# Alameda County, CA EMS Behavioral Health Emergency Procedure Guidelines:

Modified On: May 10, 2019

#### **PSYCHIATRIC AND BEHAVIORAL EMERGENCIES** Cognitive Impairment/ **Behavioral Crisis Excited Delirium Developmental Disability** ▶ Paranoia ► Aural/Visual hallucinations Alzheimer's disease ▶ Disorientation ▶ Anxiety Dementia ► Depression ► Extremely aggressive or violent Autism ► Manic behavior Tachycardia ▶ Down Syndrome ► Increased strength ► Suicidal ideation ► Intellectual disability ► Disorganized thoughts ▶ Hyperthermia ▶ Developmental delays ► Clear danger to self/others Unpredictable behavior ▶ Traumatic Brain Injury Attempt to determine triggering Calm/ event Cooperative? Assessment Involve caregivers Consider potential medical (unless they are the trigger) causes Consider ECG monitoring/12-lead ECG Determine level of language and Olanzapine (pg. 126) communication ability administration (pg.135) ETCO2 monitoring Full medical assessment Assess for Hyperthermia (pg. 15) Utilize simple language, be mindful of vocal tone and body Attempt de-escalation language (if possible) Consider Restraints (pg. 112) Calm/ Consider Sedation Cooperative? (pg. 138) Treatment IV access/consider fluid bolus Consider Restraints Attempt de-escalation (pg. 112) (if possible) Consider Sedation (pg. 138) Consider Restraints (pg. 112) Consider Sedation (pg. 138) If transport is necessary, transport to the closest, most Transport to closest, most appropriate receiving hospital Transport to the closest, most appropriate psychiatric facility or (pg. 23) appropriate receiving hospital receiving hospital per transport (pg.23) policy (pg. 23 & pg.136) \*If possible, allow caregiver to accompany the patient

**Procedures** 

### **PSYCHIATRIC EVALUATION - 5150 TRANSPORTS**

GENERAL INFORMATION: Any patient who has been, or will be (e.g. - self-committal) placed on a 5150 hold for psychiatric
evaluation shall be assessed and transported according to this policy. For minors (age below 18) the hold is called a 5585 hold
and is similar to 5150 hold

### 2. MEDICAL CLEARANCE CRITERIA:

2.1 Age 65 and Above: Patients with or without acute medical issues, should be transported to the closest most appropriate receiving hospital for evaluation

### 2.2 Age 12 to 64:

- 2.2.1 Transport patients to a closest most appropriate receiving hospital\* if there is a suspected acute medical or traumatic condition requiring emergent or urgent attention in an Emergency Department. Patients with these conditions include:
  - → Patients "in extremis" (those with a potential life-threatening illness or injury)
  - → Patients who are unconscious, unresponsive, have chest or abdominal pain, significant bleeding, or suspected shock
  - → Patients who shows signs of potential significant toxicity from illicit drugs or alcohol, which may include the following findings:
    - ► depressed mental status
    - ▶ inability to ambulate
    - ▶ diaphoresis, agitation
  - → Patients with combative behavior who require field sedation with Midazolam or whose combativeness prevents assessment (vital signs or examination)
  - → Patients with abnormal vital signs or findings:
    - ▶ Systolic blood pressure over 190 mmHg or diastolic blood pressure over 110 mm/Hg
    - ► Pulse rate sustained over 120
    - ► Blood glucose under 60 mg/dL or over 250 mg/dL
  - → Patients with a suspected overdose of medication
- 2.2.2 Adult patients on 5150 who do not meet medical clearance criteria (see 2.1 and 2.2) should be transported to John George Pavilion, San Leandro. These include:
  - → Patients with history of use of drugs or alcohol who do not show signs of significant toxicity.
  - → Patients with abnormalities in vital signs, but without other significant physical findings or history suggesting an acute medical problem (systolic BP up to 190, diastolic BP up to 110 and pulse up to 120)
  - → Patients with minor abrasions or contusions (not needing laceration repair or other complex care or evaluation)
  - → Patients who otherwise appear healthy but have communication barriers due to language or developmental disability, or are unwilling to answer questions

### 2.3 Adolescents Age 12 to 17

- 2.3.1 Criteria for transport to the closest most appropriate receiving hospital for medical clearance listed above (2.2.1) for adults also apply to adolescent patients on 5585 (5150) holds
- 2.3.2 Additionally, adolescent patients with the following findings should also be transported to receiving hospitals:
  - → Patients who have been outside of adult supervision/control for more than 24 hours
  - → Patients with recent vomiting over a prolonged period or who report no food or fluid intake for 16 hours or more
  - → Patients with known severe chronic medical conditions
- 2.3.3 Adolescent patients who do not meet medical clearance criteria (see 2.2) should be transported to Willow Rock Center, San Leandro. Notify Willow Rock en route (510) 895-5502

## 2.4 Children Age 11 and Under

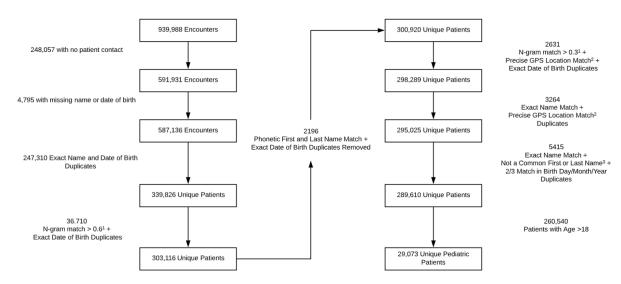
→ All children age 11 and under on a 5585 (5150) hold should be transported to Children's Hospital Oakland unless there is a need to divert to another hospital because of medical instability

NOTE: Additional considerations for most appropriate facility are listed in the Transport Guidelines and Abuse/Assault Policies

# **Encounter Characteristics**

	IVH	Non-IVH	Absolute	All Encounters
	Encounters	Encounters	difference	(Never Held
	N=7,670	N=1,699		Patients)
				N=28,872
Age, IQR	15.1 (13.6 -	15.7 (14.2-16.9)	-	9.2 (2.6 - 15.2)
	16.6)			
Location of EMS Pick-				
up				
School	1,806 (23.5%)	239 (14.1%)	9.5% (7.6% to	2,689
			11.4%)	
Home	3,371 (43.9%)	793 (46.7%)	-2.7% (-5.3% to -	14,190
			0.1%)	
Other	2,493 (32.5%)	667 (39.3%)	-6.8% (-9.3% to -	11,993
			4.2%)	
Clinical Information				
Alcohol	138 (1.8%)	59 (3.5%)	-1.7% (-2.6% to -	252 (0.9%)
			0.8%)	
Trauma**	489 (6.4%)	444 (26.1%)	-19.8% (-21.9% to -	9062 (31.4%)
			17.6%)	
Seizure**	88 (1.2%)	222 (13.1%)	-11.9% (-13.5% to -	5182 (18.0%)
			10.3%)	
Overdose/Poisoning**	469 (6.1%)	238 (14.0%)	-7.9% (-9.6% to -	975 (3.4%)
			6.2%)	
Mortality				
30 Day	0	1		105 (0.4%)
30 - 60 Days	0	1		3
60 - 90 Day	1	0		3
90 to 365	2	3		49

# 7-cycle matching strategy using the MATCHIT tool



- 1) Two records were considered to be from the same patient if both records shared a birthdate and had full names that met a specific cuttoff of similarity using the N-gram3 method. The N-gram3 method provides a way to algorithmically quantify the similarity exhibited by two strings. The cut-offs were very stringent; see Supplementary Table 1 for examples demonstrating the application of n-gram criteria.
- 2) Records were considered to have a location match if the two records had GPS coordinates that were within 0.005 degrees (lattitude and longitude). Not all records had the opportunity to be matched this way because 18.8% (N=110.444) of records were missing GPS coordinates.
- 3) The top 100 most frequently occurring first and last names were considered common. We made the assumption that if the first and last name were not common and the exact full names matched, the date of birth could be allowed to have one error (in either day, month, or year). See Supplementary Table 2 for the 100 first and last names that were considered common.