



Consensus Statement: **Vitamin K Prophylaxis for the Newborn**

The New Zealand College of Midwives recognises the administration of Vitamin K as a prophylactic intervention in the prevention of Vitamin K Deficiency Bleeding (VKDB) in the newborn.

Rationale:

- Vitamin K is an essential factor in blood clotting ¹⁻³.
- Vitamin K deficiency can be a cause of bleeding in a baby in the first weeks of life. This is known as Vitamin K Deficiency Bleeding (VKDB) (previously known as Haemorrhagic Disease of the Newborn (HDN)) ¹⁻⁷.
- VKDB is classified into three categories: early, classic and late onset bleeding. Early onset occurs within 24 hours post partum, classic onset occurs on days one to seven; and late onset occurs from weeks 2-12 ¹⁻⁷.
- Vitamin K is recommended to be given prophylactically after birth for the prevention of VKDB ¹⁻⁷.
- Vitamin K can be given intra-muscularly, orally or not at all ^{1,2,5}

Guidelines:

Midwives need to ensure the woman is informed and supported to reach her own decision on whether Vitamin K is to be given intra-muscularly, orally or not at all.

The principle of informed choice and consent must always be upheld in discussion with the woman, and in the administration of Vitamin K to her baby after birth. Whether the woman accepts or declines the administration of Vitamin K for her baby, all discussions and decisions are to be clearly documented in the woman's health care record ⁹.

During the antenatal period, the woman needs to be provided with the current research based information in relation to Vitamin K administration to her baby following birth.

Aspects of the woman's health that need to be considered at this time are whether:

- the woman is on anti-convulsant therapy
- the woman is on anti-coagulant therapy
- the woman is currently on or has had antibiotic therapy during pregnancy or whilst breastfeeding
- the woman is on anti-tuberculosis therapy
- the woman has any history of liver disease

When the woman has made a decision antenatally not to give her baby Vitamin K, the midwife must consider the situations during labour and birth that may affect this decision. These would include: the above situations and:

- Premature baby (less than 36 weeks gestation)
- Birth asphyxia
- Traumatic birth
- Cephalhaematoma
- Known hepatic disease

If any of the above situations arise further discussion with the woman needs to occur so that she has the opportunity to review her decision regarding the administration of Vitamin K and / or the route of administration ^{2, 3, 4, 6, 8, 9}.

Midwives need to ensure that women are aware of the signs and symptoms of Vitamin K Deficiency

Bleeding whether or not Vitamin K has been administered to the baby⁵⁻⁷. These include:

- Spontaneous bruising
- Bleeding from the nose or umbilicus
- Malaena or bleeding from the bowel
- Prolonged jaundice
- Blood stained vomit or significant haematemesis
- Impaired neurological response
- Less responsive behavior

Any concerns require referral to paediatric services for further investigation.

References:

1. Darlow BA, Phillips AA, Dickson NP. New Zealand surveillance of neonatal vitamin K deficiency bleeding (VKDB): 1998-2008. *Journal of Paediatrics and Child Health* 2011; 47(7):460-4.
2. Puckett RM, Offringa M. Prophylactic vitamin K for vitamin K deficiency bleeding in neonates. *Cochrane Database of Systematic Reviews* 2000, Issue 4. Art. No.: CD002776. DOI: 10.1002/14651858.CD002776.
3. Lippi, G., & Franchini, M. Vitamin K in neonates: facts and myths. *Blood Transfusion*, 2011: 9(1), 4–9. <http://doi.org/10.2450/2010.0034-10>
4. Clarke, P. Vitamin K prophylaxis for preterm infants. *Early Human Development* 2010; 86(1 suppl):17-20.
5. Foetus and Newborn Committee, NZCOM, NZNO and MOH, Vitamin K Prophylaxis in the Newborn May 2000 (Revised 2013) *MEDSAFE Publications: Prescriber Update* No21:36-40
6. Johnson, P.J. Vitamin K Prophylaxis in the Newborn: Indications and Controversies. *Pointers in Practical Pharmacology Neonatal Network*, 2013Vol 32. No 3 May/June. <http://dx.doi.org/10.1891/0730-0832.32.3.193>
7. Sankar, M. J., Chandrasekaran, A., Kumar, P., Thukral, A., Agarwal, R., & Paul, V. K. Vitamin K prophylaxis for prevention of vitamin K deficiency bleeding: a systematic review. *Journal of Perinatology*, 2016: 36 Suppl S29S35. <http://doi.org/10.1038/jp.2016.30>
8. MIDIRS. Vitamin K — the debate and the evidence. *MIDIRS* 2000. 2nd ed. Bristol
9. New Zealand College of Midwives, *Midwives Handbook for Practice*. 5th ed. 2015, Christchurch: New Zealand College of Midwives.

Bibliography:

Donley, J. (1992). Vitamin K in Relation to Haemorrhagic Disease of the Newborn *New Zealand College of Midwives Journal*, December; Pg 17-18

Harvey B (2008). Newborn vitamin K prophylaxis: developments and dilemmas. *British Journal of Midwifery* 16(8):516-9.

Vitamin K: Does my baby need it? A decision making guide.
Women's Health Action Trust, Auckland

What do I need to know about VITAMIN K? (2008). Parents Centre *Kiwiparent* October/November

Wickham S. (2013). Revisiting vitamin K and the newborn: what have we learned in a decade? *Essentially MIDIRS*. July/August ; Volume 4 : Number 7

Ratification:

*Original Statement ratified New Zealand College of Midwives AGM September 2000
References updated August 2016*

The purpose of New Zealand College of Midwives Consensus Statements is to provide women, midwives and the maternity services with the profession's position on any given situation. The guidelines are designed to educate and support best practice. All position statements are regularly reviewed and updated in line with evidence-based practice.