

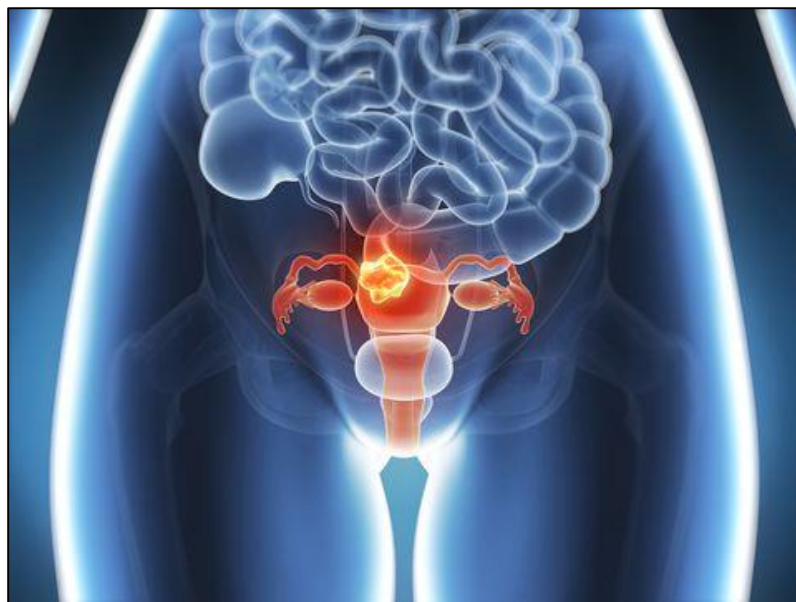
HPH – AHRQ

ERAS GYN Cohort

May 14, 2019

Kapi'olani ISCR GYN Data

Total number of GYN Cohort cases:	2017: 453	2018: 467
Length of stay mean for GYN cohort:	2017: 1.00	2018: 0.96
Length of stay median for GYN cohort:	2017: 0	2018: 0



Kapi'olani ISCR GYN Data cont.'

	Numerator	Denominator	Rate
30-day readmission	2017: 14	2017: 453	2017: 3.1%
	2018: 13	2018: 467	2018: 2.8%
Surgical site infection (organ/space)	2017: 3	2017: 453	2017: 0.6%
	2018: 11	2018: 467	2018: 2.4%
UTI	2017: 7	2017: 453	2017: 1.5%
	2018: 6	2018: 467	2018: 1.3%
PE	2017: 2	2017: 453	2017: 0.4%
	2018: 1	2018: 467	2018: 0.2%
VT	2017: 2	2017: 453	2017: 0.4%
	2018: 1	2018: 467	2018: 0.2%
Mortality	2017: 0	2017: 453	2017: 0.0%
	2018: 1	2018: 467	2018: 0.2%

Breakdown of Readmissions at Kapi'olani

	2017	2018
GYN Physicians	3 (1 readmission each)	4 (1 readmission each)
GYN Oncology	11 Benign path: 3 Malignant: 8	9 Benign path: 4 Malignant: 5

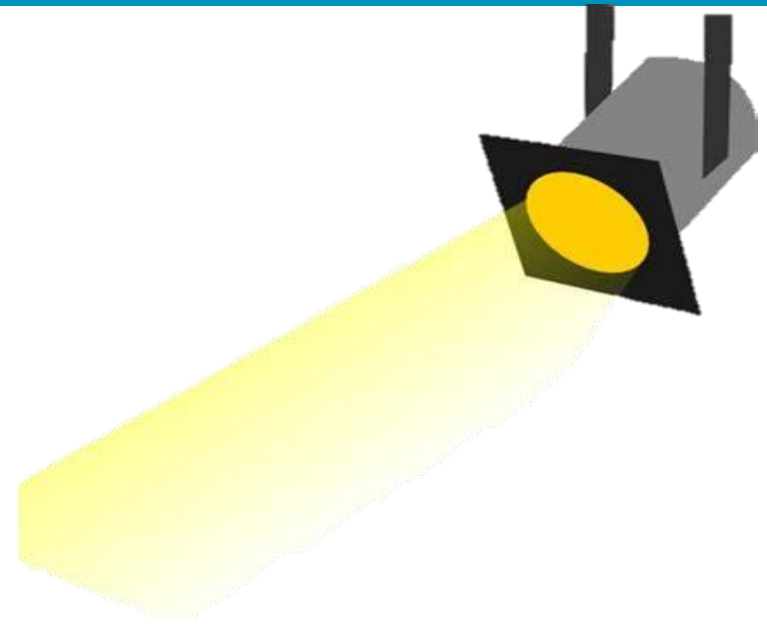
Pali Momi ISCR GYN Data

Total number of GYN Cohort cases done:	2017: 45	2018: 53
Length of stay mean for GYN cohort:	2017: 2.6	2018: 0.4
Length of stay median for GYN cohort:	2017: 1	2018: 0

	Numerator	Denominator	Rate
30-day readmission	0	2017: 45	0
		2018: 52	
Surgical site infection (organ/space)	2017: 1	2017: 45	2017: 2%
	2018: 0	2018: 52	2018: 0%
Urinary tract infection	2017: 0	2017: 45	2017: 0%
	2018: 3	2018: 52	2018: 5.8%

Major Focus Areas

- ERAS order sets
- Preadmission counseling
- Pre-op surgical visit
- Patient education booklet / handouts
- Buy-in by all MDs



Ensure Perioperative Nutrition Bundle

Standardization Across Sites

- Drink availability
- Offered to 100% of elective
- Education completed through pre-op surgical visit
- Documentation in Epic



ERAS Nutrition Optimization

Full Surgery Nutritional Pack Pick Up

10 - Ensure Surgery Immunonutrition Shakes

3 – Ensure Pre-Surgery Clear Nutrition Drinks

Cost = \$23 + Tax

Pick Up Location:

Hau'oli Court Dining Room – 1st Floor (Pali Momi Cafeteria)

***Please see cashier**

Partial Surgery Nutritional Pack Pick Up

3 Ensure Pre-Surgery Clear Nutrition Drinks

Cost = \$6 + Tax

Pick Up Location:

Hau'oli Court Dining Room – 1st Floor (Pali Momi Cafeteria)

***Please see cashier**

GYN Order Set in EMR



ERAS GYN Pre-Op Order Set

▼ Nursing

- Consent**
ONCE, First occurrence today at 1500, Routine, Normal, Confirm Consent signed and scanned into Epic. Notify physician if not received, Pre-op, Sign & Hold
- Vital Signs**
Q4H, First occurrence today at 1500, Until Specified, Routine, Normal, Pre-op, Sign & Hold
- NPO**
START NOW, starting today at 1500, Until Specified, Routine
NPO -: except for meds
Normal, Pre-op, Sign & Hold
- Glucose POCT**
PRE OP ONCE, First occurrence today at 1500, Routine, Normal, Pre-op, Sign & Hold
- Void on call to OR**
ONCE, First occurrence today at 1500, Routine, Normal, Pre-op, Sign & Hold
- Incentive Spirometry**
Q1H WA RT, First occurrence today at 1500, Routine, Normal, Pre-op, Sign & Hold
- BATHE PT W/ 2% CHLORHEXIDINE GLUCONATE**
ONCE, First occurrence today at 1500, Routine, Normal, Wipe down patient once Preop, Pre-op, Sign & Hold
- Clip and Prep Site**
ONCE, First occurrence today at 1500, Routine, Normal, Pre-op, Sign & Hold
- Call Physician**
ONCE, First occurrence today at 1500, Routine, Normal, If timing of surgery is expected to change, anesthesia concerns, non-adherence to ERAS regimen, or for other concerns, Pre-op, Sign & Hold
- Call Physician**
PRN, starting today at 1457, Until Specified, Routine, Normal, Temperature <36C or >38.5C, SBP <90 or >160, DBP<55 or >95, HR <60 or >120, RR <8 or >30, Urine Output <30ml/hr or <240ml in 8 hours, Glucose < or = 60 or >250mg/dL, hemoglobin <8, mental status deterioration, or other nursing concern, Pre-op, Sign & Hold
- Foley to Gravity**
Pre-op
- Vaginal Prep Betadine**
In OR after anesthesia. Insert soaked applicator into vagina and remove. Repeat two more times for total of 30 seconds scrub time. Start prep at discretion of the anesthesiologist. Contraindicated in patient with allergy to shellfish or Betadine, or active herpes outbreak, Pre-op
- Vaginal Prep Irrisept**
In OR after anesthesia. Irrisept Vaginal Prep- Insert soaked applicator into vagina and remove. Repeat two more times for total of 30 seconds scrub time. Start prep at discretion of the anesthesiologist. Contraindicated in patient with active herpes outbreak, Pre-op

▼ PREOP Labs

- UCG (POCT)**
Pre-op
- DRAW AND TAG**
Pre-op
- TYPE & SCREEN (POSS X-MATCH) PANEL**
Pre-op
- TYPE & CROSSMATCH PANEL**
Pre-op
- URINE MACROSCOPIC ONLY**
Pre-op
- PT & PTT PANEL (Inpatient)**

ERAS GYN Pre-Op Order Set

- PT & PTT PANEL (Inpatient)
- FIBRINOGEN, QUANTITATIVE
Pre-op
- BMP
Pre-op
- CMP
Pre-op
- ▼ IV Fluids
- lidocaine 1 % inj (XYLOCAINE)
0.1 mL PRN, Intradermal, Routine, IV starts, Pre-op, Sign & Hold
- sodium chloride 0.9% inj (SALINE LOCK)
10 mL PRN, Intravenous, Routine, Flush, Pre-op, Sign & Hold
- sodium chloride (NS) 0.9% 1000ml inj
at 75 mL/hr, CONTINUOUS, Pre-op
- lactated ringers 1000 mL inj (LR)
at 75 mL/hr, Intravenous, CONTINUOUS, Pre-op
- dextrose 5%-lactated ringers 1000 mL inj (D5LR)
at 75 mL/hr, CONTINUOUS, Pre-op
- dextrose 5%-sodium chloride 0.45% 1000 mL inj (D5 1/2NS)
at 75 mL/hr, Intravenous, CONTINUOUS, Pre-op
- dextrose 5%-sodium chloride 0.9% 1000 mL inj (D5NS)
at 75 mL/hr, Intravenous, CONTINUOUS, Pre-op
- ▼ ERAS GYN PREOP MEDS
- povidone-iodine 5 % soln (BETADINE)
Intranasal, PRE OP ONCE, 1 dose, today at 1500, Routine
- FOR EXTERNAL USE ONLY**
Pre-op, Sign & Hold

ERAS GYN Pre-Op Order Set

NSAID Panel ←

ibuprofen tab (MOTRIN)
600 mg, PRE OP ONCE, Oral, Take 2 hrs prior to surgery - HOLD if peptic ulcer disease or Chronic Kidney Disease stage > or = to 3. (Cr > 1.3), Pre-op

celecoxib cap (CELEBREX)
400 mg, PRE OP ONCE, Oral, Hold if patient has chest pain, coronary heart disease, shortness of breath on exertion, or uncontrolled diabetes mellitus or hypertension, peptic ulcer disease, or chronic kidney disease stage > or = to 3. (Cr > 1.3), Pre-op

traMADol tab (ULTRAM)
PRE OP ONCE, Oral, Take 2hrs prior to surgery, Pre-op

gabapentin cap (NEURONTIN)
600 mg, PRE OP ONCE, Take 2 hrs prior to surgery, Pre-op

phenazopyridine tab (PYRIDIUM)
PRE OP ONCE, Oral, Pre-op

citric acid 334mg - sodium citrate 500mg /5ml soln (BICITRA)
15 mL, PRE OP ONCE, Oral, History of GERD, taken food or fluids orally within 2 hours, or BMI > 40, Pre-op

ORAL ACETAMINOPHEN / TYLENOL PREOP PANEL ←

acetaminophen tab (TYLENOL) 650mg
650 mg, PRE OP ONCE, Oral, Pre-op

acetaminophen tab (TYLENOL) 975mg
975 mg, PRE OP ONCE, Oral, Pre-op

acetaminophen tab (TYLENOL) 1g
1,000 mg, PRE OP ONCE, Oral, Pre-op

▼ Preop ABX and Redosing Panels

Cefazolin 1G for pts who weigh < or = 40kg

Cefazolin 2g for pts who weigh 41-119kg

Cefazolin 3g for pts who weigh > or = 120kg

Clindamycin with redosing panel

clindamycin IV / levofloxacin IV panel **for beta-lactam allergic patients

Levofloxacin/Metronidazole Preop Panel

Cefoxitin and Redosing

Metronidazole iv / Gentamicin iv panel

zosyn preop and redosing panel

DOXYCYCLINE PREOP PO or IV ←

doxycycline hyclate tab
200 mg, PRE OP ONCE, Oral, Pre-op

doxycycline 200 mg in sodium chloride 0.9% 250 mL
PRE OP ONCE, Give within 1 hr prior to procedure. Given by Anesthesia, Pre-op

ERAS 3 Postop Orders.docx [Read-Only] [Compatibility Mode] - Word

ERAS GYN Post-Op Order Set

▼ Nursing

- Vital Signs
Q4H, First occurrence today at 1515, Until Specified, Routine, Normal, Post-op, Sign & Hold
- Pulse Oximeter checks by nursing
Q4H, Post-op
- Nursing Communication
UNTIL DISCONTINUED, First occurrence today at 1515, Routine, Normal, Document in Flowsheet- Date/Time to bowel sounds Date/Time of first flatus Date/Time of first bowel movement, Post-op, Sign & Hold
- Turn, Cough and Deep Breathe
Q2H, First occurrence today at 1515, Until Specified, Routine, Normal, While awake, Post-op, Sign & Hold
- Incentive Spirometry
Q1H WA RT, First occurrence today at 1515, Routine, Normal, Post-op, Sign & Hold
- Call physician or house officer
PRN, starting today at 1508, Until Specified, Routine, Normal, Temperature <36C or >38.5C, SBP <90 or >160, DBP<55 or >95, HR <60 or >120, RR <8 or >30, Urine Output <30ml/hr or <240ml in 8 hours, Glucose < or = 60 or >250mg/dL, Hemoglobin <8, mental status deterioration, or other nursing concern, Post-op, Sign & Hold
- Call physician or house officer
UNTIL DISCONTINUED, First occurrence today at 1515, Routine, Normal, If patient is not on their home medications regimen on POD1, nor are those medication re-ordered in the hospital, please call physician to determine if these medications should be re-ordered, Post-op, Sign & Hold
- Daily Weight
UNTIL DISCONTINUED, First occurrence today at 1515, Routine, Normal, Post-op, Sign & Hold
- Intake and Output Q4H
Q4H, First occurrence today at 1515, Until Specified, Routine, Normal, Post-op, Sign & Hold
- May Shower
On PO Day 2 if no continuous infusions are running and patient is ambulating, Post-op
- Pad Count
Q12H, Call provider if changing pad more frequently than 3 pads w/in 3 hours, Post-op
- JP to bulb suction, empty and record amount
Q12H, Post-op
- NG to low intermittent suction
Post-op
- Foley to Gravity
Post-op
- Foley Discontinue
ONCE for 1 occurrence, On POD #1, Post-op
- Bedside Bladder Scan
PRN, Scan if unable to void for 4 rs after Foley removal or no void for 8 hrs, Post-op
- Straight Cath if unable to void
Post-op
- Abdominal Binder Apply
Post-op
- Sitz Bath
Post-op
- TENS Unit
Post-op

ERAS GYN Post-Op Order Set cont.'

Remove Dressing
ONCE for 1 occurrence, On POD#2 or PRN if soiled, Post-op

ERAS Activity

Ambulate
TID, Post-op

Bedrest
Post-op

Bedrest with bathroom privileges
Post-op

ERAS Activity

Day of Surgery: Patient out of bed with assistance
AD LIB, starting today at 1508, Until Specified, Routine, Normal, POD Out of Bed with Assistance At least twice if admitted to inpatient floor before 2 pm. At least once if admitted to inpatient floor after 2 pm., Post-op, Sign & Hold

POD #1 - Ambulate with assistance
TID, First occurrence today at 2100, Until Specified, Routine, Normal, Starting on POD #1 Nursing staff to ambulate patient in hall with assist 3x per day. Patient out of bed at least 3hrs to ambulate and sit in chair. Out of bed, sitting in chair for all meal times at least 3x per day., Post-op, Sign & Hold

POD2 - Ambulate with assistance
QID, First occurrence on Thu 4/18 at 0900, Until Specified, Routine, Normal, POD #2- Nursing staff to ambulate patient in hall 4x per day. Patient out of bed at least 4hrs to ambulate and sit in chair., Post-op, Sign & Hold

POD3 and thereafter - Ambulate with assistance
QID, First occurrence today at 1700, Until Specified, Routine, Normal, POD #3 until discharge Nursing staff to ambulate patient in hall 4x per day. Patient out of bed at least 6hrs to ambulate and sit in chair., Post-op, Sign & Hold

Diet

NPO
START NOW, Post-op

Bland Low Fiber Diet (Soft Diet)
START NOW, Starting 4/16/19 Until Specified, Post-op

Carb Controlled (Diabetic) Diet
Post-op

Clear Liquids
START NOW, Post-op

Clear Liquids with Advance as Tolerated

Combination Diet
START NOW, Starting 4/16/19 Until Specified, Post-op

Supplements
Post-op

Heart Healthy Diet
START NOW, Starting 4/16/19 Until Specified, Post-op

Regular Diet
Post-op

Renal Diet
Post-op

ERAS GYN Post-Op Order Set cont.'

Post-op

▼ Labs in AM

- CBC PLT W/AUTO DIFF
IN AM, Post-op
- CBC PLT W/MANUAL DIFF
IN AM, Post-op
- BASIC METABOLIC PANEL
IN AM, Post-op
- COMP METABOLIC PANEL
Post-op
- COMP METABOLIC PANEL
EVERY TUE AND FRI, Post-op
- Magnesium Level
Post-op
- PHOSPHORUS BLOOD
IN AM, Post-op
- PT & PTT PANEL (Inpatient)
- URIC ACID
Post-op
- BUN & CREATININE PANEL (Inpatient)
- AST (SGOT)
Post-op
- ALT (SGPT)
Post-op

ERAS GYN Post-Op Order Set cont.'

▼ **Multimodal Pain Group**

Multimodal Pain Group

ERAS GYN PAIN PANEL

ERAS ACETAMINOPHEN TYLENOL OFIRMEV IV TO PO PANEL

acetaminophen inj (OFIRMEV)
1,000 mg Q6H, Intravenous, Routine
May be administered without further dilution. Do NOT use if particulate matter or discoloration is observed. Administer dose over 15 minutes. Use within 6 hours after puncturing vial or drawing up dose in syringe. Use vented set with vial.
Post-op, Sign & Hold

acetaminophen
▼ Missing Weight for dose checking

Followed by

acetaminophen tab (TYLENOL)
1,000 mg Q8H, Oral, Routine
Do not exceed a total of 4gm acetaminophen per day from all products containing acetaminophen.
Post-op, Sign & Hold

ketorolac (TORADOL) 15mg
15 mg, Q6H, Intravenous, Post-op

NSAID to start in 18hrs after ketorolac

gabapentin cap (NEURONTIN)
300 mg, Oral, TID for 6 doses, Post-op

LIDOCAINE 5% EXT PATCH PANEL

Breakthrough Pain Meds

tramADol tab (ULTRAM)
Q4H PRN, Oral, MODERATE PAIN (4-6) (ORAL, SEVERE PAIN (7-10) (ORAL), Breakthrough Pain when off opioid PCA and > 24hrs from spinal/astromorph, Post-op

oxyCODONE ir tab (ROXICODONE)
5 mg, Q4H PRN, Oral, BREAKTHROUGH PAIN, Breakthrough Pain when off opioid PCA and > 24hrs from spinal/astromorph, Post-op

HYDRomorphONE tab (DILAUDID)
2 mg, Q4H PRN, BREAKTHROUGH PAIN, Breakthrough Pain when off opioid PCA and > 24hrs from spinal/astromorph, Post-op

morPHINE tab (MSIR) PO
15 mg, Q4H PRN, Oral, MODERATE PAIN (4-6) (ORAL, SEVERE PAIN (7-10) (ORAL), Breakthrough Pain when off opioid PCA and > 24hrs from spinal/astromorph, Post-op

morPHINE sulfate 2 MG/ML inj (MORPHINE)
2 mg, Q4H PRN, Intravenous, BREAKTHROUGH PAIN, Breakthrough Pain when off opioid PCA and > 24hrs from spinal/astromorph, Post-op

ferrous SULFATE tab
325 mg, BID, Post-op

Only Choose one of these

ERAS GYN Post-Op Order Set cont.'

GYN ANTI EMETIC ERAS

ondansetron 4 MG/2ML (ZOFRAN)
 4 mg Q4H PRN, Intravenous, Routine, NAUSEA AND/OR VOMITING, 1st line
 1st Line for nausea and/or vomiting
 Post-op, Sign & Hold

ondansetron
 ↑ Frequency of **6 doses/day** exceeds recommended maximum of **3 doses/day**

Stool Panel

ERAS STOOL SOFTENER PANEL W/MOM AND MIRALAX CHOICE

docusate cap (COLACE)
 100 mg BID, Oral, Routine
 Hold for loose stools
 Post-op, Sign & Hold

bisacodyl EC tab (DULCOLAX)
 10 mg DAILY PRN, Oral, Routine, CONSTIPATION, Use if no BM for 2 days
 Use if no BM for 2 days
 Post-op, Sign & Hold

MOM OR MIRALAX PANEL

polyethylene glycol pkt (MIRALAX)
 17 g, DAILY PRN, Oral, CONSTIPATION, if no results from Colace or Dulcolax, If no results from Colace or Dulcolax, Post-op

magnesium hydroxide 400 MG/5ML susp (MOM)
 30 mL, DAILY PRN, Oral, CONSTIPATION, If no results from Colace or Dulcolax, If no results from Colace or Dulcolax, Post-op

senna tab (SENOKOT)
 BID, Oral, Hold for loose stools and when having greater than 1 bowel movement for 2 days, Post-op

senna 8.6mg-docusate sodium 50mg tab (PERI-COLACE/SENOKOT S)
 2 Tab, BID, Oral, Hold for loose stools, Post-op

ERAS GYN Post-Op Order Set cont.'

▼ PCA Panel

If selecting a PCA- please choose all appropriate orders.
PCA Monitoring and Narcan should both be ordered in addition to the PCA medication.

PCA MONITORING PANEL

naloxone 0.4 MG/ML inj (NARCAN)
0.4 mg, PRN, Intravenous, 0.4mg prn respiratory depression from morphine Q 2-3 min (max 2 mg), Post-op

morphine PCA 1mg/mL 55mL (PHARMEDIUM)
Intravenous, CONTINUOUS, Post-op

morphine PCA 1mg/mL 55mL (PHARMEDIUM)
Intravenous, START IN PACU, Recovery & Post-op

fentanyl PCA
Intravenous, CONTINUOUS, Post-op

fentanyl PCA
Intravenous, START IN PACU, Recovery & Post-op

HYDROmorPHONE PCA
Intravenous, CONTINUOUS, Post-op

HYDROmorPHONE PCA
Intravenous, START IN PACU, Recovery & Post-op

ERAS GYN Post-Op Order Set cont.'

▼ Meds ABX Hysterectomy w/o COLON

Although routine continued administration of antibiotics after skin closure is felt not to be necessary, the choices in the order set are developed to help the clinician choose to continue antibiotics for up to 24 hours after case completion with acceptable choices. Use of the choice list in this section will assist the clinician with ease of ordering and general compliance with recommendations but picking medications from this section is not mandatory.

- Cefazolin IVPB 1 g for patients who weigh < or = to 40 kg
1 g, Q8H, Intravenous, Post-op
- Cefazolin IVPB 2 g for patients who weigh 41-119 kg
2 g, Q8H, Intravenous, Post-op
- Cefazolin IVPB 3 g for patients who weigh over 120 kg
3 g, Q8H, Post-op
- Cefoxitin IVPB 2 g (MEFOXIN)
2 g, Q6H, Intravenous, Post-op
- Clindamycin 900mg (CLEOCIN) ** for beta lactam allergic patients
900 mg, Intravenous, Q6H for 3 doses, Post-op

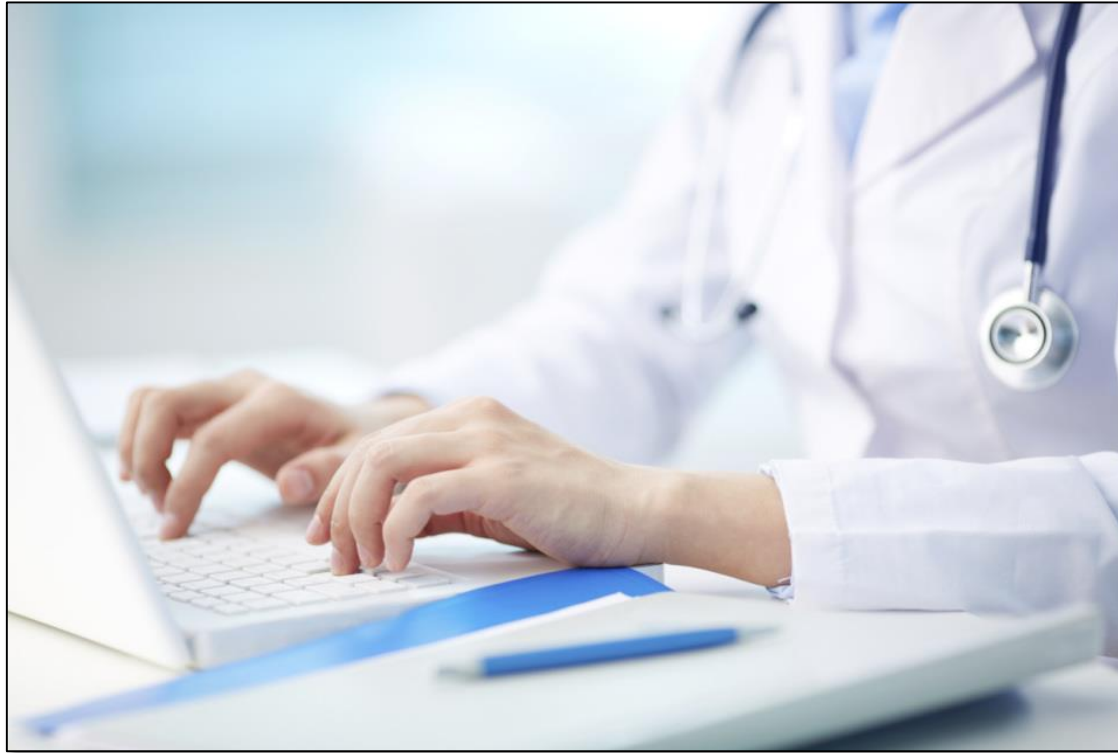
Section still in review

▼ Meds ABX Hyst WITH COLON

Although routine continued administration of antibiotics after skin closure is felt not to be necessary, the choices in the order set are developed to help the clinician choose to continue antibiotics for up to 24 hours after case completion with acceptable choices. Use of the choice list in this section will assist the clinician with ease of ordering and general compliance with recommendations but picking medications from this section is not mandatory.

- Cefoxitin IVPB (MEFOXIN)
2 g, Q6H, Intravenous, Post-op
- Clindamycin 900mg (CLEOCIN) ** for beta lactam allergic patients
900 mg, Intravenous, Q6H for 3 doses, Post-op

EMR ISCR Progress



ERAS Banner in EPIC

The screenshot displays the EPIC patient summary page for an inpatient. At the top right, the 'ERAS: Yes' status is highlighted with a red box. Below the patient information, a navigation bar includes links for 'Nursing Link', 'Facesheet-multipage', 'Overview', 'Medication Audit', 'Qty Nurse Snapshot', 'ADT Events', and 'Lab Order Mgmt'. The main content area features several banners: a green banner for 'Patient Receiving Oncology Treatment', a purple banner for 'Patient Class is Inpatient', and a brown banner for 'ERAS Patient' which is highlighted with a red box. Below these banners, there is a section for 'Signed & Held Orders' with a 'None' status.

This banner will appear when:

1. The case is scheduled as ERAS patient
2. The pre-op checklist is documented

A close-up of the 'ERAS Pathway' section in the EPIC interface. It shows a table with the question 'Is pt part of ERAS pathway?' and a 'Yes' response. A red arrow points to the 'Yes' cell.

ERAS Pathway	
Is pt part of ERAS pathway?	Yes

Documentation of Nutritional Drink

The screenshot displays a medical chart interface with several tabs: "Admission Database-Adult", "Pre Op/Procedure Chec...", "Assess-ICU", "Assess-M/S", "Transfusion", and "Admission Databas". The "Pre Op/Procedure Chec..." tab is active. On the left, a sidebar lists various categories with checkboxes, all of which are checked. The "ERAS Pathway" category is highlighted with a red box, and a red arrow points to its checkbox. The main content area shows a table with columns for "1m", "5m", and "10m". The "ERAS Pathway" section is highlighted in blue and contains the following items:

	1m	5m	10m
Measurements			
Weight KG			
Height CM			
BMI			
ERAS Pathway			
Is pt part of ERAS pathway?			Yes
Were you instructed to drink a nutritional supp?			Yes
How many drinks were completed?			
Clear carbohydrate drink completed?			
Blood Transfusion History			

ERAS Door Sign



Thank you!

