

Evidence Based Practice Intake Protocols in a Pediatric Urgent Care Setting

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Objective

- To reduce variability in care and outcomes in five frequently experienced pediatric presentations to an urgent care.
- To establish Intake protocols based on Evidence Based Practices utilizing primarily Lexicomp and Mosby to guide standardized practice.

EBP Process

The model used for this EBP is the conceptual model for translating evidence into clinical practice. This model allows the nursing staff to assess the need for change, connect the problem with interventions and projected outcomes, create the best evidence, design the change to put into practice, implement and evaluate the practice, and integrate and maintain practice change for continuous improvement. The approved Intake protocols are mounted in the Intake room for quick reference (LEAN visual management tool) whereby the nurse may follow the anticipated plan. The use of protocols is intended to reduce variability of care, timeliness and outcomes.

LEAN

There is a dearth of pediatric urgent care intake evidence based practice (EBP) protocols. In a busy urgent care setting, with multiple nurses and physicians working within the interdisciplinary team to expedite definitive diagnosis and accelerated safe, quality and effective care, EBPs serve as a valuable tool to standardize care and avoid variances. Pairing EBP protocols with LEAN tools is complimentary and effective. Lean manufacturing is a management philosophy derived mostly from the Toyota Production System (TPS) and identified as "Lean" only in the 1990s. TPS is renowned for its focus on reduction of the original Toyota seven wastes to improve overall customer value. Lean manufacturing is a variation on the theme of efficiency based on optimizing flow. In healthcare, lean means focusing on the patient as the primary customer. A heightened patient focus means implementing new lean methods for ensuring patient safety and quality of care, such as visual management tools to error proof care while driving best patient outcomes.

Respiratory Distress

Oxygen\Misty mask

Cardiac \CO2 monitor

Saline lock\CUROS

Medication as ordered per MD

Transfer\SBAR

Crash cart (available)

Albuterol - X 3 2.5 mg >10 -20 kg - 1.25 mg < 5 -10 kg

Atrovent - X 3 Every 20 minutes 500 mcg >10 Kg -- 250 mcg < 10 Kg

Solumedrol - 2mg /kg IM/IV

Orapred - 2 mg/kg x 1 (max: 60 mg/day).

(max:80 mg/day adolescent)

Epinephrine - 0.01 mL/kg of 1:1000 dilution

Maximum single dose, (0.3 – 0.5 mL of 1:1000 dilution).



Croup

Medication as ordered per MD

Decadron - Oral/ IM/IV: 0.6 mg/kg once (maximum: 16-20 mg). A single dose of 0.15 mg/kg has also been shown effective

Orapred - 2 mg/kg x 1 (max: 60 mg/day) / (max: 80 mg/day adolescent)

Epinephrine Racemic Inhalation 1:1000

0-20 kg: 0.25 mL in 3 mL with normal saline administered by nebulizer

20-40 kg: 0.50 mL in 3 mL with normal saline administered by nebulizer

Note: Can give 2nd dose after 2-4 hours.

NOTE: Keep patient Calm



Seizures

Oxygen Nonrebreather Mask 10 – 15 L

Cardiac Monitor

Suction machine

Saline lock\CUROS

Seizure precautions

Medication as ordered per MD

Obtain Pt's Medical History

Crash cart (available)

Transfer\SBAR

Diazepam - Diastat

Rectal: 0.5 mg Kg dose may repeat Q 15 Minutes. Maximum of 20 mg total

Note: Transfer (Lifeflight or 911)



Anaphylaxis

Saline lock\CUROS

Cardiac monitor

Ambu Bag Transfer\SBAR

Medications as ordered per MD

Obtain Pt's Medical History

Crash cart (Available)

EPINEPHRINE - Subcutaneous (SC): use filter needle

10 µg/kg per dose (maximum 3 doses)

0.01 mL/kg of 1:1000 dilution – max dose: 0.3 -0.5 mg/dose

ZANTAC - Dose: 5-10 mg/kg/day PO --- 2-4 mg/kg/day IM/IV

BENADRYL - 1-2 mg/kg PO/IM/IV q6h prn; Max: 50 mg/dose

SOLUMEDROL - 2 mg /kg IM/IV



Head Injury

LOC + EMESIS + ATAXIA

Trauma alert

Saline lock\CUROS

Cardiac monitor

Crash cart (Available)

Transfer (Lifeflight or 911)

Transfer\SBAR

Note: C-Spine and backboard stabilization if traumatic injury.

EMESIS + -- LOC –

Observation for 4 hours

NPO



Source: Mosby's Drug Guide – Lexicomp - Epocrates - MICROMEDEX Drug Information

SBAR

SBAR is a structured communication technique designed to convey a great deal of information in a succinct and brief manner. This is important for patient safety, as well all have different styles of communication-varying by culture, profession, and gender.

Situation

Background

Assessment

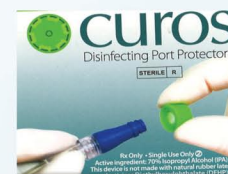
Recommendation

<p>Situation What is going on with the patient right now? Identify yourself, clarify the patient, state the problem concisely.</p>	<p>Background What is the clinical background on this patient? How did we get to this point? Review the chart, anticipate questions, state the relevant medical issues.</p>
<p>Assessment What do I think the problem is? Why am I concerned? Provide your observations and evaluation of the patient's current care.</p>	<p>Recommendation What should we do to respond to the situation? Support what you are doing to meet the patient's immediate needs, summarize your understanding of the data, track orders needed.</p>

Curos

The Curos is intended for use on swabbable luer access valves as a disinfecting cleaner prior

to line access and to act as a physical barrier to contamination between line accesses. Curos will disinfect the valve three (3) minutes after application and act as a physical barrier to contamination for up to seven (7) days (168 hours) if not removed. The effectiveness of Curos protectors were tested in vitro against Staphylococcus aureus, Staphylococcus epidermis, Escherichia coli and Pseudomonas aeruginosa, Candida glabrata, Candida albicans and was found to have >4 log reduction. The Curos Disinfecting Port Protector may be used in the home or healthcare facility.



Conclusion

The protocols developed were found to be useful clinical guidelines aimed at guiding the nurse, based on presenting complaint, to initiate treatment in a timely and uniform way. These protocols eliminated variances in practice and facilitated optimal patient care outcomes. The protocols developed had the principles of EBP applied during their construction, 1) included the highest quality evidence and most current data relative to therapy for presentation, 2) dosage, type, route of medication to be administered, 3) equipment resources required to complete the optimal intervention, 4) anticipated transfer to higher level of care to reduce delays in the continuum of care from one setting to another. Standardized care is intended to raise quality of care to reduce variations and risk aversion and to achieve the best balance for effective outcomes to be achieved.