Outline

- Clinical Expectations
- Monthly Schedule
- Daily Schedule
- Systems Orientation
  - Nursing
  - Transfers
  - EPIC
  - Ancillary Staff
- Resources
WELCOME TO THE PICU!!!

• We are VERY excited to have you here!!!
• Get ready for an emotionally and physically demanding month
• Lots of rewards & opportunities:
  • To see physiology not seen elsewhere
  • To care for patients you may care for again
  • To practice skills that will serve you well in whatever discipline you wish to go into (IV starts, bag mask ventilation).
Daily Schedule (Students)

- 6:00 AM: Day shift Residents arrive for sign-out
- 0615-7:30 AM: Pre-Round
- 7:30 AM-10:00 AM: Rounds
- Post-call students are dismissed after presenting their patients on rounds
- 3:00-ish: afternoon check-in rounds
- 4:30 or 5:00 PM: Students not on call may sign out to the resident and go home
Clinical Expectations

- Be on time
- You should know your patient better than anyone else
- Presentations are concise, clear, with relevant information presented in orderly fashion
- Know about the disease processes you are treating
- Support your resident and fellow students.
- Wash your hands!!!
Overnight Call

- Goal is 6 calls in the month, average of Q4
- One Saturday, one Sunday.
- One weekend completely free.

- The residents take Q4 call, so we recommend you stagger your schedule slightly so that you can work with >1 resident during the month.

- PLEASE do not take call more frequently than Q3
Patient Management

• Many patients we “co-manage” with a surgical service
• What does this mean?
  • We share the responsibility for care of ALL of the patients
  • ALL traumas are admitted to pediatric surgery (trauma) service
  • If there is a patient that is also followed jointly with another medical or surgical service, it is our professional obligation to discuss our management plan with them.
  • This expectation works both ways (they should advise us of management plans)-if this doesn’t occur, inform fellow/attending.
Student Responsibilities

- You should carry no more than 2-3 patients at any given time.
- You should likely start with one patient during the first couple of days.
- You should know your patient better than anyone else.
- How is this translated into practice:
  - Be aware of what actions are to be followed up (labs, etc).
  - Know the results of studies performed.
  - Know about significant afternoon and overnight events.
  - If there is a procedure to be done, even though you may not be the one performing it, you should be involved.
  - If there are pertinent social situations please update team.
Presentations

- Preparation for Presentation
  - Pre-rounding
    - Review orders in EPIC
    - Check MAR
      - Make sure MAR matches EPIC orders and what patient is receiving
    - Check syringe pumps to check drip dosages
Presentations

- Examine your patients thoroughly!!!!
  - Include overall clinical appearance
  - Pertinent physical findings (murmurs, etc)
  - If on continuous sedation, describe level of sedation objectively using RASS scale (see next slide)

- Review vitals and clinical information in EPIC
  - Please take time to review highs and lows and assess
The Richmond Agitation and Sedation Scale: The RASS*

<table>
<thead>
<tr>
<th>Score</th>
<th>Term</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>+4</td>
<td>Combative</td>
<td>Overtly combative, violent, immediate danger to staff</td>
</tr>
<tr>
<td>+3</td>
<td>Very agitated</td>
<td>Pulls or removes tube(s) or catheter(s); aggressive</td>
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<tr>
<td>+2</td>
<td>Agitated</td>
<td>Frequent non-purposeful movement, fights ventilator</td>
</tr>
<tr>
<td>+1</td>
<td>Restless</td>
<td>Anxious but movements not aggressive vigorous</td>
</tr>
<tr>
<td>0</td>
<td>Alert and calm</td>
<td>Not fully alert, but has sustained awakening (eye-opening/eye contact) to</td>
</tr>
<tr>
<td></td>
<td></td>
<td>voice (≥10 seconds)</td>
</tr>
<tr>
<td>-1</td>
<td>Drowsy</td>
<td>Not fully alert, but has sustained awakening (eye-opening/eye contact) to</td>
</tr>
<tr>
<td></td>
<td></td>
<td>voice (≥10 seconds)</td>
</tr>
<tr>
<td>-2</td>
<td>Light sedation</td>
<td>Briefly awakens with eye contact to voice (&lt;10 seconds)</td>
</tr>
<tr>
<td>-3</td>
<td>Moderate sedation</td>
<td>Movement or eye opening to voice (but no eye contact)</td>
</tr>
<tr>
<td>-4</td>
<td>Deep sedation</td>
<td>No response to voice, but movement or eye opening to physical stimulation</td>
</tr>
<tr>
<td>-5</td>
<td>Unarousable</td>
<td>No response to voice or physical stimulation</td>
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</tbody>
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Verbal Stimulation

-2 Light sedation
-3 Moderate sedation

Physical Stimulation

-4 Deep sedation
-5 Unarousable

Procedure for RASS Assessment

1. Observe patient
   a. Patient is alert, restless, or agitated. (score 0 to +4)
2. If not alert, state patient’s name and say to open eyes and look at speaker.
   a. Patient awakens with sustained eye opening and eye contact. (score -1)
   b. Patient awakens with eye opening and eye contact, but not sustained. (score -2)
   c. Patient has any movement in response to voice but no eye contact. (score -3)
3. When no response to verbal stimulation, physically stimulate patient by shaking shoulder and/or rubbing sternum.
   a. Patient has any movement to physical stimulation. (score -4)
   b. Patient has no response to any stimulation. (score -5)

If RASS is -4 or -5, then Stop and Reassess patient at later time
If RASS is above -4 (-3 through +4) then Proceed to Step 2

We use a standardized rounds format
- Overnight events—1 liner given by student or resident following the patient
- RT/ECMO report—presents vent settings, amount of oxygen, etc
- RN report—presents access, what drips are running, fluid rates, concerns
- Pharmacy/Nutrition report
- Student/Resident presentation (by system; include an overall assessment BEFORE stating the plan)
- Attending/Consult clarification
- PICU Fellow will summarize the plan (Review Daily Goals & Daily Goal Sheets)
- Resident that is putting in orders will read back and confirm new orders
- Additional concerns (Family or staff)
Notes—

- ICU Progress Note
  - There is a PICU progress note template in EPIC that the residents will have to share with you

- Format
  - Subjective: brief HPI and/or overnight events
  - Assessment and Plan (by system)
  - Objective section (vitals and physical exam)
  - Summarize/identify important/relevant abnormal values.

- DO NOT CUT AND PASTE ANYTHING
  - Do not cut from other notes, your previous notes, ANYTHING
  - “Brevity is the key to genius.”
Notes

- Please share your notes with the resident following your patient
- Resident will edit/amend your note and send to the attending for co-signature

- Please ask for feedback on your notes (or anything else) if you do not receive any from the attending
Educational Opportunities

- Attendance at conferences
  - Tuesdays, Wednesdays, and Fridays at noon (sometimes time varies) for Residents and Students in PICU conference room
  - There are also fellow lectures on Mondays & Tuesdays at 11:00 (optional)
- Bedside learning during rounds
- Contribution on rounds by reading about the disease processes of your patients
A Word about Procedures

- We understand that there is a strong desire to perform procedures.
- However, one must demonstrate mastery in core skills (IVs, IOs, venipuncture, arterial puncture, BMV) prior to performing advanced skills (CVL placement, arterial line placement, endotracheal intubation).
- Even then, in emergent situations/unstable patients, the most skilled practitioner will perform procedure.
- Ultimately, assignment of procedures is at the discretion of PCCM fellow and attending.
Systems Orientation

- **Nursing**
  - Unit nurses can be your best resources
  - Being nice and respectful to the nurse will prove invaluable!
- **General expectation**
  - Please follow up with nurse on plans made during rounds
  - Inform nurse of new orders during the day
  - If plan changes, please inform nurse as soon as is feasible/practical
Ancillary Staff

- Respiratory Therapy
  - Very useful resources for airway and ventilator management
- HUCs and Nursing Assistants
  - Vital for throughput in the unit
  - Use them appropriately
Ancillary Staff

- Pharmacy
  - Assist with drug dosing and TPN
  - Utilize them as a resource

- Nutrition
  - Assist with diets and TPN
  - Assist with calculating calories and fluids
  - Useful resource especially in patients that malnutrition is a concern
Common PICU Topics

- 1-Airway-Intubation
- 2-ABGs
- 3-Post-Op-Cardiovascular Physiology
- 4-Fluids-&-Electrolytes
- 5-Mechanical-Ventilation
- 6-Medical-Errors
- 7-Respiratory-Failure
- 8-Sedation-Analgesia-Relaxants
- 9-Shock
- 10-Cardiovascular-Medications
- 11-Arrhythmias
- 12-Cardiogenic-Shock
- 13-DIC
- 14-Extracorporeal-Life-Support
- 15-Pulmonary-Artery-Catheterization
- 16-Septic-Shock
- 17-Sickle-Cell
- 18-Single-Ventricular-Physiology
- 19-Thromboembolic-Disorders
- 20-Cardiopulmonary-Interactions
- 21-Nutrition
- 22-Hepatic-Failure
- 23-Diabetic-Ketoacidosis
- 24-Endocrine-Emergencies
- 25-Disaster& Terrorism
- 26-Office-Emergencies
- 27-Stabilization&Transport
- 28-Ethics
- 29-Coma
- 30-Status-Epilepticus
- 31-Brain-Injury
- 32-Spinal-Injuries
- 33-Strokes
- 34-Pharmacokinetics-Pharmacodynamics
- 35-Toxicology
- 36-Hyponatremia
- 37-Renal-Failure
- 38-Renal-Replacement
- 39-High-Frequency-Oscillatory-Ventilation
- 40-Asthma
- 41-Acute-Respiratory-Distress-Syndrome
QUESTIONS?

- Please email Katie Clement, MD (course director)
  Katherine_clement@med.unc.edu

Most questions can also be answered by any of the PICU Faculty or Fellows.