Fertility facts for health professionals

Most people want and expect to have children sometime in their life. For some, age and lifestyle factors reduce their chance of having a baby. Health care professionals are in an ideal position to raise awareness about the effects of age and lifestyle on fertility and pregnancy outcomes and the importance of preconception health.

You can help your patients by asking them if they wish to have children and making them aware of the factors that will help or hinder being able to conceive and have a healthy baby. Consultations about reproductive health matters provide an opportunity to begin a conversation about fertility.

The Your Fertility program aims to give women and men who want to become parents the information they need to optimize their chance of achieving this. www.yourfertility.org.au provides clear and accurate information for the general public and health professionals about the factors that influence fertility and pregnancy health.

Facts about fertility to share with patients

This is a summary of existing scientific evidence about the ‘Top 5 Fertility Factors’. A reference list is available at www.yourfertility.org.au. In addition to these, many other factors influence fertility and reproductive outcomes including sexually transmitted infection (STIs), environmental toxins, diet, and exercise.

**Age**

- Women’s fertility declines gradually starting at about 32 years of age. It decreases more rapidly after 35 years of age.
- The risk of miscarriage increases as a woman gets older.
- The quantity and quality of sperm declines as men get older, starting at about 45 years of age.
- Female partners of men over the age of 45 take five times longer to conceive compared to partners of men aged 25 or less.
- As men get older, the risk of chromosomal abnormalities and birth defects in the children they father increases. Also, children of older fathers have an increased risk of having an autism spectrum disorder.
- Postponing parenthood increases the risk of involuntary childlessness and smaller families than desired.
- Assisted reproductive treatment (ART) cannot overcome age-related infertility.
- The risks of pregnancy complications such as gestational diabetes, pre-eclampsia, placental abruption, intrauterine growth restriction, premature birth, stillbirth, and caesarean section increase as women get older.
Weight

- Obesity in women can cause hormonal changes that interfere with ovulation and reduce a woman’s fertility.
- Obese women take significantly longer to conceive than women in the healthy weight range.
- The chance of success with ART treatment is significantly lower for obese women than for women in the healthy weight range.
- In men, obesity is associated with lower fertility. This is likely due to a combination of factors including hormone problems, sexual dysfunction and/or other health conditions linked to obesity.
- Obesity in women increases the risk of miscarriage, gestational diabetes, hypertension, and premature birth, congenital abnormalities, high birth weight, stillbirth and perinatal death.
- Children born to obese mothers have poorer health outcomes at birth and into adulthood than those with mothers in the healthy weight range.

Alcohol

- There is a negative relationship between the chance of conception and the amount of alcohol consumed.
- Partners of men who consume more than 20 drinks of alcohol per week take longer to conceive than partners of men who drink less.
- The National Health and Medical Research Council advises that for women who are pregnant or planning a pregnancy, not drinking alcohol is the safest option.
- Maternal smoking increases the risk of low birth weight and birth defects.
- Smoking can damage sperm DNA.

Timing of sex

- While conception is theoretically possible during the ‘fertile window’ which is the six days leading up to ovulation, the chance of conception is dramatically increased if intercourse occurs during the three days leading up to and the day of ovulation.
- Time of ovulation can be calculated by subtracting 14 days from the average cycle length.
- Paying attention to the appearance of cervical mucus changes can help identify the fertile window. A few days before ovulation, the cervical mucus increases and becomes clear, stretchy and slippery.
- An ovulation calculator is available at www.yourfertility.org.au