Brief overview of Temperature



Information gained from the temperature graph

The basal body temperature (BBT) graph can give **three** pieces of information and that is why BBT is used as a fertility indicator:

- 1. That ovulation has occurred.
- 2. That ovulation has not occurred.
- 3. It can confirm pregnancy

The Temperature Chart in an ovulatory cycle shows a **biphasic pattern**, i.e. it is low in the first part of the cycle before ovulation and high in the second part of the cycle after ovulation. This rise in basal body temperature (BBT) is called the **thermal shift** and is the sign that **ovulation has occurred**. (What Information Can Be Got From The Temperature Graph?)

What is the BBT - when do you take the temperature?

The **Basal Body Temperature** is the temperature taken immediately on waking, before getting out of bed, and after a minimum of 3 hours continuous sleep. No food or drink should be taken before the temperature is taken. The temperature must be taken at the **same time** every morning as normal body temperature varies during the day because of the **circadian rhythm**. The temperature difference between the lower-phase temperature and the higherphase temperature may be quite **small** and as taking the temperature an hour later or earlier than usual will give a higher or a lower reading, this emphasises the **importance** of **recording** the temperature at the **same time** every day. A special thermometer is used to measure BBT. (<u>Which Thermometer to</u> <u>measure BBT?</u>)

What is the Thermal Shift?

The 'thermal shift' or rise in BBT is the only fertility indicator that confirms ovulation. This makes it therefore, the most useful sign to confirm the end of the fertile phase of the cycle. When the woman observes a sustained rise in temperature as defined by the rules of the symptothermal double-check method of natural family planning she knows that the definitely infertile phase of the cycle has begun. The phase of the cycle after ovulation is called the 'definitely infertile phase' as the ovum is dead and no further ovulation will occur in that cycle.

What causes the rise in temperature after ovulation?

The hormone **progesterone** causes the rise in basal body temperature. After the mature ovum (egg) is released from the ovarian follicle in the ovary into the fallopian tube (i.e. ovulation), the cells lining the ruptured ovarian follicle in the ovary become a small gland called the corpus luteum, which secretes the hormone progesterone. The rise in BBT is due to progesterone, therefore the **thermal shift** indicates ovulation has occurred as progesterone is present only after ovulation.

Definition of a thermal shift

A thermal shift is defined by the **rules** of the symptothermal double-check method of natural family planning and these rules must be taught to the woman by a qualified NFP teacher.