



- 2033 – Determination of Death

- Dylan Hurley – Metro Fire

- We have had a discussion on this in the past to make it more of a flow chart/decision tree instead of a list of definitions. Can keep a list of definitions, but add the chart. I had submitted one in the past as an example.

- **SCEMSA – This can be considered for a flow chart in the future.**

- 5050 – Destination

- Adam Blitz – Metro Fire

- Middle of Page 5 still states:
  - F. It is the responsibility of the provider to QI 100% of ALL calls where it is determined by the paramedic that the patient is stable for the ED waiting room per this policy with a monthly summary report to SCEMSA.
  - An email circulated December 2025 with SCEMSA staff stating this is no longer required. It should be removed if that is true.

- **SCEMSA- Agreed. Pull this language.**

- 5053 – Trauma Triage Criteria

- Dylan Hurley – Metro Fire

- Taser deployments are penetrating trauma, and often occur on the torso or proximal to the elbow or knee.
- Can the barbs be removed on scene? Other counties have protocols discussing the removal.
- Do not activate hangings as a trauma alert routinely.
- Mechanism of Injury >12 hours old should NOT routinely be activated unless meeting anatomic or physiologic criteria

- **SCEMSA – Taser deployments are not classified as GSWs. Other LEMSAs allow for removal only if they interfere with the airway or impede safe transport. They are not trauma activations. These patients should be seen in the ED to ensure no other injuries. Hangings are not activated as trauma. Rely on paramedic judgment here – base contact is also an option.**

- Dr. Kevin Mackey – Sacramento City Fire

- 1. Burn patients: There is a section in our trauma triage policy that says:



- Critical Trauma Patients who do not meet physiological criteria with the following conditions will be transported to UCDMC:- Traumatic amputations proximal to the wrist and/ or the ankle- Traumatic burns > 9% Total Body Surface Area- Chemical or Electrical Burns- Evidence of possible inhalation injury- Any Burn to the face, hands, feet, genitalia, perineum or major joints
- When SFD medics call in a burn patient as a "trauma alert", the UCD team sometimes confuses this as a trauma patient, not a burn patient, which is leading to a lot of questions and some unsolicited advice from well-meaning RNs.
- Question: do you feel that this policy needs adjustment? Or re-education via Jeremy to his team? Or a separate "Burn" alert? Example: "UC Davis, this is Medic 10 with a code 3 Trauma burn alert"? Open to all but perhaps the easiest is the verbiage "Burn Alert" assuming patient does not meet the trauma criteria.

• **SCEMSA – Discussion at MAC. Open to 'Burn Alert' language.**

## • 8015 – Trauma

- Dylan Hurley – Metro Fire
  - Add temperature control mention to the protocol
  - Blanket, warm ambulance cab, etc.
- **SCEMSA – Reasonable. Add BLS provider language to cover patient with blanket.**

## • 8024 – Cardiac Dysrhythmias

- Dylan Hurley – Metro Fire
  - Ex. Patient presents with non-perfusing bigeminal PVCs, whose palpated rate was in the 30's but the monitor showed a rate in the 60's, with signs of hypotension.
  - Add language to clarify electrical heart rate vs mechanical capture.
  - Amiodarone for stable wide-complex tachycardia post three cardioversions states "150mg IV/IO over 10 minutes."
  - Change language to "150mg in 100cc NS/D5W over 10 minutes IV/IO"
    - Clarifies if we push it or infuse it, and in how much fluid
- **SCEMSA – Reasonable language to clarify medication preparation and administration.**



- Adam Blitz – Metro Fire
    - I realize the flowsheets for Bradycardia and Tachycardia are derived from ACLS.
    - But I have reviewed cases where clinicians wish there was a middle band between the stable vagal/adenosine patient and the severe Straight to electricity side of the page.
  
  - We occasionally meet patients who are warm, pink, dry, fully oriented, but hypotensive and with minor chest discomfort.
  - The middle polygon at the top of the tachy page states"
  - Persistent Tachycardia Causing:
    - Hypotension
    - Acutely altered mental status
    - Signs of shock
    - Ischemic chest discomfort
    - Acute heart failure
  
  - ...but doesn't say, must have 1, or 2, or all, or some... so I have seen a hypotensive patient (like the one mentioned above) receive a vagal because they appeared well enough that electricity seemed too drastic.
  - I suggest adding more inclusive language to the blue All Tachycardia Patients at the top, similar to the Brady page that states who the protocol applies to, or else in the polygon itself.
  - **SCEMSA- Flow charts may address this. Regarding indications for cardioversion – any of those listed (including 1) would meet definition for cardioversion.**
- 
- **8031 – Non-Traumatic Cardiac Arrest**
    - Dylan Hurley – Metro Fire
      - CONSIDERATION IN PREGNANCY > 20 WEEKS GESTATION
        - Place patient 25 deg left lateral on the backboard for CPR
        - IV/IO should be above the diaphragm
        - Pregnant patients are more prone to hypoxia
        - Consider early Advanced Airway i-gel® or ET Intubation
        - Prepare for early transport after 4 minutes of CPR
    - **SCEMSA – This is Yolo language. OK to adopt.**



- **8032 – Traumatic Arrest**

- Dylan Hurley – Metro Fire

- "Patients with trauma in cardiac arrest who, by prehospital presentation, may have suffered a medical event before trauma shall undergo medical cardiac arrest resuscitation per Policy# 8031 - Cardiac Arrest, with attention and appropriate management to emergent trauma needs (hemorrhage control, pneumothorax decompression as indicated, and orthopedic immobilization as indicated)"
    - If EMS is suspecting medical cause for the arrest but the patient has injuries, should the patient be transported to the closest facility or trauma center?
    - **SCEMSA- These patients are best managed at a Trauma Center. Transport times to local Trauma Centers are short.**

- **8062 – Behavioral Crisis/Restraint**

- Dylan Hurley – Metro Fire

- 1. Ensure EMS provider safety.
    - ADD
    - Fire and EMS personnel should not enter, remain in, or engage in any direct contact with individuals at a violent or potentially violent scene without law enforcement presence.
    - a) Personnel may take appropriate and reasonable action to establish scene safety (e.g.: Ask the person to meet responders outside, create barriers between responders and the patient(s).)
    - 5. c) Handcuffs may only be applied by law enforcement personnel. Prior to transport, handcuffs should be replaced with commercial restraint devices appropriate for use by prehospital providers.
    - ADD
    - i. In the event that this is not possible, restraint devices applied by law enforcement require the officer's continued presence to ensure patient and scene management safety. The officer should accompany the patient in the ambulance.
    - ii. Patients in custody/arrest remain the responsibility of law enforcement.



- iii. Patients under arrest can refuse treatment, but not transport.
- **SCEMSA** – This is all covered in the memo that we put in place last year. This policy was heavily vetted by County Counsel.
- Adam Blitz – Metro Fire
  - When is this is appropriate in the absence of the person being placed on a hold or legally detained?
  - I think there should be something in there from the medical director that helps define when physical or chemical restraint is warranted.
  - -B13
- **SCEMSA** – This language is present under ALS. SCEMSA will not put an absolute definition to this. It is impossible to write a policy that will cover all possible situations.
- **8066 - Pain Management**
  - Dylan Hurley – Metro Fire
    - See at bottom of document.
  - **SCEMSA**- See below
- **Drug Reference Guide –**
  - Dr. Kevin Mackey – Sacramento City Fire
    - (page 16) state that Ketorolac dosing should be reduced by 50% in patients over 65 years old due to age-related renal concerns. However, the Pain Management Protocol (8066.11) lists Ketorolac as contraindicated in patients younger than 4 years old and over 65 years old.
    - This conflicting guidance can understandably cause confusion in the field. If possible, removing the option for reduced dosing in patients over 65 from the drug reference (page 16) may help maintain consistency with the pain management protocol and reduce uncertainty during medication administration.
  - **SCEMSA** – All drug reference guide entries will need to be reviewed for correctness and to determine if other contradictions exist. Often, the drug reference includes information that is relevant to the ED and not the pre-hospital setting. Agree with removal of 'The dose of Ketorolac should be reduced by 50% in patients > 65 years or age due to concern for age-related reduction in renal function.'



- Dylan Hurley-Pain Management

I think removing the pain management contraindications to implant them in the Drug Reference Guidelines will make it more complicated and confusing for Paramedics in the county. If Paramedics are reviewing the protocol or verifying that the patient does not meet any contraindications, they want to easily find it in the protocol and not go look for it in a 25-page document. Also, on the suggested update, there is no language stating to reference the Drug Reference Guidelines for contraindications. Paramedics will assume that since none are stated, there are no contraindications for pain medications. Instead, a list of contraindications should be added to the bottom of the protocol for easy review.

### **Acetaminophen**

≥ 10 kg is one of the indications listed on the updated pain management policy.

One of the contraindications listed on the Medication Guide is patients under four (4) years of age.

1-3 year olds can be over 10kg per IDBW.

**REMOVE patients under four (4) years or age from Drug Reference.**

Questions on new contraindications:

Malnutrition is a new contraindication. What is the EMS criteria/judgement for malnutrition?

**REMOVE malnutrition from contraindications.**

### **Toradol**

New contraindications are on the drug reference guidelines compared to the pain management guidelines.

Contraindications removed from old protocol:

Age < 4 years old or > 65 years old (Just talks about a reduction of 50%, but that is not available in the protocol)

Current Anticoagulation Therapy

Suspected Sepsis or Septic Shock.



ADDRESSED ABOVE.

Questions on Drug Reference Guide Contraindications

Hypovolemia- How do we check for that? Hypotension? **Clinical judgement of severe dehydration.**

"The dose of Ketorolac should be reduced by 50% in patients > 65 years of age due to concern for age-related reduction of renal function." This is not listed in the protocol to do.

Asthma- Is it someone with any history of Asthma at any point, or someone experiencing active wheezing/shortness of breath?

**Contraindicated in asthma. Age dose reductions removed.**

## **Fentanyl**

New contraindications are on the drug reference guidelines compared to the pain management guidelines.

Contraindications removed from old protocol:

SBP >90

RR <10

**These were not removed – they are being moved to the drug reference guide.**

Questions on Drug Reference Guide Contraindications

Head injury with increased ICP: What is the EMS criteria for determining increased ICP? All head injuries? Pupil changes? Blood pressure changes?

**This is dealt with in the note section – decreased sensorium language.**

Why is hypotension not included in the Drug Reference Guide as a contraindication?

Why is bradypnea or hypoventilation not included as a contraindication in the Drug Reference Guidelines?

**Hypotension, decreased RR can be added to Drug Reference Guide.**



## **Ketamine**

The only contraindications in the previous Pain Management Protocol were chest pain of cardiac origin and pregnancy. Now there is a broader contraindication stating be mindful of increasing blood pressure, ICP, and intraocular pressure.

Contraindications removed from old protocol:

Pregnancy

Cardiac chest pain

**These are listed as should be avoided.**

Questions on Drug Reference Guide Contraindications:

Is Ketamine in pregnancy now allowed?

“Carefully evaluate patients with ocular trauma or space-occupying lesions (i.e., brain neoplasms) prior to administration of ketamine.”: What is EMS evaluating for to determine if Ketamine is safe?

“Ketamine is contraindicated in patients in whom a significant elevation of blood pressure would constitute a serious hazard, such as those patients with hypertension, stroke, head trauma, or intracranial mass or intracranial bleeding.”: Is this a history of these conditions or conditions that are currently affecting the patient?

**Ketamine is not allowed in pregnancy.**

Example contraindication list for the bottom of the Protocol:

1. Acetaminophen should be avoided in the following patients:

- Active liver disease (such as cirrhosis or severe alcoholic hepatitis).

2. Fentanyl/Morphine should be avoided in the following patients:

- Systolic blood pressure (SBP) is <90 mmHg.
- Respiratory rate (RR) is  $\leq$  10 breaths per minute.
- Decreased sensorium or suspicion of traumatic brain injury.



3. Ketorolac should be avoided in the following patients:

- Active bleeding.
- Active wheezing.
- Age < 4 years old or > 65 years old.
- Allergy to Non-Steroidal Anti-inflammatory agents (NSAIDs).
- Current Anticoagulation therapy.
- Head or Multisystem trauma.
- History of peptic ulcer disease of upper GI bleeding.
- History of renal disease or kidney transplant.
- Known or suspected pregnancy.
- Suspected Sepsis or Septic Shock.

4. Ketamine should be avoided in the following patients:

- Chest pain of suspected cardiac origin.
- Pregnancy.