



Maternal and Fertility Nutrition

Specialist Group

Male Fertility

This leaflet offers diet and lifestyle advice to improve your overall general health and fertility.

What is Infertility?

Infertility is when a couple cannot get pregnant (conceive) despite having regular unprotected sex. It affects around 1 in 7 couples in the United Kingdom. Male infertility is the cause for up to half of these cases.

Male infertility has many causes: genetic, medical abnormalities or lifestyle issues. Smoking, obesity, poor diet and environmental factors (like pollution or exposure to harmful pesticides and chemicals) can also cause oxidative stress. This stress may cause damage to the sperm and affect its ability to fertilise an egg and grow a healthy baby. Fertility in both men and women reduces as you get older.

It takes between 2 – 3 months for new sperm to fully mature. That means it's a good idea to think about making changes to your diet and lifestyle at least 3 months before you try for a baby. A fertility dietitian can give you individualised, evidence-based diet and lifestyle information to help improve your chances of conception.



What Steps Can I Take to Improve My Fertility?

Nutrition

Start with a balanced diet. The following points may also help improve fertility:

Mediterranean Diet

The Mediterranean diet is linked with good health and may help male fertility. This diet is high in vegetables, fruits, legumes, nuts, beans, cereals, grains and fish. It uses unsaturated fats such as olive oil, with lower intakes of meat, dairy and alcohol. A fertility dietitian could help you adapt this diet to your cultural diet.

Fruit and Vegetables

Fruit and vegetables are packed with essential vitamins, minerals, fibre and other plant nutrients such as antioxidants, which are vital for good health and sperm quality. Aim for five or more portions each day; fresh, frozen and canned all count!

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Carbohydrates

Wholegrains, including oats, brown rice, whole wheat, pulses and millets all help male fertility. They are an excellent source of fibre, B vitamins and folic acid, essential fatty acids (omega 3 fats), protein, antioxidants, including vitamin E and selenium.

Protein

Men with a higher intake of protein from lean meat and vegetarian protein have better sperm quality. Aim for a variety of lean protein such as lean red meat, fish, chicken, turkey and vegetarian protein sources such as eggs, low-fat dairy produce, soya, pulses, beans, lentils, peas, tofu and nuts.

Fats

Aim to limit your intake of saturated fats (mainly animal fats) and increase your intake of unsaturated fats, generally found in plants. The best sources of unsaturated fats are oily fish such as salmon, mackerel, herring and sardines. Eat nuts and seeds such as walnuts and pumpkin seeds every day to help improve your sperm quality. Use olive oil for cooking.

Eat less salt and added sugar

High sugar and salt intake may be harmful to male fertility. It is important to reduce your intake of processed foods and added sugars from fizzy drinks, biscuits, cakes, and confectionery.

Key Nutrients to Improve Male Fertility and Sperm Quality

Nutrient	Reported Benefits	Food source	Daily recommendation	Examples of food source meeting recommendation
Coenzyme Q10	Improvement in sperm quality	Lean red meat Seafood Dairy Vegetable oils Soy beans	No specific dietary intake recommendations	Beef tenderloin 2.4mg per 85g
Vitamin C	Improvement in sperm quality and oxidative stress	Citrus fruits Berries Kiwi fruit Tomatoes Broccoli Sprouts	40mg	45.6mg/ 1 handful of strawberries
Vitamin E	Improvement in sperm quality and oxidative stress	Vegetable oils Avocado Nuts Seeds Wholegrains Spinach	15mg	14.6 mg/ 2 handfuls of toasted almonds
Folate	Improvement in sperm quality	Spinach Broccoli Green peas Brussel sprouts Avocado Fortified breakfast cereals	200µg	263µg/ 1 cup of cooked spinach

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Nutrient	Reported Benefits	Food source	Daily recommendation	Examples of food source meeting recommendation
L-Carnitine	Improvement in sperm quality	Red meat Dairy Fish Chicken Avocado	No specific dietary intake recommendations	8mg per cup of whole milk
Omega 3	Improvement in sperm quality and sperm function	Oily fish Nuts Seeds Seafood Oils	450mg	427mg/ ½ packet (50g) of smoked salmon
Selenium	Improvement in sperm quality and oxidative stress	Brazil nuts Seafood and fish Red meat Chicken Brown rice Dairy	75µg/d	76.2µg/ a handful of Brazil nuts
Zinc	Improvement in sperm quality	Oysters Crabmeat Dark chicken meat Nuts and seeds	9.5mg	29.6mg/ 1 medium oyster

If you are not able to get enough of these nutrients in your diet, talk to a fertility dietitian. They can help you to decide on which supplement is most suitable. There are many expensive vitamins and dietary supplements available aimed at male fertility, but taking too much or too many could lead to you getting harmful levels of some of the ingredients.

Lifestyle

Benefits of a healthy weight

If you are overweight or obese, losing just 5-10% of your weight has massive benefits to your fertility and overall health.

More information on weight loss can be found here: [BDA Food Fact 'Weight Loss'](#)

Top Tips for Conception

- *Adopt a healthy lifestyle; eat a varied, balanced diet and keep active.*
- *Being underweight or overweight can affect your fertility; so aim for a healthy BMI of 20-25 kg/m².*
- *Aim for a minimum of 5 portions of fruit and vegetables a day; choose a variety of brightly coloured fruit and vegetables.*
- *Include mixed nuts, fish and seafood as a regular part of your diet to get other key nutrients that improve fertility.*
- *Have sex regularly, 2 to 3 times a week and especially around the time your partner ovulates (releases an egg from the ovary).*
- *Drinking too much alcohol can affect the quality of your sperm. Stick to a maximum of 8 units/week spread over 3 days or more.*

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- *Smoking and taking recreational drugs can also damage your sperm. We know it is hard to stop so please use the help, support and advice available to you.* 
- *If you have a medical condition, such as Diabetes or Thyroid Disease, see your GP who can help you to keep it well controlled.*
- *Stay cool. A raised temperature in your scrotum can negatively affect your sperm quality. Avoid long periods of sitting, taking hot baths, wearing tight-fitting underwear or keeping mobile/laptops directly on your lap.*
- *Learn to relax. Reduce the amount of stress in your life. It is important to get 7-9 hours of uninterrupted sleep a night.*

Important Links:

'Producing a semen sample for analysis', <https://www.britishfertilitysociety.org.uk>

'Understanding the result of your semen analysis', <https://www.britishfertilitysociety.org.uk>



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Find out more at bda.uk.com/maternalfertility

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