Anonymous Feedback

Our website has a section for anonymous feedback. Think of this like an electronic suggestion box that you can use at any time. The message will be sent directly to Dr. Warm, and is completely anonymous. If you have constructive feedback that you would like to share, please use this tool. The link is: http://intmed.uc.edu/education/residency/feedback.aspx
To understand hyponatremia, one must understand the physiology of osmolality. The following factors affect osmolality by adjusting ratios of sodium and free water—affecting reabsorption and/or excretion.

- Free water ingestion is stimulated by the hypothalamus osmoreceptors (decreases osmolality)
- Free water reabsorption is increased by ADH action on the collecting ducts (decreases osmolality)
- Renin-aldosterone upregulation increases sodium reabsorption (increases osmolality)

How do you approach hyponatremia?
- Volume status
- Plasma osmolality and urine sodium
- Clinical picture with supporting evidence

When and how do you treat hyponatremia?
- It depends on the etiology (0.9% NaCl, 3% NaCl, diuresis, or free water restriction)
- In the absence of serious symptoms of cerebral edema, goal increase by no more than 0.5mEq/L/hr or 10-12mEq/L in the first 24 hours
- If symptomatic, the goal is to increase serum sodium by 4-6 mEq/L in first several hours
- If patient is seizing: Give 3%. Can give 50-100 cc bolus, repeat 1-2x at 10 min intervals
VA Improvement Updates

Several Quality Improvement projects are occurring at the VA to address overall workload on VA wards. We are targeting 3 areas to improve patient care, duty hours and overall workload. They include Admission process, inpatient versus observation and discharge process. Below are the 3 QI projects occurring as well as an attempted project from this week. Our goal is to continue improve patient care and education at the VA.

Recent PDSA: We trialed identifying discharges the day prior and utilizing the consult attendings to facilitate the discharge this past week. Feedback for this process was poor, few to no patient met this criteria and perception by residents and the attendings was that this only increased workload in the afternoon, resulted in unsafe hand-off at time of discharge and residents lost ownership of the patient. This plan has now been scrapped.

Discharge QI Project
Two of our hospitalists, Misoor Goueli and Aliacia Hochhausler are working on a Discharge QI Project.

Goal: To either flatten the bolus of discharges in the afternoon or shift the bolus earlier in the day. This will allow patients to be admitted or transferred out of the ICU earlier. It will also spread the burden of discharging and admitting throughout the day.

Team 1 is part of the current PDSA trial, with the goal to place discharge orders/rec by no later than 9:30 for patient who have been identified. This is occurring by the team huddling at 8:00am and complete the discharge together, including attending, senior resident and intern.

We are currently collecting data to see where the barriers lie for this and how to improve this.

Admitting QI Project
We are initiating a QI project to identify if there are is a difference in percent of appropriate admissions based on time of day and ED provider. We are in the initial steps of collecting this data.

Once data is collected will be able to identify where and how we can make changes.

We will have more info next week.

Appropriate Inpatient vs Obs Admit Project
Beginning February 22nd the “admit versus observation order” will now be placed by the admitting team rather than the ED. This allow better continuity of care and increase accuracy of correct order.

As of February 22nd if you are admitting at the VA during non-business hours you will be expected to place admit order with inpatient versus observation status within 15 minutes of the Doc-Doc phone call with the ED.

Please keep an eye out for next week’s newsletter which will have captions of the orders and process.

Upcoming Residency Events

Vulnerable Populations
Next dinner Monday! We will be discussing Module 3 in the Caring with Compassion online curriculum at caringwithcompassion.org
5pm Monday February 15th
Location: Mark Brown Library

Master Teacher Program
Group presentations pitfalls and pearls with the chief residents.
5pm Wed February 17th
Location: UH 7104 (Noon Report Room)

GME Special Review
Mandatory lunch meeting for all senior residents to give resident feedback to GME about the residency program!
Noon Thursday February 18th
Location: MSB 5051
Q: 80-year-old woman is hospitalized for a 1-week history of progressive weakness, nausea, and anorexia. She lives independently but has become bedridden and confused during the past 3 days. She has HTN managed with enalapril and chlorthalidone, which was initiated 2 weeks ago. PE: lethargic and unable to recognize family members. Temp 99.2 °F, BP 160/86 mm Hg, pulse 68/min, and respiration rate is 14/min. BMI is 20. Cardiac and pulmonary examinations are normal. Neurologic examination shows no focal deficits. There is no edema, ascites, or evidence of hypovolemia. Laboratory studies are consistent with hypotonic hyponatremia; her serum sodium level is 110 meq/L (110 mmol/L). Therapy with 3% saline is initiated, and her mentation rapidly improves to baseline. Labs are repeated 10 hours after admission. What is the next step in management?

A: 5% dextrose in water. This patient has hypotonic hyponatremia associated with altered mentation, which typically warrants prompt correction with 3% saline. However, the increase in her serum sodium level following treatment exceeds the recommended initial target of 4 to 6 meq/L (4-6 mmol/L) over the first 24 hours. The high urine volume and decreasing urine osmolality following hypertonic saline administration reflect a rapid water diuresis and suggest that the serum sodium level will likely continue to increase, placing the patient at increased risk for osmotic demyelination syndrome (ODS). Therefore, hypotonic solutions such as 5% dextrose in water should be administered with close follow-up of the serum sodium level, with the goal of maintaining the serum sodium level in the range of 114 to 116 meq/L (114-116 mmol/L) in the first 24 hours.

Labs 10 hrs after admission:
Na 121
Urine Na 48
Urine Osm 206
Urine Output: 400mL since admission

PMID: 19721422

OLYMPICS OPENING CEREMONY
Friday, February 19th
Noon in MSB 5051

Boards!!!
If you plan to take ABIM exam this year, you must register by Monday, February 15th to avoid a large ($400!) late fee.
**Weekend to-do!: Singles Awareness Day Edition**


Feb. 12: **Krohn by Candlelight: Valentine’s Weekend**, 5:30-7:30 p.m., Krohn Conservatory, 1501 Eden Park Drive, Eden Park. Make flower bouquet for special someone and learn about chocolate. Also includes drink ticket, live music and tour of spring show. Reservations required.


**TRIVIA**

In 1832 Edinburgh, Scotland, Dr. Thomas Latta took “warm water, holding in solution the requisite salts,” and slowly injected six pints in 30 minutes into “an aged female, on whom all the usual remedies had been fully tried.” While Latta lost this first patient, his second patient recovered within two days of a similar injection. This first recorded use of saline in humans was meant to cure what?

**SHOUT OUTS!!!**

-to **Jason Hildebrandt** for helping out with consults on a busy day.

-to **Erin Connolly** for “working like a butterfly” (appearing graceful while working her head off)

-to **Rob Stanton** for keeping it together post-nights under the duress of difficult bedside presentations.

-to **Brad Abraham** and **Cassie Grimsley-Ackerley** for tailoring a great case to intern and senior noon report today. Watch that hand sanitizer, everyone!