

Breech Presentation at Term Management	
Type: Protocol	HDSS Certification Standard
Issued by: Maternity PPG Group	Version: 2.0
Applicable to: Maternity	Contact person: Midwife Educator
Lead DHB: HVDHB	Level:

Hutt Maternity Policies provide guidance for the midwives and medical staff working in Hutt Maternity Services. Please discuss policies relevant to your care with your Lead Maternity Carer.

Principles:

Hutt Maternity are committed to meeting our obligations under Te Tiriti o Waitangi. We continue to develop our relationship with the Māori Health Unit and their involvement has been sought out and their views embedded in our policy.

The right of a consumer to make an informed choice and give informed consent, including the right to refuse medical treatment, is enshrined in law and in the Code of Health and Disability Consumers' Rights in New Zealand. This means that a health consumers can choose to decline treatment, referral to another practitioner, or transfer of clinical responsibility. If this occurs follow the process map on page 18 of the *Guidelines for Consultation with Obstetric and Related Medical Services (Referral Guidelines) 2007*.

Purpose:

The purpose of this protocol is to;

- Establish a local approach to care, that is evidence based and consistent
- Inform good decision making
- Provide safe and consistent advice and care to pregnant people whose baby is presenting breech at term

Scope:

- All obstetric, midwifery and paediatric staff employed by the Hutt Valley DHB
- All maternity providers with Hutt Valley DHB maternity access agreements acting as Lead Maternity Carers.

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Definitions:

CEFM – Continuous Electronic Fetal Monitoring

CS – Caesarean Section Birth

ECV – External Cephalic Version

EFW – Estimated Fetal Weight

Rumping – the time in which the breech distends the perineum and is born to the widest point of the pelvis at the bitrochanteric diameter

TBT – Term Breech Trial

VBB – Vaginal Breech Birth

VCB – Vaginal Cephalic Birth

Background

Breech presentation occurs in 3-4% of term pregnancies¹. There are generally three classifications of breech presentation:

- Frank (hips flexed, legs extended)
- Complete (hips and knees flexed, legs not below fetal buttocks)
- Incomplete/Footling (one or both feet presenting before fetal buttocks, with/without flexion of the hips)

Breech presentation in the antenatal period

Breech presentation in the antenatal period <34/40 gestation

- The majority will undergo spontaneous version by 36 weeks of age
- Plan to rescan at 34-36 weeks to enable time for referral if breech presentation persists

Persistent breech presentation >34 weeks

- Ultrasound examination to confirm breech presentation
- Assess growth, liquor volume, attitude of fetal head
- Recommend obstetric consultation as soon as possible per *Guidelines for Consultation with Obstetric and Related Medical Services (Referral Guidelines) 2007*:

Code	Condition	Description	Referral category
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4016	Malpresentation	> 36 weeks; breech, transverse, oblique or unstable lie	Consultation
5006	Malpresentation	Compound presentation	Transfer
		Breech diagnosed in labour	Consultation

Consultation under the referral guidelines warrants a three way discussion between the pregnant person, their LMC and obstetric staff with all counselling thoroughly documented. Breech presentation does not necessitate an automatic transfer to obstetric care, either antenatally or in labour.

Counselling the woman with persistent breech presentation > 36 weeks

There are three options available in the management of breech presentation at term:

- External cephalic version
- Planned caesarean section birth
- Planned vaginal breech birth

All three options should be offered in an objective manner to the pregnant person to enable informed decision making.

External Cephalic Version

All patients with a breech presentation at term should be offered an ECV unless there are absolute contraindications to an ECV². They should be advised on the risks and benefits of ECV and the implications for mode of birth.

See MATY027 External Cephalic Version (Procedure) Policy

Planned caesarean section birth vs. planned vaginal breech birth

Breech presentation is associated with an increased risk of perinatal mortality and neonatal morbidity, regardless of mode of birth. Practice has shifted substantially towards planned CS in the decades before and after the publication of the Term Breech Trial³. However the absolute risk for all modes of birth is small, and subsequent meta-analyses have concluded that individuals should be informed of the risks of VBB, the present and future risks of CS, and our lack of accurate knowledge in the latter, so that as informed a choice as possible can be made in each case⁴.

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Pregnant people should be informed that planned caesarean section birth leads to a reduction in perinatal mortality compared with planned vaginal breech delivery. Any decision to perform a Caesarean section birth needs to be balanced against the potential adverse consequences that may result from this².

- Royal College of Obstetricians & Gynaecologists (RCOG) describes a **fourfold decrease in perinatal mortality in the planned CS group vs planned VBB group**: 0.5 in 1000 vs 2 in 1000. In comparison the risk of perinatal mortality in a planned vaginal cephalic birth is 1 in 1000².
- Data from a meta-analysis of 27 articles describes a 1 in 333 risk of perinatal mortality in VBB compared to 1 in 2000 in planned CS; this reflects a **sixfold higher risk in perinatal mortality in planned VBB group**⁵ and was found to be a statistically significant but small risk overall.

Pregnant people should be informed that the reduced risk is due to three factors: the avoidance of stillbirth after 39 weeks of gestation, the avoidance of intrapartum risks in all vaginal births and the risks of vaginal breech birth, and that only the last is unique to a breech baby.

There is increased neonatal morbidity associated with a VBB compared with CS²:

- The most common adverse outcomes after a planned VBB are tube feeding for >4 days (31/1000), 5 minute Apgar of <7 (30/1000), and admission to neo-natal intensive care for >4 days (30/1000)^{3,4,8}
Apgar scores of <5 at 5 minutes AND persisting 10 minutes confer an increased relative risk of cerebral palsy⁶ but use of low Apgar score cannot be used to predict long-term neurologic prospects for individual infants⁷
- Increased admission to neonatal ICU, neonatal asphyxia and neurological morbidity, which can be due to intrapartum asphyxia⁵, but no statistically significant difference has been found in the risk of the three most serious birth traumas (intracerebral or intraventricular haemorrhage, spinal cord injury and basal skull fracture)^{3,8}
- The TBT showed overall risk of perinatal morbidity was 1 in 20. This was a significantly higher rate than in subsequent studies, but the TBT 2 year follow-up to the study showed no significant difference in 'death or neurodevelopmental delay' was found between VBB and CS groups¹⁰
- Increased incidence of clavicle fracture or long bone and brachial plexus injury (5-9 in 1000 VBBs vs 1-2 in 1000 CSs) (incidence varies between studies)^{3,9}

Some pregnant people will prefer planned VBB for various reasons:

- Maternal choice/desire for vaginal birth
- Fetal exposure to maternal vaginal flora
- CS does not confer absent neonatal risk³ with cerebral palsy occurring in 1.5 in 1000 breech births regardless of mode of birth⁴
- Increased maternal morbidity associated with CS
 - Short term risks of infection, bleeding, venous thromboembolism
 - Recovery time following birth and ability to engage in normal activities
 - There was no significant difference in maternal mortality or serious morbidity in the planned VBB vs planned CS group in the TBT³

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- Increased risk in subsequent pregnancies associated with CS
 - Increased risk of vaginal birth after CS and uterine scar rupture in future pregnancies
 - Abnormal placentation in future pregnancies
 - Adhesions and increased surgical morbidity in future pregnancies

It is worth noting that maternal complications are lowest with successful VBB; planned CS carries a higher risk, but the risk is highest with emergency CS (which may be performed in approximately 40 percent of people planning VBB)².

A range of breech studies indicate that between one and ten percent of pregnant people laboured prior to their planned CS date and had vaginal breech births despite being booked for CS. An emergency CS can be performed but in some cases this may not be feasible due to rapidly advancing labour. **It is therefore essential that clinicians are trained and attend continuing education courses and simulations to skilfully support those who may have a VBB for any of the above reasons.**

Planned Caesarean Section Birth

Any pregnant person attending HVDHB for a planned CS will be recommended a bedside scan on admission for their CS to confirm that the fetus is still presenting breech. Presentation can change with or without the pregnant person’s knowledge right up to and including labour.

Absolute Contraindications to CS

- Maternal refusal

Caesarean birth should be strongly recommended to pregnant people with absolute contraindications to vaginal breech birth, but there is an absolute right to decline recommended treatment even in these situations, and pregnant people who decline the recommendation should be provided with the safest care possible in the context in hospital, with all attempts made to mitigate risk.

Management of breech presentation in labour

The following provides guidance for management of VBB for those who choose to have a VBB or for those whose labour is too advanced to safely proceed to a CS.

Absolute Contraindications to VBB

- Any contraindication to a vaginal birth (e.g., placenta praevia, cord presentation)
- Hyperextended fetal head ^{2,4,11}
- Feet presentation (either footling or incomplete breech with feet below the buttocks)

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- EFW <2.5kg or <10th centile on a customised growth chart, or >4kg or >90th centile on a customised growth chart
- Fetal anomaly incompatible with vaginal birth
- Lack of available skilled staff (midwifery or obstetric) to facilitate the birth at the time of labour

Risks and Precautions

- Birth in hospital is recommended for planned VBB and should be accommodated for, due to the increased need for CS facilities and neonatal resuscitation support^{2,11}. All maternity clinicians working outside the DHB in a primary context should be skilled to manage undiagnosed breech at an advanced stage of labour
- Vaginal birth after caesarean is not an absolute contraindication to VBB but should be treated with caution² due to the additional risk factor for fetal compromise
- Labour complications are more common with breech presentation^{2,3,9}
- Evidence is lacking, but continuous electronic fetal monitoring is generally recommended by consensus in labours with a breech-presenting fetus due to the increased risk of labour complications^{2,11}
- 25-33 percent of breech-presenting fetuses will be identified in labour^{2,8}
Breech presentation first identified in labour is not a contraindication to vaginal breech birth in the absence of absolute contraindications^{2,4,11}
- Induction of labour is not recommended^{2,4,11}
- Adequate descent of the presenting part in the passive second stage is a prerequisite for encouraging active pushing in second stage². Passive descent of a similar duration to that recommended for cephalic birth is reasonable^{2,4}
- Amniotomy should be used with caution due to the increased risk of cord compression and cord presentation with breech presenting fetuses^{2,4}
- Augmentation of slow progress with oxytocin should only be considered if the contraction frequency decreases in the presence of epidural anaesthesia, as adequate progress may be the best evidence for adequate fetopelvic proportions^{2,4,11}

Management of the first stage of breech labour

Where a person presents with an undiagnosed vaginal breech labour, management is dependent the stage of labour, whether factors associated with increased complications are found, availability of appropriate clinical expertise and informed consent². Where labour progress allows, bedside ultrasound is recommended at admission in labour to assess for position of the fetal neck and legs and EFW^{2,11}. The birthing person can then be counselled as for planned VBB.

As some labours will progress so quickly that vaginal breech birth is inevitable and ultrasound assessment is impossible, **all clinicians are expected to maintain skills in facilitation of vaginal breech birth**. Unplanned vaginal breech birth is associated with increased risk compared to planned VBB, but should be balanced with the risk of emergency CS, particularly late in labour with a low presenting part².

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- Where breech presentation has been previously identified in a labouring person, and where labour progress allows, bedside ultrasound by the obstetrics team is recommended at admission to assess for position of the fetal neck and legs
- The ACMM and obstetric registrar should be made aware of the labouring person's presence in Birthing Suite and the breech presentation, and appropriately skilled attendants allocated if they have not been previously arranged through the person's LMC. The registrar should liaise with the on call obstetric SMO
- The birthing person's first stage of labour may be managed as for cephalic presentation, with additional caution given to slow progress, irregular contraction pattern and continuing preference of the person for VBB
- CEFM is recommended for monitoring of the fetus throughout labour^{2,4,11}
- Epidural is not routinely recommended; it is unclear whether epidural analgesia affects the success of VBB. It is likely to somewhat increase the risk of intervention² but may reduce the risk of needing general anaesthesia in the event of a CS. Birthing people should be counselled about this possibility, and have the same choice of analgesia as for vaginal cephalic birth

Management of the second stage of breech labour

- VBB should be documented on the VBB *pro forma* (MATF140) to aid clear documentation of decision-making and manoeuvres
- The ACMM and obstetric team should be made aware of the second stage of labour and it is recommended that the SMO present in the room for emergencies during this stage^{11 RANZCOG}
- CEFM is strongly recommended in second stage^{2,4,11}
- Passive second stage is recommended to allow the breech to descend to the perineum prior to active pushing^{2,4,11}
- Caesarean section may be recommended for a delay in descent at any point in passive or active second stage prior to rumping
- Active pushing is ideally not encouraged until the presenting part is distending the perineum^{2,4,14}
- Paediatric staff should be present for the birth of the baby due to the increased need for resuscitative measures
- There is no indication for routine episiotomy in VBB. Selective episiotomy may be used as for cephalic birth, and consideration should be given to its use if there is a delay during rumping
- Upright maternal position is associated with significantly reduced length of second stage, CS rate and use of manoeuvres to facilitate the birth compared to supine breech birth^{12,13}. Optimal maternal position for successful vaginal birth is therefore upright^{12,13} but position should be guided by what the birth attendant is comfortable with² in order to most safely facilitate birth should manoeuvres be required
- Due to the risk of cord compression during breech birth **the baby should be born within seven minutes of rumping and within five minutes of the birth of the pelvis at the bitrochanteric diameter, including any manoeuvres required.** It is recommended that birth is timed from the birth of the BTD¹⁴

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- **Immediate assistance, without traction, is warranted to expedite birth if there is evidence of poor fetal condition¹⁴**
- Changes in maternal position and continuous pushing by the birthing person are recommended to facilitate early recognition of delay
- Await spontaneous birth of the torso and limbs by maternal effort, unless there is a delay at any point of greater than 90 seconds
- For expulsive delay after the breech has rumped, power from above (maternal effort and positioning) should always be used in preference to fetal traction
- Avoid fetal traction. Several manoeuvres can be utilised to facilitate breech delivery once the fetal umbilicus is seen at the perineum. A hands off approach is recommended prior to that point.
- Skilled breech clinicians will be able to recognise delay or dystocia at any stage of the birth of the baby in a breech position and use manoeuvres appropriate to the position of the birthing person and the stage of birth to relieve dystocia AND/OR expedite birth
These include;
 - Pinnard manoeuvre in supine breech birth to assist with delivery of the fetal legs
 - Løvset manoeuvre in supine breech birth to release trapped arms;
AND/OR
Louwen or other comparable disimpaction and rotation manoeuvres in upright breech birth
 - Modified Mauriceau-Smellie-Veit to release a deflexed head in the pelvis in supine breech birth
AND/OR
Shoulder press manoeuvre with or without rocking in upright breech birth
 - Gaskin manoeuvre to change birthing person from upright to supine position or use of other changes in position such as “runner’s start”
 - Suprapubic pressure with disimpaction and rotation manoeuvres to release an extended head at the pelvic inlet
AND/OR
 - The ability to use forceps to birth the after-coming head
- Manoeuvres should always be performed by holding the baby over the bony prominences of the pelvis, “praying hands” position over the spine and sternum, or shoulder grip.
- Dystocia may be indicated by¹⁴:
 - Delay of >90 seconds during any part of the birth from rumping onwards
 - Partial or non-rotation of the torso to sacro-anterior position after the pelvis is born and by the time the baby has birthed to the scapulae/nipple line (suggestive of arm/s caught on the symphysis pubic or sacral promontory, or nuchal arms)
 - Significant delay between release of first and second leg or no spontaneous release
 - An asymmetrical “chest crease” in an upright maternal position (suggestive of arm/s caught on the symphysis pubic or sacral promontory, or nuchal arms)
 - Significant delay between release of first and second arm
 - Shoulders wedged tightly against the perineum with no head in pelvis (indicating an extended head at the pelvic inlet)

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- After-coming head not distending the perineum (suggestive of a deflexed head in the pelvis)

Releasing an entrapped head

This is an emergency and generally occurs where breech birth is unplanned, or involves a significantly preterm or small-for-gestational-age fetus.

- Call 777 Code 2 Obstetric/Neonatal Emergency
- Undertake vaginal examination to identify presence or absence of cervix, and attempt to push cervix over fetal head if present
- If the fetal head is in the pelvis, use Modified Mauriceau-Smellie-Veit or shoulder press manoeuvre with suprapubic pressure to maintain descent and flexion of head
- If flexion manoeuvres are unsuccessful, elevate and rotate fetal body while suprapubic pressure is applied to flex fetal head, and use gentle traction to guide head into pelvis. Rotate the fetal spine to sacro-anterior and birth after-coming head by MSV, shoulder press or forceps

In the very rare circumstance that these manoeuvres are unsuccessful, it is unlikely a live birth will result. To enable birth for the safety of the labouring person, the senior clinician may:

- Reassess cervical dilatation and consider cervical incisions
- Perform symphysiotomy
- Undertake caesarean section

References:

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Related Documents:

Document type	Action
Guideline / policies	MATF140 Vaginal Breech Pro Forma
	MATY027 External Cephalic Version (Procedure) Policy
	HVDHB ECV Information for Women
	HVDHB Breech Information for Women

Keywords for searching:

1. Breech
2. MATY016
3. External cephalic version

Informed Consent:

The right of a consumer to make an informed choice and give informed consent, including the right to refuse medical treatment, is enshrined in law and in the Code of Health and Disability Consumers'

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Rights in New Zealand. This means that a woman can choose to decline treatment, referral to another practitioner, or transfer of clinical responsibility. If this occurs follow the process map on page 18 of the Referral Guidelines (Ministry of Health, 2012).

Tangata Whenua Statement:

The Women’s Health Service recognises the rights and responsibilities of Māori as tangata whenua and Treaty Partners. This allows and acknowledges the importance of cultural diversity in all aspects of our care and practice in Aotearoa New Zealand.

As stated in [Te Pae Amorangi](#) (Hutt Valley DHB Māori Health Strategy) 2018-2027, Hutt DHB as a Crown agency is committed to our role in maintaining active relationships with iwi, under Te Tiriti o Waitangi. This strategy recognises the established principles of Partnership, Participation and Protection and recognises steps towards the reviewed interpretation of Te Tiriti principles to date (from the [Wai 2575](#) claim into health). These are tino rangatiratanga, equity, active protection, partnership and options.

Attention in particular is drawn to:

- **Article one – Kāwanatanga:** actively engaging and working alongside with local iwi through the Hutt Valley [Māori Health Unit](#)
- **Article two – Tino Rangatiratanga:** Self-autonomy, self-determination; the responsibility to enable Māori to exercise their authority over their own health, determinants and definition of health
- **Article three – Ōritetanga:** equal health outcomes of peoples; ensuring that policy, guidelines or programmes do not further perpetuate any inequity
- **Article four (the ‘oral clause’) – Wairuatanga:** spirituality; thriving as Māori and the importance of health providers understanding health in te ao Māori (the Māori world), acknowledging the interconnectedness and inter-relationship of all living and non-living things.

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