

# Vitamin K for newborn babies

Information leaflet



This leaflet has been written to help you decide whether your baby should receive a vitamin K supplement at birth.

Gender inclusive language in Maternity and Perinatal Services:

This leaflet uses the terms mother/mothers throughout. This term should be taken to include people who do not identify as mothers but who are birthing people/parents.

The term parent should be taken to include anyone who has main responsibility for caring for a baby.

## What is vitamin K?

Vitamin K is needed for the normal clotting of blood and is naturally made in the bowel.

# Why is vitamin K given to newborn babies?

All babies are born with low levels of vitamin K. Several days after birth, a baby will normally produce their own supply of vitamin K from natural bacteria found in their bowel. They can also get a small amount of vitamin K from their mother's breast milk and it is added to formula milk. This can help the natural bacteria in the baby's bowel to develop, which in turn improves their levels of vitamin K. However, have a higher chance of developing vitamin K deficiency until they are feeding well.

A deficiency in vitamin K is the main cause of vitamin K deficiency bleeding (VKDB). This can cause bleeding from the belly button, nose, surgical sites (i.e. following circumcision), and (rarely) in the brain.

The chance of this happening is approximately 1 in 100,000 for full term babies.

VKDB is a serious disorder, which may lead to internal bleeding. Signs of internal bleeding are:

- blood in the nappy
- oozing (bleeding) from the cord
- nose bleeds
- bleeding from scratches which doesn't stop on its own
- bruising
- prolonged jaundice (yellowing of the skin) at three weeks if breast feeding and two weeks if formula feeding.

VKDB can also lead to bleeding on the brain, which can cause brain damage and/or death.

By giving newborn babies a vitamin K supplement at birth, the chance of developing VKDB can be almost completely prevented.

# Do some babies have a higher chance of developing VKBD than others?

Babies who are thought to have a higher chance of developing VKBD include those who:

- are premature
- had a complicated birth requiring the use of forceps or ventouse, or where bruising has taken place
- have liver disease
- cannot absorb fat-soluble vitamins due to diarrhoea, coeliac disease or cystic fibrosis
- are babies of mothers taking anti-convulsant medications
- are babies of mothers with significant liver disease.

It is impossible to identify babies who will definitely have a high chance of having VKDB. 1 in every 4 babies who develop VKDB have none of the problems above.

Although the Oxford University Hospital NHS Foundation Trust and the Department of Health recommend that all newborn babies are given vitamin K, the decision to give it to your baby is entirely yours.

# Is vitamin K harmful?

A concern was expressed in the early 1990s that there was a link between vitamin K supplements and leukaemia or other cancers. A careful review of data from the UK Children's Cancer Study Group in 2003 found no evidence to support this.

## Are there any alternatives?

Vitamin K supplements are the only way to give enough of the vitamin to prevent VKDB in newborn babies.

#### How is vitamin K given?

Vitamin K is given either by mouth, through a syringe, or by injection into the muscle in the leg.

Vitamin K is usually given by injection to babies born in the Oxford area. One dose is given at birth and this does not need to be repeated.

If you choose to give your baby vitamin K by mouth, they will need up to three doses to achieve the same effectiveness as the injection. The first dose is given at birth; the second at four to seven days of age by your community midwife; and the third (given to babies who are having breast milk for more than half of their feeds) at one month old by your health visitor.

It is very important that your baby receives these follow up doses of oral Vitamin K, as they help to reduce the chance of late onset VKDB.

Vitamin K is added to formula milk, so a third dose is not needed for babies who have half or all of their feeds from formula milk.

If your baby is premature or poorly when they are born, they will be admitted to the Neonatal Unit and will be given vitamin K by injection as part of their hospital treatment/care.

The current preparation used for both Intramuscular injection (an injection given into the muscle) and oral (by mouth) administration of vitamin K is derived from an animal (bovine) source. The manufacturers have confirmed that vitamin K is appropriate for those who follow a Halal or Kosher diet. There is currently no other vitamin K product licensed and available for use as an alternative (instead).

#### **Further information**

If you need further information, please contact your community midwife or GP. The following websites and information may also be helpful.

#### **NHS Choices**

Website: www.nhs.uk/Conditions/pregnancy-and-baby

#### National Institute for Health and Care Excellence (NICE)

Website: www.nhs.uk/pregnancy/labour-and-birth/after-thebirth/what-happens-straight-after/

#### Royal College of Obstetrics and Gynaecology (RCOG)

Website: www.rcog.org.uk/media/1kjbcouw/pi-healthyeating-and-vitamin-supplements-in-pregnancy.pdf

#### **Reference:**

Electronic Medicines Compendium (EMC) – list of excipients Website: **www.medicines.org.uk/emc/product/9754**  You can also speak to your community midwife if you have more questions about Vitamin K and VKDB.

#### **Further information**

If you would like an interpreter, please speak to the department where you are being seen.

Please also tell them if you would like this information in another format, such as:

- Easy Read
- large print
- braille
- audio
- electronic
- another language.

We have tried to make the information in this leaflet meet your needs. If it does not meet your individual needs or situation, please speak to your healthcare team. They are happy to help.

We would like to thank the Oxfordshire Maternity Voices Partnership for their contribution in the development of this leaflet

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