Enhanced Recovery following Caesarean Birth

Classification :	Guideline		
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Guideline to be followed by (target staff): All Maternity staff			
To be read in conjunction with the following documents: Bladder Care Theatres Operational Policy			
Are there any eCARE implications?			
CQC Fundamental standards: Regulation 9 – person centred care Regulation 10 – dignity and respect Regulation 11 – Need for consent Regulation 12 – Safe care and treatment Regulation 13 – Safeguarding service users from abuse and improper treatment Regulation 14 – Meeting nutritional and hydration needs Regulation 15 – Premises and equipment Regulation 16 – Receiving and acting on complaints Regulation 17 – Good governance Regulation 18 – Staffing Regulation 19 – Fit and proper			

Disclaimer –
Since every patient's history is different, and even the most exhaustive sources of information cannot cover every possible eventuality, you should be aware that all information is provided in this document on the basis that the healthcare professionals responsible for patient care will retain full and sole responsibility for decisions relating to patient care; the document is intended to supplement, not substitute for, the expertise and judgment of physicians, pharmacists or other healthcare professionals and should not be taken as an indication of suitability of a particular treatment for a particular individual.

The ultimate responsibility for the use of the guideline, dosage of drugs and correct following of instructions as well as the interpretation of the published material **lies solely with you** as the medical practitioner.

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Guideline Statement

Many hospitals have enhanced recovery programs in place, and it's now seen as safe, standard practice following surgery for many procedures.

Enhanced recovery is sometimes referred to as rapid or accelerated recovery.

The aim of enhanced recovery is to optimise multiple aspects of patient care, improve postoperative outcomes and decrease length of hospital stay without reducing patient satisfaction or the quality of care.

This practice is supported by National Institute for Health and Care Excellence (NICE) guidance who state that ‘‘women who are recovering well, are apyrexial and do not have complications following lower segment caesarean section (LSCS) should be offered early discharge (after 24 h) from hospital and follow-up at home, because this is not associated with more infant or maternal readmissions”.

Pre, intra and post-operative planning needs to be robust to ensure the success of this program

Executive Summary

Enhanced recovery is a recognised pathway for effective management of both surgical and medical pathways. Caesarean section (CS) is a proposed operation included in Fulfilling the potential: better journey for patients and a better deal for the NHS (Enhanced Recovery Partnership, [2012]).

Enhanced Recovery (ER) pathways have been successfully introduced in several hospitals in England

The ‘Enhanced Recovery after Caesarean birth’ guideline is introducing a modern, evidence-based surgery pathway for service users undergoing LSCS designed to:

- Provide effective, timely post-operative pain relief
- Provide excellent perioperative nutrition
- Encourage rapid post-operative mobilization
- Offer a structured approach to postoperative and perioperative management, including pain relief by a multidisciplinary team
- Improve patient experience

There are clear advantages to both the service users and the hospital to well-planned enhanced recovery programs. They reduce the length of hospital stay without increasing complication rates and have high levels of patient satisfaction

The average length of hospital stay after a Lower Segment Caesarean section (LSCS) is 48 hours in contrast to 24 hours following vaginal delivery. Therefore, even a one-day reduction in hospital stay could have a significant impact

Potential benefits are numerous; an improved psychosocial experience for service user's themselves and their families by de-medicalising birth by LSCS, improved postnatal experience and a reduction in maternal and neonatal nosocomial infections

Definitions

Enhanced recovery in obstetrics is an evidence-based approach that helps service users recover more quickly after having elective caesarean births.
LSCS – Lower Segment Caesarean Section
ADAU – Antenatal Day Assessment Unit
SBAR – Situation Background Assessment Recommendation (structure for handover)
ANC – Antenatal Clinic
MRSA – Methicillin-Resistant Staphylococcus Aureus
PPH – Post-Partum Haemorrhage

1.0 Roles and Responsibilities:

Obstetrician -

- To discuss the risks and benefits of elective LSCS and confirm suitability for enhanced recovery at the booking the LSCS, on the day of surgery and immediately post-operatively
- To ensure LWMH has been prescribed (If appropriate)

Midwives -

- To provide pre-operative information
- To confirm suitability for enhanced recovery in the postnatal period and discharge
- To provide discharge information and provide To Take Out (TTO) drugs (if appropriate)

Anaesthetists -

- To confirm suitability for enhanced recovery on the day of surgery and immediately post-operatively
- To provide anaesthesia and prescribe post-op analgesia in line with the latest evidence-based guidance.

2.0 Implementation and dissemination of documents

This document will be disseminated via clinical governance pathways to all maternity staff

- This document can only be considered valid when accessed via MKUH intranet, if this document is printed you must check that it matches the in the version on the intranet.

3.0 Processes and procedures

3.1 Inclusion criteria

- Service users with an otherwise low risk pregnancy undergoing elective LSCS
- No significant medical co-morbidities or midwifery concerns precluding early discharge
- No midwifery concerns precluding early discharge.
- Anticipated uncomplicated surgery and recovery

3.2 Exclusion criteria

Antenatal

- Pre-eclampsia/gestational or chronic hypertension
- Placenta praevia
- Preterm LSCS
- Diabetes; gestational, type 1, type 2
- Pre-operative anaemia with haemoglobin level ≤ 104g/l
- Other medical or psychiatric co-morbidities
- Need for a classical Caesarean Section
- Safeguarding concerns / social circumstances which may delay discharge; these service users could still go on the pathway as it will enhance recovery but will not necessarily be discharged

Intra-Operative and postnatal

Final assessment of the service user's suitability for enhanced recovery will be decided by the multidisciplinary team in theatre. Exclusions may include:

- Need to perform a Classical Caesarean Section or extension into an inverted T-shape or J-shape incision
- Extensive adhesiolysis or difficult surgery
- Bladder/ureteric or bowel damage
- Intra-operative blood loss > 1000mls
- Use of Bakri Balloon, B-Lynch suture or surgical drain
- Post-partum haemorrhage (PPH) ≥1000mls
- Need for blood transfusion
- Hysterectomy
- Sepsis/suspected sepsis
- Increased analgesic requirements
- Severe post-operative nausea and vomiting
- Urinary retention
- Post-operative ileus
- Other medical issues such as new onset high blood pressure
- Infant feeding problems
- Safeguarding issues e.g. social issues, concerns about maternal mental health

Neonatal admission does not preclude Enhanced Recovery but may need to be factored in the discharge planning.

3.3 Planning for enhanced recovery program elective caesarean section

3.3.1 In the Antenatal Clinic (ANC)

Once the service user is identified as suitable for enhanced recovery they will be offered the enhanced recovery pathway.

The date for LSCS should be agreed in the antenatal clinic with the indication for caesarean section clearly documented in eCare. The service user should be made aware of the enhanced recovery pathway.

The service user should be provided with the caesarean leaflet, which contains information about Enhanced Recovery. This will facilitate engagement with the pathway through antenatal education. The Predicted Date of Discharge (PDD) should also be given at this time, so that the

service user is able to arrange support at home before they come into hospital. These dates must be documented on eCare. Consent for the procedure (if face to face appointment) and a MRSA swab (if third trimester) should be taken at this stage.

It should be discussed with the service user that if any new antenatal, intraoperative, or postnatal problems arise, they may no longer fit the criteria for the enhanced recovery program.

The enhanced recovery discussion and decision should then be documented within the service user's eCare notes. It should also be documented that the caesarean leaflet has been provided to the service user.

Once the decision has been made for the service user to follow the enhanced recovery pathway, the discussion and decision needs to be recorded on eCare and documented on the electronic booking form for caesarean section. It should also be on the operating list.

Caesarean section for service users planned to be on the enhanced recovery pathway should ideally be performed before 16:00hrs to allow discharge of the service user from the hospital the next day as per the pathway requirement.

Haemoglobin should be optimised to Hb >104g/L when booking LSCS. It should be checked at 28/40. Please refer to antenatal care guideline for optimization of antenatal Haemoglobin.

During the birth choices appointment with the midwife, they can use the GRAPES acronym to help the service user plan her caesarean birth. It stands for Gender, Reveal, Ambience, Partner, Extras, Skin to Skin. Please refer to Appendix 1 in Caesrean Guideline for more information re GRAPES acronym. Advise them that we cannot alter the lighting in our maternity theatres, but they are welcome to bring a Bluetooth speaker or headphones/earphones with them to listen to their own choice of music via their mobile phone.

Reiterate to service users to consider purchasing a TENS machine to help with postoperative analgesia as there is evidence base that it can help. TENS is best discussed at time of booking the planned CS or at a birth preference appointment if the service user had one.

3.3.2 Pre- Operative Assessment

Maternity service users should be advised to purchase paracetamol and ibuprofen (if not contraindicated), ready to be used post-operatively at home.

Fasting is also explained. The service user is encouraged to eat normally until 3am on the day of the operation. As per the Sip Till Send protocol, they should also be encouraged to sip from one 170ml glass (standard ward glass) of clear, non-fizzy fluids refilled every hour till it is time for them to leave the ward for theatres. Clear fluids include water, diluted juice, or squash, non-fizzy iso-osmolar energy drinks, such as non-fizzy isotonic sports drinks and fruit juice without pulp or bits. While Sip Till Send is the default instruction for all adult service users presenting for elective caesarean section, certain service users may be considered higher risk and in that situation, the anaesthetist will communicate different instructions to the ward and the service users.

Pre-medication should be supplied:

Night before CS at 22:00	Omeprazole 20mg
Morning of the CS at 07:00	Omeprazole 20mg

Blood tests samples for blood group and serum save, and full blood count are offered to be taken during the pre-op session. An MRSA swab should be recommended and offered at this stage if not done as part of routine antenatal care. The results of the MRSA swab should be checked and documented in e Care if the swab has already been taken.
The service user should be advised to bring a warm dressing gown and slippers, even in summer, as it gets very cold in the operating theatre. If they would like to keep a bra on in theatre, it needs to be a crop-top style without any metalwork (such as fasteners and underwire).

The service user should be advised that although they are on an elective list, sometimes this needs to be interrupted due to emergencies and so there might be a delay on the day of surgery, or in some cases cancelled on the day due to emergencies or other safety situations.
Consider providing discharge advice such as how to register the baby at the pre-op clinic.

3.3.3 On the day of surgery

The service user should attend the hospital at 07:30. In ward 9

The Sip Till Send protocol should be followed, regardless of whether surgery is likely to be delayed, allowing patients to continue to take clear, non-fizzy liquids till the time they leave the ward for theatres. It should be the default for all adult patients presenting for elective caesarean section unless specified otherwise by the anaesthetist.

The midwife should check that the service user has their own supply of paracetamol and ibuprofen at home.

Consider changing the order of the list to prioritise the service users on the enhanced recovery pathway, to facilitate earlier discharge on day 1. Clinical need will take priority over ERP.

The service user should be prepared for theatre and the relevant paperwork should be completed.

They should be given an approximate time for their operation and should be kept updated if this changes.

Have a discussion regarding the location for removal of underwear as it can be unpleasant for the service user to walk down the corridor without underwear, and they may not feel comfortable removing it in theatre. An alternative is that it is removed in the relative's room.

3.4 Procedure

Regional anaesthesia should be used unless contraindicated/declined: the anaesthetist will decide this following an overall assessment and an informed discussion with the service user. If The service user requires a general anaesthetic, they are excluded from the enhanced recovery pathway**.**

For elective caesareans, the birth partner may accompany the service user to the operating theatre for the spinal anaesthetic. If they choose not to, they can wait in the relatives' room until surgery is ready to commence. Only one birth partner can be in the operating theatre, this is due to the lack of space at the non-operative side of the drape. In particular circumstances, it is possible to swap birth partners after the spinal, this will be considered as part of a personalised care support plan (PCSP), would not be routine practice and should be highlighted to theatre staff at WHO.

Everyone in the theatre should introduce themselves.

The midwife could write the GRAPE choices on the theatre whiteboard.

Neuraxial block with diamorphine will be used unless contraindicated or declined. If there is a national shortage of diamorphine, intrathecal morphine +/- fentanyl should be used.

Give ondansetron 4mg and dexamethasone 9.9mg to provide post-operative analgesia and to help prevent Post Operative Nausea and Vomiting and itching.

Use operative techniques to minimise pain such as avoiding dissecting the sheath posteriorly and use the Cohen's entry is advised in the Enhanced Recovery Partnership Report 2012.

Use local anaesthesia (40ml 0.25% levobupivacaine) to supplement post-operative analgesia, as TAP blocks by the surgeon or anaesthetist. For service users who have had at least two previous caesareans, insert a wound infiltration catheter ("pain buster").

The aim should be for normothermia throughout the surgery as this reduces the risk of wound infection, coagulopathy, blood loss, and transfusion requirement. Use pre-warmed IV fluids and consider underbody forced air warming.

Sometimes it can be a long time before the service user gets to see their baby, due to the position of the resuscitaire. Consider delivering the baby directly over the drape to the woman if possible , with the midwife positioned ready to support the baby. If the resuscitaire is required, try to position it so that the service user can still see their baby.

All baby checks and care to be provided within sight of mum as far as is safely possible.

Final assessment of the service user's suitability for enhanced recovery will be decided by the multi-disciplinary team perioperatively after considering any surgical or anaesthetic complications or difficulties encountered. This should be included in the sign out process at the end of the operation. The service user should then be informed accordingly. N.B. service users may come off the enhanced recovery pathway at any time – especially if unexpected surgical complications, bleeding (>1000ml) or neonatal issues.

- Discharge medications, including thromboprophylaxis, should be prescribed by the operating team whilst in theatre which will be dispensed by the ward

- All service users must be assessed for their risk of venous thromboembolism and prescribed thromboprophylaxis on the ante/postnatal prophylaxis section of the drug chart by the operating team.

3.5 Postoperative care – Day of surgery

Recovery and ward area

When the service user goes to recovery, the birthing partner should go back to the ward to get changed. The recovery area provides care for other non-obstetric patients who require privacy. If a service user has particular need that requires them to have the support of a carer, then we will develop a PCSP to support them. Postoperative nausea and vomiting should be managed

immediately with antiemetics

All service users should be recovered following the postoperative recovery guideline

IV lines and fluids should be discontinued in recovery and water should be provided (Unless otherwise asked to be continued until completed)
The spinal block should be checked and should be below T4 prior to discharge from recovery.
Before discharge from recovery, ensure the TTO prescriptions for dihydrocodeine, lactulose (and dalteparin if applicable) are completed.

Once the service user is on the ward, they should be encouraged to eat and drink when they feel ready, ideally normal diet should resume within 4 hours post-operatively.

Early mobilisation should be encouraged 6 hours post operatively. Once the service user has mobilised the urinary catheter should be removed. The service user should pass at least 200ml of urine in a single void within 6 hours of having the catheter removed. Continue bladder care as per the Bladder Care guideline.Bladder Care Guideline.pdf (adobe.com)

After the service user has passed urine, the IV cannula can be removed.

Postoperative pain relief should be offered to all service users after LSCS

- Paracetamol 1gm orally 6 hourly (unless contraindicated)
- Ibuprofen 400mg orally 8 hourly (unless contraindicated)

First line for breakthrough pain

- Dihydrocodeine 30mg 4-6 hourly PRN, max dose in 24 hours 120mg (unless contraindicated)

Second line for breakthrough pain - Advise the patient to use the minimum effective dose for the shortest period of time.

- Oramorph 10-20mg 2hrly PRN (unless contraindicated)
- Ondansetron 4mg IV TDS PRN (this is also effective against pruritus unless contraindicated)

The following is a timeline of anticipated events following the birth, the actual time these events happen should be documented on eCare.

Birth + 1 hour: Eating and drinking can commence, as tolerated. They can also chew gum post-operatively.

Birth + 2 hours: The first oral paracetamol and ibuprofen should be given (if they haven't received diclofenac in theatre)

Birth + 4 hours: They should be eating normally by this time. They should be encouraged to have a high-fibre diet and drink plenty of water to help prevent constipation.

Birth + 4 hours: Day 0 dalteparin (if required) can be given after this time

Birth + 4 hours: The service user should be able to 'straight leg raise' bilaterally by this time, if they can't then bleep the duty anaesthetist for review.

Birth + 4 hours: The NIPE and hearing check can take place after this time.

Birth + 6 hours: The urinary catheter should be removed, and the service user can mobilise. They should be advised on the need to measure the first volume of urine.

Birth + 12 hours: The service user should have passed at least 200ml of urine in a single void.

Birth + 12 hours: The cannula can be removed once the service user has passed urine.

Birth + 24 hours: Estimated time of discharge. TTOs should have been given to the service user by now and all discharge paperwork completed.

Postoperative care – Day following surgery D1

A post-operative full blood count (FBC) is not routinely required if the blood loss is less than 1000ml and the pre-operative Hb is >104g/L. this should be collected at 6am on day 1. Blood can be taken from 18:00 onwards on the day of the surgery if it was completed prior to 12pm. This is so the result is available for discharge planning and if required TTO for Ferrous Sulphate should be prescribed on eCare.

Midwifery checks of the service user/parent and baby will be performed as routine, including infant feeding assessment.

Obstetric review is not routinely required for service users on ERP, however if an obstetric review is needed (as requested by the Midwife) that service user should be prioritised, so not to delay the enhanced discharge.

Neonatal and audiology checks should be prioritised for service users on the enhanced recovery pathway. The NIPE and hearing test should take place at least 4 hours after birth.

3.6 Discharge

Midwifery led discharge should be the normal pathway followed for enhanced recovery to expedite the discharge process

The time of discharge is aimed at midday on the day after the operation. The service user should have someone available to support them home and stay with them for at least 24 hours.

Discharge should be delayed until 4 hours after the last oral morphine dose, to ensure pain is managed and no further oral morphine is required

Discharge TTO's should be provided

- Dihydrocodeine TTO 30mg 4-6 hourly PRN, max dose in 24 hours 120mg (28 tablets supply) Advise the service user to use the minimum effective dose for the shortest period of time, as they can cause constipation in the mother and drowsiness and poor feeding in the breastfeeding infant.
- Lactulose 10ml BD regularly

There should be no concerns about the service user's clinical condition before discharge to the community. Routine discharge advice and telephone numbers should be provided

4.0 Risk Management

The maternity governance department will be responsible for ensuring adherence to the guideline is audited annually.
The audit will be presented at one of the monthly audit meetings for the O&G department. and any outstanding actions from the audit monitored at subsequent audit meetings. Any unresolved actions will be escalated to the clinical services unit and, if necessary, the Risk Register.

Create a monthly PowerBI report/metrics dashboard, in order to share progress.
Things to include:
Suitability for ERP documented on booking request
Suitability for ERP confirmed at the end of the operation
Use of the obstetric ERP prescribing powerplan
Use of ondansetron/dexamethasone in theatre
Documented regional block
Time of catheter removal/mobilising/BF assessment/NIPE/hearing check etc.
LOS in hours, % of elective enhanced service users going home the next day,
Theatre 1 start times
TTO prescriptions
VTE assessment/prescription
Any existing satisfaction/pain relief audits Reasons for delayed discharge

5.0 Statement of evidence/references

PROSPECT Publications on Caesarean Section - ESRA (esraeurope.org) Updated 2023

SOAP consensus statement on enhanced recovery after Caesarean

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6.0 Governance

6.1 Document review history

Version Number	Review Date	Reviewed by	Changes made
3	**March 2022**	**Authors**	**Complete review**
3.1	Oct 2023	E Tyagi Approved by Women's Health Guideline Review Group	Included 'sip till send' protocol withing this guideline.
3.2	February 2024	E Tyagi E Khan	Included GRAPES, the expected timeline of ERP pathway

6.2 Consultation History

Stakeholders Name / board	Area of Expertise	Date sent	Date received	Comments	Endorsed Yes / No
Women's Health Guideline Review Group	Women's Health	Oct 2023	Oct 2023	Changes in version 3.1 approved in chairman's actions	Yes
Women's Health Guideline Review Group	Women's Health	February 2024	-	Version 3.2 approved	Yes

6.3 Audit and monitoring

Audit/Monitoring Criteria	Audit Lead	Frequency of Audit	Responsible Committee/Board
Enhanced Recovery Leaflet provided to all who meet ERP criteria	Maternity MDT	Quarterly for 6 months then review	Women's Health CIG Audit Afternoon
Number of service users excluded from the ERP criteria perioperatively	Maternity MDT	Quarterly for 6 months then review	Women's Health CIG Audit Afternoon
Number of service users not TWOC before 8hrs maximum who are on the ERP	Maternity MDT	Quarterly for 6 months then review	Women's Health CIG Audit Afternoon
Number of service users who have TTOs prescribed perioperatively who are on the ERP	Maternity MDT	Quarterly for 6 months then review	Women's Health CIG Audit Afternoon
Number of service users discharged within 24hrs of their operation who are on the ERP	Maternity MDT	Quarterly for 6 months then review	Women's Health CIG Audit Afternoo

6.4 Equality Impact Assessment

As part of its development, this Guideline and its impact on equality has been reviewed. The purpose of the assessment is to minimise and if possible remove any disproportionate impact on the grounds of race, gender, disability, age, sexual orientation, religion or belief, pregnancy and maternity, gender reassignment or marriage and civil partnership. No detriment was identified. Equality Impact assessments will show any future actions required to overcome any identified barriers or discriminatory practice.

Equality Impact Assessment			
Division	Women and children	Department	Maternity
Person completing the EqIA	E Tyagi	Contact No.	
Others involved:	Yes	Date of assessment:	Mar 2022
Existing policy/service	No	New policy/service	No

Will patients, carers, the public or staff be affected by the policy/service?	Yes
If staff, how many/which groups will be affected?	All maternity staff

Protected characteristic	Any impact?	Comments
Age	NO	Positive impact as the policy aims to recognise diversity, promote inclusion and fair treatment for patients and staff
Disability	NO	
Gender reassignment	NO	
Marriage and civil partnership	NO	
Pregnancy and maternity	YES	
Race	NO	
Religion or belief	NO	
Sex	NO	
Sexual orientation	NO	

What consultation method(s) have you carried out?
Maternity guideline comments via email, Maternity guideline review group
How are the changes/amendments to the policies/services communicated?
Guideline review group, guideline monthly memo
What future actions need to be taken to overcome any barriers or discrimination?

Appendix 1 Enhanced Recovery Flow Chart

Pre-operative Assessment

- Service users should advise purchase of Paracetamol and Ibuprofen for home use following LSCS (if not contraindicated)
- Explain the fasting requirements.

  → The service user is encouraged to eat normally until 3am on the day of the operation. They should also be encouraged to sip still, clear, non-fizzy fluids from a standard ward glass (170ml) that is refilled every hour till it is time for them to go to theatres. Examples of clear fluids include diluting juices/squash, fruit juices without pulps or bits, non-fizzy iso-osmolar energy drinks, such as non-fizzy isotonic sports drinks. Hot drinks such as tea or coffee with upto 15ml (3 teaspoons) of milk may be offered at the discretion of the anaesthetist. For high-risk patients, the anaesthetist will communicate different instructions to the ward.
- Supply Omeprazole

Night before CS at 22:00	Omeprazole 20mg
Morning of the CS at 07:00	Omeprazole 20mg

- One sample of blood grouping and serum save, and full blood count are taken during the pre-op session.
- A MRSA and Covid-19 swab should be taken at this stage if not done in clinic. The results of the MRSA swab should be checked and documented in eCare.
- The service user should be advised that although they are on an elective list, sometimes this needs to be interrupted due to emergencies and so there might be a delay on the day of surgery, or in some cases cancelled on the day due to emergencies or other safety situations.

On the day of surgery

- The service user should be advised to attend the hospital by 07:30hrs
- The Midwife should check the service user has their own supply of Paracetamol and Ibuprofen at home
- Sip Till Send is the default for all adult patients undergoing elective caesarean section unless specified otherwise by the anaesthetist.
- Consider changing the order of the list to prioritise the service users on the enhanced recovery pathway, to facilitate earlier discharge on day 1.
- Prepare the service user for theatre and complete the relevant paperwork

Procedure

- Regional anaesthesia should be used unless contraindicated/declined: the anaesthetist will decide this following an overall assessment and an informed discussion with the service user. If the service user requires a general anaesthetic, they are excluded from the enhanced recovery pathway**.**
- Neuraxial block with diamorphine will be used unless contraindicated or declined. If there is a national shortage of diamorphine, intrathecal morphine +/- fentanyl should be used.
- Use operative techniques to minimise pain such as avoiding dissecting the sheath posteriorly and use the Cohen's entry is advised in the Enhanced Recovery Partnership Report 2012.
- Use local anaesthesia (levobupivacaine) to supplement post-operative analgesia, either as local infiltration by the surgeon or TAP blocks by the anaesthetist. For service users who

have had at least two previous caesareans, insert a wound infiltration catheter ("pain buster").

- The aim should be for normothermia throughout the surgery as this reduces the risk of wound infection, coagulopathy, blood loss, and transfusion requirement
- Final assessment of the service user's suitability for enhanced recovery will be decided by the multi-disciplinary team perioperatively after considering any surgical or anaesthetic complications or difficulties encountered. This should be included in the sign out process at the end of the operation. The service user should then be informed accordingly. N.B. service users may come off the Enhanced Recovery pathway at any time – especially if unexpected surgical complications, bleeding (>1000ml) or neonatal issues.
- Discharge medications, including thromboprophylaxis, should be prescribed by the operating team whilst in theatre which will be dispensed by the ward
- All service users must be assessed for their risk of venous thromboembolism and prescribed thromboprophylaxis on the ante/postnatal prophylaxis section of the drug chart by the operating team.

Post operative D0 – Recovery and ward area

- Postoperative nausea and vomiting should be managed immediately with antiemetics
- All service users should be recovered following the postoperative recovery guideline
- IV lines and fluids should be discontinued in recovery and water should be provided (Unless otherwise asked to be continued until completed)
- Once the service user is on the ward, they should be encouraged to eat and drink when they feel ready, ideally normal diet should resume within 4 hours post-operatively.
- Early mobilisation should be encouraged 6 hours post operatively. Once the service user has mobilised the urinary catheter should be removed. The service user should pass at least 200ml of urine in a single void within 6 hours of having the catheter removed. Continue bladder care as per the Bladder Care guideline.Bladder Care Guideline.pdf (adobe.com)
- Postoperative pain relief should be offered to all service users after LSCS
  - Paracetamol 1gm orally 6 hourly (unless contraindicated)
  - Ibuprofen 400mg orally 8 hourly (unless contraindicated)
- First line for breakthrough pain
  - Dihydrocodeine 30mg 4-6 hourly PRN, max dose in 24 hours 120mg (unless contraindicated)
- Second line for breakthrough pain - Advise the patient to use the minimum effective dose for the shortest period of time.
  - Oramorph 10-20mg 2hrly PRN (unless contraindicated)
  - Ondansetron 4mg IV TDS PRN (this is also effective against pruritus unless contraindicated)

Postoperative care – day after surgery D1

- If a post-operative full blood count (FBC) is required (blood loss ≥500mls or the service user is symptomatic), this should be collected at 6am on day 1. Blood can be taken from 18:00 onwards on the day of the surgery if it was completed prior to 12pm. This is so the result is available for discharge planning and if required TTO for Ferrous Sulphate should be prescribed on eCare.
- Midwifery checks of the service user and baby will be performed as routine

- If an obstetric review is needed (as requested by the Midwife) that service user should be prioritised so not to delay the enhanced discharge
- Once the day one checks are completed, they have mobilised and there are no concerns with blood results the intravenous catheter can be removed.
- Neonatal and audiology checks should be prioritised for service users on the enhanced recovery pathway.

Discharge

- Midwifery led discharge should be the normal pathway followed for enhanced recovery service users to expedite the discharge process
- The time of discharge is aimed at midday on the day after the operation. The service user should have someone available to support them home and stay with them for at least 24 hours.
- Discharge should be delayed until 4 hours after the last oral morphine dose, to ensure pain is managed and no further oral morphine is required
- Discharge TTO's should be provided
  - Dihydrocodeine TTO 30mg 4-6 hourly PRN, max dose in 24 hours 120mg (28 tablets supply) Advise the patient to use the minimum effective dose for the shortest period of time
  - Lactulose 10ml BD regularly
- There should be no concerns about the service user's clinical condition before discharge to the community
- Routine discharge advice and telephone numbers should be provided

Appendix 2: Grapes Form

We believe that every birth should be special and personal.

You can make choices about your birth in theatre and we will follow these as much as possible.

GRAPES: My theatre choices

Please tick which you would like:

Gender: I already know my baby's gender ☐

I would like to be shown my baby's gender ☐

I would like my birth partner to tell me my baby's gender ☐

I would like the surgeon to tell me my baby's gender ☐

Other: _____

Reveal: I would like the screen to be up throughout ☐

I would like the screen lowered as the baby is being born ☐

Ambience: What music and lighting would you like?

_____

Partner: My birth partner would like to cut the cord ☐

Extras: Vitamin K Oral ☐ Injection ☐

Delayed Cord Clamping ☐

Skin to skin: I would like immediate skin to skin with my baby ☐

I would like my baby to be checked first, then skin to skin ☐

I would like my birth partner to have skin to skin with my baby ☐

I don't want skin to skin ☐