1. Introduction and who the guideline applies to:

This guideline is aimed at all Health Care Professionals involved in the identification and repair of perineal or genital trauma following childbirth.

Background:

This guideline is based on the recommendations made in Clinical Guideline 55 Intrapartum Care published by NICE and The Management of Third and Fourth Degree Perineal Tears (Green Top Guideline 29 June 2015) published by the RCOG.

Related documents:

<table>
<thead>
<tr>
<th>Bladder care during and after labour and delivery</th>
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</thead>
<tbody>
<tr>
<td>UHL Management of Surgical Swabs, Instruments, Needles and Accountable Items</td>
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<tr>
<td>UHL aseptic technique for invasive procedures</td>
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<td>UHL hand hygiene policy</td>
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<tr>
<td>Women’s Antimicrobial Guidelines Summary</td>
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<td>UHL Safer Surgery Policy</td>
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Contents:

- Systematic assessment of perineal or genital trauma
- Repair of first and second degree trauma
- Prevention of third and fourth degree perineal trauma
- Repair of third and fourth degree perineal trauma
- Physiotherapy assessment following third and fourth degree trauma
- Routine postnatal perineal examination
- Audit and monitoring

2. Guidance:
**Systematic assessment of perineal or genital trauma:**

1. The perineum and lower vagina should be assessed for trauma by a practitioner trained in the recognition and management of perineal trauma. All areas of the perineum and lower vagina should be examined also noting any damage to the labia, clitoris, urethra and anal sphincter.

2. A digital rectal examination is recommended to exclude damage to the anal sphincter complex and rectal buttonhole tears.

3. Tears should be classified according to the following table:

<table>
<thead>
<tr>
<th>Perineal or genital trauma caused by either tearing or episiotomy should be defined as follows:</th>
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</thead>
<tbody>
<tr>
<td><strong>First degree</strong></td>
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<tr>
<td><strong>Second degree</strong></td>
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<tr>
<td><strong>Third degree</strong></td>
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<tr>
<td>If there is any doubt about the grade of third degree tear, it is advisable to classify it to the higher degree rather than lower degree.</td>
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<tr>
<td><strong>Fourth degree</strong></td>
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<tr>
<td>If the tear involves rectal mucosa with an intact anal sphincter complex, it is by definition NOT a fourth degree tear. It should be documented as a rectal buttonhole tear.</td>
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<tr>
<td>If not recognised and repaired, this type of tear may lead to a recto-vaginal fistula.</td>
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</table>

4. This examination should be conducted with adequate analgesia and with adequate lighting.

5. The examination should be conducted in the lithotomy position where possible so that genital structures can be seen clearly; this position should be maintained for the minimum time required to perform a full and thorough examination.

6. The perineal repair should be completed within 120 minutes after completed third stage at the latest; however, where there is significant blood loss repair should be prompt. Where the woman requires repair in theatre the decision should be based on clinical judgment.
7. All tears, bruising oedema or inflammation should be documented in the health record with a diagram where appropriate.

**Repair of first and second degree trauma:**

8. Repair of the perineum should only be carried out by a practitioner who is competent in perineal repair unless the operator is under instruction and direct supervision for training. Full details can be found in the Maternity Training Needs Analysis.

9. Informed consent from the patient should be documented in the health care record.

10. Perineal repair should only be undertaken with tested effective analgesia in place, using infiltration with up to 20 ml of 1% lidocaine or equivalent, topping up epidural analgesia or spinal anaesthesia if necessary.

Midwives performing perineal repair - it is important to note that if 5 ml of Lidocaine 1% has already been used for infiltration of the perineum prior to performing an episiotomy then only 15 ml is left available for infiltration prior to repair. The maximum IN TOTAL that may be given is 20ml. If a further dose is required it must be prescribed and discussed with the Anaesthetist.

11. If the woman reports inadequate pain relief at any point this should immediately be addressed.

12. Women should be advised that:

- In the case of first degree trauma: the wound should be sutured in order to improve healing, unless the skin edges are well apposed in which case suturing is not always necessary.

- In the case of second degree trauma: The perineum should be sutured in order to improve healing.

13. Perineal repair:

- Use a continuous suturing technique for the vaginal wall. It is preferable to use continuous technique for the muscle layer also.

- Use an absorbable synthetic suture material for the perineum such as Vicryl Rapide.

- If the skin is apposed following suturing of the muscle in second-degree trauma, there is no need to suture it unless there is an indication to do otherwise.

- Where the skin does require suturing, this should be undertaken using a continuous subcuticular technique unless otherwise indicated.
o The swab and needle count is the responsibility of the operator

o All swabs must be counted aloud by the operator and the assistant immediately prior to the procedure and this should be documented on the white board within the room by the assistant.

o Any swab inserted into the vagina during the procedure must be:
  - Recorded on the whiteboard as individual items and not as part of the swab count
  - Secured to the sterile drapes with a theatre clip

o The swab packaging must be kept until the end of the final count

o Swab the perineal area with Tisept prior to placing sterile drapes over the area to be sutured.

o Where possible the assistant should remain in the room until the final swab count is complete and accurate

o If at any time there is a change of operator the swab count must be confirmed prior to that person leaving the room.

o Following the procedure, before leaving the room, all swabs must be counted aloud again by the operator and the assistant and this should be documented in the health records by both members of staff

o The swab count must be correct before leaving the room.

o Where a vaginal pack is intentionally left in situ the “Bakri Intrauterine Balloon and Vaginal Pack In situ Form” must be completed and attached to the front of the woman’s hospital notes. The in situ sticker must also be placed on every history page within the notes. This is the responsibility of the operator who leaves the pack in. The pack must be removed prior to transfer to the postnatal ward.

o Any unaccounted items must be documented on the white board in red and until proven otherwise it should be assumed that the item is in the wound. All swab bags and rubbish bags should be checked. If the item is still unaccounted for, the midwifery coordinator must be informed and actions taken as per UHL “Management of Surgical Swabs, Instruments, Needles and Accountable items “Policy.
o Rectal non-steroidal anti-inflammatory drugs should be offered routinely following perineal repair of first- and second-degree trauma, provided these drugs are not contraindicated.

14. Difficult trauma should be repaired by an experienced practitioner in theatre under regional or general anaesthesia. An indwelling catheter should be inserted for 12 hours to prevent urinary retention (see Bladder care during and after labour and delivery guideline).

15. The following basic principles should be observed when performing perineal repairs:

- Perineal trauma should be repaired using aseptic technique.
- Equipment should be checked and swabs and needles counted before and after the procedure.
- Good lighting is essential to see and identify the structures involved.
- Good anatomical alignment of the wound should be achieved, and consideration given to the cosmetic results.
- Rectal examination should be carried out after completing the repair to ensure that suture material has not been accidentally inserted through the rectal mucosa.

16. The operator must document the following, both on the electronic record system and also on the relevant page in the patient’s health record:

- Consent for suturing
- Type of analgesia used for suturing
- Type of suture material used
- Methods used with rationale should they have deviated from this guideline
- The document needle and swab counts as in section 14
- Achievement of haemostasis
- Examination (both vaginal and rectal)
- Any analgesia administered

17. The UHL ‘You and Your Baby’ leaflet should be given and this should be documented. This will provide information about the types of perineal trauma and appropriate aftercare as well as how to access support should any problems or concerns arise.

18. Further information is also included in the leaflet about diet, the importance of pelvic floor exercises and follow up care where appropriate.
19. Rates of returns of women experiencing problems following perineal repair should be reviewed quarterly using electronic records of attendance in the Maternity Assessment Unit. This will include a review of causes for returns.

20. Repair of the perineum at home birth:
   - Community midwives should adhere to the above guidance when completing perineal suturing at home.
   - If third or fourth degree perineal trauma is identified or it is felt that further assistance is required from a more experience operator the delivery suite should be informed and the community midwife should transfer with the woman via ambulance to hospital and complete the SBAR handover of care.

**Third and Fourth Degree Perineal Trauma (Obstetric Anal Sphincter Injuries)**

   a) **Prevention**

21. Evidence for protective effect of episiotomy is conflicting

22. Mediolateral episiotomy should be considered in instrumental deliveries

23. Where episiotomy is indicated, the mediolateral technique is recommended, with careful attention to ensure that the angle is 60 degrees away from the midline when the perineum is distended at crowning

24. Manual perineal protection (MPP) at crowning can result in better outcomes. Recent interventional studies have demonstrated successful reduction in obstetric anal sphincter injury rates, all of which have described manual perineal protection/'hands on' techniques, see RCOG guidance). For spontaneous births MPP should be used unless the woman objects or her chosen birth position does not allow it. For assisted births MPP should always be used.

   Perineal protection includes:

1. Left hand slowing down the delivery of the head
2. Right hand protecting the perineum
3. Mother NOT pushing when head is crowning (communicate)
4. Think about episiotomy (risk groups and correct angle)
25. Warm compression during the second stage of labour reduces the risk of anal sphincter injuries. A swab dampened with warm tap water may be used. It must be warm to the touch but not hot. They must not be heated using a microwave. Heat packs MUST NOT be used.

b) Repair of third and fourth degree perineal trauma:

26. Obstetric anal sphincter repair should be performed (or directly supervised) by appropriately trained practitioners. " Appropriately trained" means those practitioners who have completed formal training on repair of obstetric anal sphincter injuries.

27. Repairs of third and fourth degree tears must take place in theatre under regional or general anaesthetic.

28. Repair should take place as soon as possible after identification of the obstetric anal sphincter injury.

29. External anal sphincter:

   a) Use either an overlapping or end-to-end (approximation) method

   b) Figure of eight sutures should be avoided as they cause ischaemia

   c) Use either monofilament sutures such as polydioxanone (PDS) or modern braided sutures such as polyglactic (Vicryl ®)

30. Internal anal sphincter:

   o Repaired separately with interrupted or mattress sutures without any attempt to overlap

   o Use fine suture size such as 2-0 Vicryl.

   o When obstetric anal sphincter repairs are being performed, burying of surgical knots beneath the superficial perineal muscles is recommended to prevent knot migration to the skin.

   o Women should be warned of the possibility of knot migration to the perineal surface, with long acting and non-absorbable suture materials.

   o All swabs and needles must be accounted for as in section 14.

31. Ano-rectal mucosa:
Repair using interrupted or continuous technique. Figure of eight sutures should be avoided as they can cause ischaemia.

Avoid using PDS sutures for mucosal repair as they can cause more irritation than Vicryl.

Burying knots underneath the skin is not essential- the recommendation for this technique dates back to the use of Catgut.

32. The operator must **document** the following, both on the electronic record system and also on the appropriate page in the patient’s health record:

- Consent for suturing
- Analgesia used for suturing
- Type of suture material
- The anatomical structures involved
- Methods used, with explanation should they have deviated from this guideline
- All swabs and needles must be accounted for as in section 14
- Achievement of haemostasis
- Examination both PV and PR
- Any analgesia administered

Where a vaginal pack is intentionally left in situ the “Bakri Intrauterine Balloon and Vaginal Pack In situ Form” must be completed and attached to the front of the woman’s hospital notes. The in situ sticker must also be placed on every history page within the notes and on each page of the HDU chart. This is the responsibility of the operator who leaves the pack in. The pack must be removed prior to transfer to the postnatal ward.

33. Post operative management should include:

- Completion of an incident form
- Broad spectrum antibiotics – Cefuroxime IV 1.5 g tds and Metronizadole IV 500 mg Stat? not needed now and then oral route can be used after stat dose if the woman is able to tolerate it. Treatment should be bd and for 5 days.
  (If Cephalosporin / Penicillin allergy: IV Clarithromycin 500 mg bd + Metronidazole IV 500 mg bd) The oral route can be used after the first dose if the woman is able to tolerate it.(as per
Women’s Antimicrobial Guidelines Summary). For known or previously known MRSA positive patients see Women's Antimicrobial Guideline Summary

- Post operative laxatives (bulking agents should not be given routinely with laxatives, as this may increase the level of incontinence in the immediate post partum period) Stool softening agents such as Lactulose are recommended and should be given for about 10 days postnatal.

- Physiotherapy
  - All women who have sustained a 3rd or 4th degree tear should be referred to the multidisciplinary perineal repair clinic at the LGH at 6 - 12 weeks postpartum
  - Referral to an appropriate specialist if urinary and/or faecal incontinence or pain is present at the postnatal review.

34. Information:

  a) The woman should be made aware prior to discharge that she had a 3rd or 4th degree perineal trauma and this should be documented on the Maternity Community Transfer Form or in the health record.

  b) The UHL “You and Your Baby” leaflet should be given and this should be documented. The leaflet will provide further information about diet, perineal hygiene, prevention of infection and the importance of pelvic floor exercises. Further information is also included in the leaflet about follow up care where appropriate and how and when to access support, as well as on options for future deliveries.

35. Physiotherapy assessment following third and fourth degree trauma:

  o The Physiotherapist attends the postnatal ward daily (Monday to Friday). All women who have sustained 3rd / 4th degree tears should be referred to inpatient physiotherapy via ICE. This referral should be made by the midwife completing the E3 delivery summary.
  
  o The Physiotherapist will aim to see these women on the ward to give them advice on postnatal exercises and guidance on recovery and follow up if any adverse symptoms are experienced.
  
  o Women who are discharged before they have seen the Physiotherapist will have a telephone follow up within 5 working days of discharge.
36. On discharge from hospital:

| LRI and LGH | - Women receive the “You and Your Baby” Leaflet.  
| - Ward clerk books a postnatal outpatient follow up appointment at around 6 – 12 weeks for all women who have sustained 3rd and 4th degree tears. |

**Routine postnatal perineal examination:**

37. The perineum should be inspected by the Midwife at every contact until discharge from midwifery follow up.

38. The optimal position for perineal examination is mother lying on her back, knees bent and legs open.

39. Observe the perineum for bruising, oedema and inflammation

40. Document all findings in Postnatal Notes.

41. Where there are any concerns the Midwife can refer a woman to the perineal clinic by completing a “Referral Form for Perineal Clinic Trauma Clinic”. This should be sent to the clinic coordinators at the LGH.

### 3. Training:

42. Midwifery staff providing intrapartum care must be competent at perineal trauma management. This competence may have been acquired prior to taking up employment at the UHL (and reported by self-assessment), or they may have attended the UHL Trust teaching on identification and repair of perineal trauma. See the Maternity Training Needs Analysis for further details.

43. All medical trainees performing perineal repair must be competent at perineal trauma repair. This competence may have been acquired prior to taking up employment at the UHL (and reported by self-assessment), or they may have attended the UHL Trust teaching on identification and repair of perineal trauma. See the Maternity Training Needs Analysis for further details.

44. All medical trainees performing repair of 3rd/4th degree tears must attend a formal obstetric anal sphincter repair course during, or before their rotation to UHL.

### 4. Auditable Standards:
• 100% evidence of adequate documentation of systematic examination of the vagina, perineum and rectum prior to suturing of OASIS (Obstetric anal sphincter injury)

• 100% of OASIS repaired with evidence of type of analgesia, suture material, method of repair and grade of operator

• 100% of women with OASIS receiving postoperative advice as per guideline and follow up appointment

5. **Supporting References:**

6. Jha S, Parker V

7. **Keywords:**
   perineal repair, suturing, trauma

### CONTACT AND REVIEW DETAILS

<table>
<thead>
<tr>
<th>Guideline Lead (Name and Title)</th>
<th>Executive Lead</th>
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<tbody>
<tr>
<td>Kerry Williams</td>
<td>Elaine Broughton</td>
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**Details of Changes made during review:**

- Added: updated tisept for cleaning
- Remove pack before transfer to postnatal ward