndrome in a household where someone smokes.

Men and smoking

Men who smoke cigarettes generally have a lower sperm count, decreased motility, increased abnormalities in sperm shape and inability to maintain an erection. Some studies have shown an increase in the risk of childhood cancers in the children of men who smoke.

Drugs (recreational)

- Caffeine is the most widely used drug in the world and includes coffee, cola drinks and chocolate. Women who consume large amounts of caffeine may have difficulty sleeping, high blood pressure and problems with fertility.
- Some studies have shown an increase risk of miscarriage with an increase of caffeine intake.
- Complimentary medicines/over the counter medications always check with your doctor prior to taking these medicines and/or herbs as very little is known as to their effects on fertility related issues.

Alcohol

"There is no safe level of drinking. No alcohol is the safest approach"

- World Health Organization.

Women:

- Heavy consumption and dependence on alcohol may cause menstrual and fertility problems and effect the ability of the woman to care for a child.
- It may also cause failure to ovulate and early menopause.

Men:

 Long term effects of heavy alcohol consumption include impotence, shrinking of the testicles and damaged or reduced production of sperm.

Drugs (illicit)

All illicit drugs affect fertility.

- Opiates both men and women can have a reduced desire to have sex.
 Women may have reduced or have absent menstruation and men have difficulty maintaining an erection.
- Cannabis women who smoke cannabis regularly may not menstruate regularly, thereby reducing ovulation. Men are less likely to produce the male hormone testosterone and therefore will have reduced mobility of sperm.

Some factors involved in infertility

Infertility is an issue that affects both men and women. There can be many causes for infertility. Those factors relevant to you and your partner will be discussed in detail at your appointment.

Some of these symptoms leading to infertility are listed below.

Age

- A woman's fertility falls as she gets older. A 35 year old woman's chance of conception is half that when she was 25 years old.
- Male fertility also decreases with age.
- In both men and women the chance of abnormalities in children increases with age.

Polycystic Ovary Syndrome (PCOS)

PCOS is a common reproductive endocrine disorder, affecting approximately five per cent of women.

Symptoms of PCOS may include:

- Irregular menstrual cycles
- Increased androgens (male hormones) in blood test
- Dark facial hair and acne
- Characteristic cysts on the ovaries as seen on ultrasound

Endometriosis

This is a common condition in which the lining of the uterus (endometrium) grows outside the uterine cavity. This may be the cause of painful periods, infertility and pain with intercourse.

Tubal blockage

The majority of tubal blockages are caused by inflammation. Occasionally severe endometriosis can block tubes.

Hysterosalpingogram (HSG) or Hycosy ultrasounds are used to diagnose tubal blockage. A laparoscopy and dye are also used to diagnose the condition.

Unexplained (idiopathic)

For around one in ten couples investigated, no cause is found.

Male factors

- Low numbers of sperm and poor sperm movement can have an impact on fertility.
- Abnormally shaped sperm can also result in failure to conceive.
- An abnormal level of white blood cells could indicate an infection or slightly enlarged prostate in older men.
- Varicocele which is varicosity of the veins around the testes can occasionally cause infertility.
- Damage to the testicles, such as by injury or after a mumps infection.
- Spinal cord injuries also reduce sperm production, and may cause problems with sexual function.
- Failure of one or both of the testes to descend into the scrotum.
- Genetic or chromosomal abnormalities may reduce sperm production.

Some of the investigations involved

An example of what may happen while attending the clinic over time is detailed below:

- On attendance at the first appointment, each person involved has a detailed medical and social history taken, to ascertain possible causes of infertility.
- Baseline tests attended to by your referring GP will be reviewed at this
 time (a description of what tests are needed are sent to you prior to your
 first appointment with this clinic).
- Based on the above, a plan for treatment and/or investigations is formulated between the patient and the doctor.
- It may be that further tests will be required. This will be explained to you when you meet the fertility nurse who will also explain the various investigations required.

Common words used

Tracking - regular blood tests which indicate whether or not ovulation has taken place, observing the various hormones throughout the menstrual cycle.

Ultrasounds - assess uterine cavity and the fallopian tubes.

Operations - laparoscopy and dye, if a condition such as pelvic inflammatory disease or endometriosis is suspected.

Ovulation induction - a treatment given to women who experience anovulatory infertility. With a tablet known as Clomid or injections such as Puregon and/or Gonal F, women may achieve ovulation.

Super ovulation - is a treatment given to women who ovulate regularly, the aim being to produce two follicles rather than one. Hormone injections may also be given to males in certain circumstances.

Acknowledgements

Dietetics Department, KEMH

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World Health Organisation

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This information is available in alternative formats upon request

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