

To: ALL VENTURA COUNTY EMS POLICY MANUAL HOLDERS

DATE: July 1, 2026

CHANGES MADE TO PROCEDURES AND/OR TREATMENTS

| Policy # | Title/New Title | Notes |
|----------|-----------------------------|--|
| 310 | Paramedic Scope of Practice | <ul style="list-style-type: none"> Added PVAD language to Scope of Practice, the PVAD policy predates the addition of IO for Adults and should only be accessed in emergent conditions where an IV/IO cannot be obtained Dialysis fistulas are no longer approved for access |
| 614 | Spinal Motion Restriction | <ul style="list-style-type: none"> Simplified cervical collar application indications Brought Special Consideration sections higher up in the policy and better defined what to consider |
| 705.05 | Bites and Stings | <ul style="list-style-type: none"> Moved the monitor for allergic reaction and anaphylaxis language to BLS Procedures Remove Do Not heat for jellyfish stings |
| 705.08 | Cardiac Arrest – VF/VT | <ul style="list-style-type: none"> Training will be addressed in CAM Course Anterior/Posterior preferred initial pad placement Added Vector change & Double Sequential Defibrillation for refractory VF/VT Formatting changes PRESTO has been removed |
| 705.12 | Heat Emergencies | <ul style="list-style-type: none"> Added Immersive Cooling (if available) and parameters for use Added Additional Information section Formatting changes |
| 705.20 | Seizures | <ul style="list-style-type: none"> Changes to Eclampsia Treatment <ul style="list-style-type: none"> Magnesium Sulfate is PRIMARY medication for Eclampsia treatment with active or resolved seizure activity Changed timeframe to six weeks postpartum (rare after 48 hours post-delivery) Removed IO as a route for administration IV dosing change to 20 minutes Added IM Dosing |

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| 710 | Airway Management | <ul style="list-style-type: none">• Incorporated Supraglottic Airway Device, and included language that the SGA may be the primary device if appropriate for the patient• Added language for Accredited EMTs (this will be a future allowance only when the approved training has been completed)• Defined patients for airway management• Removed step by step process• Formatting changes |
| 733 | Cardiac Arrest Management (CAM) and Post Arrest (ROSC) Resuscitation | <ul style="list-style-type: none">• Training will be addressed in CAM Course• Defined BLS and ALS Goals of Care• Anterior/Posterior preferred initial pad placement• Added Vector change & Double Sequential Defibrillation for refractory VF/VT• Added integration of LUCAS Device• PRESTO has been removed |
| 735 | Push Dose Epinephrine | <ul style="list-style-type: none">• Added 1 mg/mL Epinephrine as an option to make push dose concentration |
| 1201 | Air Unit Staffing Requirements | <ul style="list-style-type: none">• Changes to training requirements for air unit personnel• Changes to regulatory authorities• Changes to terminology to better align with current standards and practice• Formatting changes |

MINOR CHANGES

| Policy # | Title/New Title | Notes |
|-------------|---|--|
| 300 | EMT Scope of Practice | <ul style="list-style-type: none"> Updated authorities to match California Code of Regulations Formatting changes |
| 301 | EMT Initial Certification | <ul style="list-style-type: none"> Updated authorities to match California Code of Regulations Removed Reinstatement language (duplicative from Policy 302 language) Formatting changes |
| 302 | EMT Renewal and Reinstatement | <ul style="list-style-type: none"> Changes made live February 20, 2026 Better defined requirements for Live Scan Updated authorities to match California Code of Regulations Formatting changes |
| 303 | EMT Optional Skills | <ul style="list-style-type: none"> Updated authorities to match California Code of Regulations Formatting changes |
| 303-B | EMT Optional Skills Plan | <ul style="list-style-type: none"> Updated authorities to match California Code of Regulations Formatting changes |
| 304 | EMT Course Completion by Challenge Examination | <ul style="list-style-type: none"> Updated authorities to match California Code of Regulations Formatting changes |
| 305 | EMT Accreditation | <ul style="list-style-type: none"> Updated authorities to match California Code of Regulations Formatting changes |
| 451 | Stroke Triage and Destination | <ul style="list-style-type: none"> Updated authorities to match California Code of Regulations Formatting changes |
| 504 | BLS and ALS Equipment and Supplies | <ul style="list-style-type: none"> Changed the required amount for Buprenorphine on FRALS to "Optional" Increased the minimum for Magnesium Sulfate to 10 g |
| 504 | Waiver Request | <ul style="list-style-type: none"> Removed Fax option and updated email address for VCEMS |
| <u>2607</u> | Hazardous Material Incident | <ul style="list-style-type: none"> Renumbered Policy from 607 to 2607 Formatting changes Replace HIRT with HAZMAT Removed Medical Director and replaced with Agency Policy for when follow-up monitoring is deemed necessary |
| 705.07 | Cardiac Arrest – Asystole/Pulseless Electrical Activity (PEA) | <ul style="list-style-type: none"> Training will be addressed in CAM Course Formatting changes PRESTO has been removed |

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| 803 | EMT AED Service Provider Program Standards | <ul style="list-style-type: none">• Updated authorities to match California Code of Regulations• Formatting changes |
| 1200 | Air Unit Program | <ul style="list-style-type: none">• Formatting and language changes to match current terminology and regulations |
| 1202 | Helicopter Dispatch for Emergency Medical Responses | <ul style="list-style-type: none">• Formatting and language changes to match current terminology and regulations |
| 1203 | Criteria for Air Transport | <ul style="list-style-type: none">• Formatting and language changes to match current terminology and regulations |
| 1205 | Air Unit Specifications, Equipment and Supplies | <ul style="list-style-type: none">• Formatting and language changes to match current terminology and regulations |

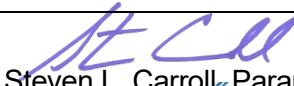

NO CHANGES

| Policy # | Title/New Title | Notes |
|----------|--|--|
| 627 | Fireline Medic | <ul style="list-style-type: none">No changes |
| 705.26 | Suspected Stroke | <ul style="list-style-type: none">No changes |
| 724 | Brief Resolved Unexplained Event (BRUE) | <ul style="list-style-type: none">No changes |
| 1301 | Lay Rescuer Automated External Defibrillation (AED) Service Provider Standards | <ul style="list-style-type: none">No changes |

Policy(ies) Suspended / Retired

| Policy # | Title/New Title | Notes |
|----------|--|---|
| 716 | Use of Pre-existing Vascular Device (PVAD)- RETIRED | <ul style="list-style-type: none">This Policy was absorbed into the Paramedic Scope of Practice for what is allowed for PVAD access |
| 729 | Supraglottic Airway Devices- RETIRED | <ul style="list-style-type: none">This policy's content was moved to 710 Airway Management to incorporate the concepts into 1 policy instead of spread out over 2 policies |
| 1204 | EMS Aircraft Classification- RETIRED | <ul style="list-style-type: none">There is only 1 classification of aircraft currently authorized in Ventura County, so this policy is not necessary.Policy information was duplicative to Policy 1200 |

CHANGES MADE TO PROCEDURES AND/OR TREATMENTS

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|--|---|---|--|
| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Paramedic Scope of Practice | | Policy Number: 310 | |
| APPROVED: Administration: |  Steven L. Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director: |  Daniel Shepherd, M.D. | Date: July 1, 2026 | |
| Origination Date: | May, 1984 | Effective Date: July 1, 2026 | |
| Date Revised: | April 9, 2026 | | |
| Date Last Reviewed: | April 9, 2026 | | |

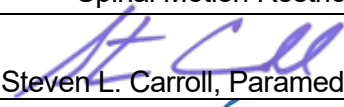

- I. PURPOSE: To define the scope of practice of a Paramedic accredited and practicing in Ventura County.
- II. AUTHORITY: Health and Safety Code Section 1797.172 and 1797.185. California Code of Regulations, Division 9, Chapter 3.3, Sections 100091.01, 100091.02 and 100091.03.
- III. POLICY:
 - A. The medical director of the LEMSA may develop policies and procedures or establish standing orders allowing the paramedic to initiate any paramedic activity in the approved scope of practice without voice contact for medical direction from a physician, or mobile intensive care nurse (MICN), provided that an EMSQIP is in place.
 - B. An accredited/accrediting paramedic may perform any activity identified in Ventura County Policy 300: Emergency Medical Technician Scope of Practice, without requiring a separate certification.
 - C. A licensed paramedic shall be affiliated with an approved paramedic service provider in order to perform the scope of practice specified in this policy.
 - D. A paramedic student or a licensed paramedic, as part of an organized EMS system, while caring for patients in a hospital as part of his/her training or continuing education (CE) under the direct supervision of a physician, registered nurse, or physician assistant, or while at the scene of a medical emergency or during transport, or during interfacility transfer, may perform the following procedures or administer the following medications when such are approved by the medical director of the LEMSA and are included in the written policies and procedures of the LEMSA.
 - E. Basic Scope of Practice:
 1. Utilize electrocardiographic devices and monitor electrocardiograms, including 12-lead electrocardiograms (ECG).
 2. Perform defibrillation, synchronized cardioversion, and external cardiac pacing.

3. Visualize the airway by use of the laryngoscope and remove foreign body(ies) with Magill forceps.
4. Perform pulmonary ventilation by use of lower airway multi-lumen adjuncts, the esophageal airway, perilaryngeal airways, stomal intubation, adult oral endotracheal intubation, and pediatric oral endotracheal intubation for patients who are longer than the standard pediatric length-based tape.
5. Utilize mechanical ventilation devices for continuous positive airway pressure (CPAP)/bi-level positive airway pressure (BiPAP) and positive end expiratory pressure (PEEP) in the spontaneously breathing patient.
6. Institute intraosseous (IO) needles or catheters and institute intravenous (IV) catheters, saline locks, needles, or other cannula (IV lines), in peripheral veins.
7. Access Central Line Pre-existing Vascular Access Devices (PVAD) with emergent need for fluid and/or medications when a peripheral IV/IO site is not available. (e.g. PICC, tunneled catheters, or temporary dialysis catheters).
 - a. PVADs that require puncture of the skin are **NOT** to be accessed by paramedics. This includes any device without a visible external access port.
8. Administer IV or IO glucose solutions or isotonic balanced salt solutions, including Ringer's lactate solution.
9. Obtain venous blood samples.
10. Use laboratory devices, including point of care testing, for pre-hospital screening use to measure lab values including, but not limited to: glucose, capnometry, capnography, and carbon monoxide when appropriate authorization is obtained from State and Federal agencies, including from the Centers for Medicare and Medicaid Services pursuant to the Clinical Laboratory Improvement Amendments (CLIA).
11. Utilize Valsalva maneuver.
12. Perform needle thoracostomy.
13. Perform nasogastric and orogastric tube insertion and suction.
14. Monitor thoracostomy tubes.
15. Monitor and adjust IV solutions containing potassium, equal to or less than 40 mEq/L.
16. Administer approved medications by the following routes: IV, IO, intramuscular, subcutaneous, inhalation, transcutaneous, rectal, sublingual, endotracheal, intranasal, oral, or topical.

17. Administer, using prepackaged products when available, the following medications:
 - a. 5%, 10%, 25% and 50% dextrose
 - b. acetaminophen IV
 - c. activated charcoal
 - d. adenosine
 - e. aerosolized or nebulized beta-2 specific bronchodilators
 - f. amiodarone
 - g. aspirin
 - h. atropine sulfate
 - i. calcium chloride
 - j. diazepam
 - k. diphenhydramine hydrochloride
 - l. dopamine hydrochloride
 - m. epinephrine
 - n. fentanyl
 - o. glucagon
 - p. ipratropium bromide
 - q. lidocaine hydrochloride
 - r. lorazepam
 - s. magnesium sulfate
 - t. midazolam
 - u. morphine sulfate
 - v. naloxone hydrochloride
 - w. nitroglycerin preparations
 - x. ondansetron
 - y. pralidoxime chloride
 - z. sodium bicarbonate
 - aa. tranexamic acid
- F. Local Optional Scope of Practice (LOSOP)
1. Perform or monitor other procedure(s) or administer any other medication(s) determined to be appropriate for paramedic use by the medical director of the LEMSA, that have been approved by the Director of CalEMSA, in consultation with the Emergency Medical Services Medical Directors Association of California's (EMDAC) Scope of Practice Committee. Paramedics shall demonstrate

competency in performing these procedures and administering these medications through training and successful testing.

2. Ventura County LOSOP Approvals:
 - a. buprenorphine
 - b. blood products for 911 response
 - c. heparin IV for interfacility transports
 - d. hydroxocobalamin
 - e. nitroglycerin IV for interfacility transports

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| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Spinal Motion Restriction | | Policy Number 614 | |
| APPROVED: Administration: |  Steven L. Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director: |  Daniel Shepherd, M.D. | Date: July 1, 2026 | |
| Origination Date: | October 1992 | Effective Date: July 1, 2026 | |
| Date Revised: | December 4, 2025 | | |
| Date Last Reviewed: | December 4, 2025 | | |

- I. PURPOSE: To define the use of spinal motion restriction by field personnel in Ventura County.
- II. AUTHORITY: Health and Safety Code, Sections 1797.214, 1797.220, 1798, and 1798.200, CCR Division 9, Chapter 3.3, Sections 100106.02, 1000096.03.
- III. DEFINITION:
 - A. Spinal motion restriction: the use of cervical collars, gurneys, and other commercial devices to limit the movement of patients with potential spine injuries. **The goal of spinal motion restriction is to maintain spinal alignment and limit unwanted movement.**
- IV. POLICY:
 - A. Spinal motion restriction is a procedure that should be performed judiciously.
 - B. Spinal Motion Restriction is **not required** if:
 1. The patient is awake, alert , not under the influence of alcohol or drugs to the extent that appreciation of pain is altered, with whom you can communicate effectively, neurologically intact, who denies spine pain or tenderness, or who complains of isolated lumbar pain or tenderness but denies cervical pain or tenderness and does not have weakness, numbness, or a distracting injury.
 - C. At a minimum, a **cervical collar should be applied** to:
 1. A trauma patient who complains of neck pain.
 2. A trauma patient with a neurological deficit (e.g. numbness, weakness)
 3. A patient with known or suspected trauma with altered level of consciousness to the extent that their appreciation of pain or ability to communicate is impaired.
 4. A patient with known or suspected trauma under the influence of drugs or alcohol to the extent that appreciation of pain or ability to communicate is impaired.

5. Patients suffering from severe distracting painful injuries for whom the mechanism of injury is unknown or suspicious for spinal injury.

D. Special Considerations

1. EMS clinicians treating patients 65 and older should have a higher index of suspicion for potential spinal injury including those with a lower mechanism of injury.
2. Patient requests to forego a cervical collar shall be considered on a case-by-case basis and honored when possible. In some cases, excluding the cervical collar from spinal motion restriction efforts may aid in decreasing patient movement by improving comfort and decreasing agitation.
3. Spinal motion restriction is not specific to a cervical collar. When a cervical collar does not fit or is not tolerated, consider other methods of limiting spinal motion. Overall safety for patient positioning shall be considered.

E. Spinal Motion Restriction is **contraindicated** in:

1. Patients with isolated penetrating torso or neck injury. Transportation must be expedited. DO NOT place these patients in spinal motion restriction.

F. Patient Movement

1. Awake and alert, potentially ambulatory patients, not intoxicated, without neurologic symptoms and/or deficits, can self-extricate (after application of cervical collar if indicated).²
2. **Backboards** are a tool that may be utilized for patient movement to the gurney, then removed prior to transport. You may transport a patient on a backboard when necessary to continue patient care (e.g. unconscious patient, CPR, spinal motion restriction if needed, or stabilization of an ortho injury, such as a hip or femur).

V. PROCEDURE:

- A. Patients with or without a cervical collar should be secured to the gurney with gurney straps. Patient should then be instructed to remain as still as possible.
- B. A slide board should be used to transfer the patient to the hospital gurney
- C. In the event of simultaneous transport of more than one patient requiring spinal motion restriction, the second patient should be secured supine to the bench seat. A backboard can be used if necessary.

VI. Special Procedure for Care of Potentially Spine-Injured Football Athlete

- A. The facemask should always be removed prior to transportation, regardless of current respiratory status.

1. Tools for facemask removal include screwdriver, FM Extractor, Anvil Pruners, or ratcheting PVC pipe cutter should be readily accessible.
 2. All loop straps of the facemask should be cut and the facemask removed from the helmet, rather than being retracted.
- B. The helmet should not be removed during the prehospital care of the football athlete with a potential spinal injury, unless:
1. After a reasonable period of time, the face mask cannot be removed to gain access to the airway,
 2. The design of the helmet and chin strap is such that even after removal of the face mask, the airway cannot be controlled, or ventilation provided.
 3. The helmet and chin straps do not hold the head securely such that immobilization of the helmet does not also immobilize the head, or
 4. The helmet prevents immobilization for transport in an appropriate position.
- C. If the helmet must be removed, a neutral head position must be maintained during removal.
1. In most circumstances, it may be helpful to remove cheek padding and/or deflate the air padding prior to helmet removal.
 2. If the helmet is removed, the shoulder pads must be removed at the same time or the head padded to maintain neutral position.
- D. If needed, the front of the shoulder pads can be opened to allow access for CPR and defibrillation. They should only be removed if the helmet is removed at the same time.

VII. Pediatric patients

- A. The approach to pediatric patients is similar to that for adults. There is no need to employ spinal motion restriction based on age criteria alone.
- B. The index of suspicion for spine injury should be higher given the increased difficulty communicating with younger patients. Indications for spinal motion restriction include:
1. Complaint of neck pain
 2. Torticollis
 3. Neurologic deficit
 4. Altered mental status including GCS <15, intoxication, and other signs (agitation, apnea, hypopnea, somnolence, etc.)
 5. Involvement in a high-risk motor vehicle, high impact diving injury, or has substantial torso injury
- C. Appropriate patients can be secured to gurney in their car seat. An appropriately sized c-collar should be applied if indicated.

Bites and Stings

BLS Procedures

Animal/insect bites:

- Flush site with sterile water
- Control Bleeding
- Apply Bandage

Snake bites/envenomation:

- Mark the edge of the inflammatory process ASAP and then every 10-15 minutes
- Remove rings and constrictions
- Immobilize the affected part in a **neutral** position
- Avoid excessive activity

Bee stings:

- If present, quickly remove stinger
- Apply ice pack

Jellyfish stings:

- Rinse thoroughly with normal saline
 - **DO NOT:**
 - Rinse with fresh water
 - Rub with wet sand

All other marine animal stings:

- If present, remove barb
- Immerse in hot water if available

Monitor for allergic reaction or anaphylaxis

Administer oxygen as indicated

ALS Standing Orders

IV/IO Access

Pain Control – per Policy 705.19

Base Hospital Orders Only

Consult with ED Physician for further treatment measures

Additional Information:

- For snake bites - **ALL** Ventura County hospitals stock antivenom. Early Base Hospital Contact is encouraged in order to verify current supply capabilities at the most accessible facility.

Cardiac Arrest – VF/VT

ADULT

PEDIATRIC

BLS Procedures

Initiate Cardiac Arrest Management (CAM) Protocol per VCEMS Policy 733
Airway management per VCEMS Policy 710

Defibrillation (AP pad placement)

- q 2 minutes
- If VF/VT refractory to 3 defibrillations
 - 1 defibrillator: leave AP pads in place, put new pads on opposing vector (AL) and defibrillate using new vector
 - 2 defibrillators: place additional set of pads on opposing vector (AL) and attach to second defibrillator for Double Sequential Defibrillation (DSD)
 - DSD: defibrillate via both defibrillators sequentially (one after the other without delay)
- If recurrent VF/VT: use last successful defibrillation method and progress as appropriate

ALS Standing Orders

Manual Defibrillation settings: Lifepak 360 joules, Zoll 200 joules

IV or IO access

Epinephrine 0.1 mg/mL (Administer ASAP)

- IV/IO – 1 mg (10 mL) q 6 min
- Repeat x 2 for max of 3 doses during initial arrest
- If ROSC then re-arrest: additional 3 doses may be administered

Amiodarone

- IV/IO – 300 mg, after second defibrillation
- If VT/VF persists – 150 mg IV/IO in 3-5 minutes

Normal Saline

- IV/IO – 1 Liter bolus

Magnesium Sulfate (For Torsades de Pointes)

- IV/IO – 2 g over 2 min
- Repeat x 1 in 5 min

Treat underlying causes when identified:

Renal Failure / History of Dialysis

Calcium Chloride

- IV/IO – 1g
- Repeat x 1 in 10 min

Sodium Bicarbonate

- IV/IO – 1 mEq/kg
- Repeat 0.5 mEq/kg x 2 q 5 min

Tricyclic Antidepressant Overdose

Sodium Bicarbonate

- IV/IO – 1 mEq/kg
- Repeat 0.5 mEq/kg x 2 q 5 min

ALS Airway Management

- Ventilate by BLS measures. If indicated, initiate appropriate advanced airway procedures in accordance with VCEMS Policy 710

Manual Defibrillation settings-escalating energy: 2, 4, 6, 8 joules/kg

IV or IO access

Epinephrine 0.1 mg/mL (Administer ASAP)

- IV/IO – 0.01mg/kg (0.1 mL/kg) q 6 min
- Repeat x 2 for max of 3 doses during initial arrest.
- If ROSC then re-arrest and additional 3 doses may be administered

Amiodarone

- IV/IO – 5 mg/kg, after second defibrillation
- If VT/VF persists – repeat 5 mg/kg x 2 q 3-5 minutes

Normal Saline

- IV/IO – 20 mL/kg bolus

Magnesium Sulfate (For Torsades de Pointes)

- IV/IO – 50 mg/kg over 2 min
- Repeat x 1 in 5 min

Treat underlying causes when identified:

Renal failure / History of Dialysis

Calcium Chloride

- IV/IO – 20 mg/kg
- Repeat x 1 in 10 min

Sodium Bicarbonate

- IV/IO – 1 mEq/kg
- Repeat 0.5 mEq/kg x 2 q 5 min

Tricyclic Antidepressant Overdose

Sodium Bicarbonate

- IV/IO – 1 mEq/kg
- Repeat 0.5 mEq/kg x 2 q 5 min

ALS Airway Management

- Ventilate by BLS measures. If indicated, initiate appropriate advanced airway procedures in accordance with VCEMS Policy 710

Base Hospital Orders Only

Consult with ED Physician for further treatment measures

Additional Information:

- If sustained ROSC (>30 seconds), activate VF/VT alarm and initiate post arrest resuscitation as outlined in VCEMS Policy 733.
- For termination of resuscitation, transport decisions, and use of base hospital consult reference VCEMS Policy 733.
- If patient is hypothermic: Limit treatment to ONE round of medication and SIX defibrillations prior to Base Hospital contact. Field determination of death is discouraged in these patients and they should be transported to the most accessible receiving facility.
- Ventricular Tachycardia (VT) is a rate > 150 bpm

| Heat Emergencies | |
|---|--|
| ADULT | PEDIATRIC |
| BLS Procedures | |
| <ul style="list-style-type: none"> • Place patient in cool, shaded environment • Cooling Measures <ul style="list-style-type: none"> <u>Evaporative/Active cooling</u> <ul style="list-style-type: none"> ▪ Remove clothing ▪ Fan the patient, or turn on air conditioner ▪ Cool misting/tepid water wipes ▪ Apply ice packs to axilla, groin, back of neck <u>Immersive cooling for Heat Stroke (if available)</u> <ul style="list-style-type: none"> ▪ Patients 14 and older with Tympanic temperature > 104° F and/or ALOC ▪ Attach defib pads prior to placing patient in immersive cooling bag ▪ Should be initiated prior to transport • Administer oxygen as indicated | |
| ALS Standing Orders | |
| IV/IO access Normal Saline <ul style="list-style-type: none"> • IV/IO bolus – 1 Liter <ul style="list-style-type: none"> ○ Repeat x 1 for persistent hypotension | IV/IO access Normal Saline <ul style="list-style-type: none"> • IV/IO bolus – 20 mL/kg <ul style="list-style-type: none"> ○ Dosing per Handtevy ○ Max single dose 1 Liter ○ Repeat x 1 for persistent hypotension |
| Base Hospital Orders only | |
| Consult with ED Physician for further treatment measures | |
| <u>Additional Notes:</u> <ul style="list-style-type: none"> ▪ Heat Stroke = Evidence of Heat Exposure & ALOC (Coma, Confusion, Ataxia, Seizure) ▪ Immersive cooling is for heat stroke only, not for patients who have a fever ▪ Use caution when cooling patients age 13 and under, as these patients are likely to cool rapidly due to increased body surface area. | |

Effective Date: July 1, 2026

Date Revised: April 9, 2026
Last Reviewed: April 9, 2026



VCEMS Medical Director

| Seizures | |
|--|---|
| ADULT | PEDIATRIC |
| BLS Procedures | |
| <p>Protect from injury.</p> <p>Maintain patent airway, and administer oxygen as indicated.</p> <p>For suspected pediatric febrile seizures begin passive cooling measures.</p> | |
| ALS Standing Orders | |
| <p>Consider IV/IO access</p> <p><u>Anticonvulsant Treatment - Initial</u> <i>For active and persistent seizure activity.</i></p> <ul style="list-style-type: none"> • Midazolam <ul style="list-style-type: none"> ○ IM – 0.2 mg/kg, Max 10 mg ○ IV / IO – 0.1 mg/kg, Max 4 mg <p><u>Anticonvulsant Treatment - Repeat</u> <i>For continued or recurring seizure activity post initial anticonvulsant treatment</i></p> <ul style="list-style-type: none"> • Midazolam <ul style="list-style-type: none"> ○ IM– 0.1 mg/kg, Max 5 mg ○ IV / IO – 0.05 mg/kg, Max 2 mg <p><u>Eclampsia Treatment</u> <i>Patients 20 weeks gestation to six weeks postpartum (rare after 48 hours post-delivery), with active or resolved seizure activity.</i></p> <ul style="list-style-type: none"> • Magnesium Sulfate <ul style="list-style-type: none"> ○ IV – 4 g in 50 mL D₅W over 20 min <ul style="list-style-type: none"> • Slow or stop infusion if bradycardia, heart block, or decreased respiratory effort occur. ○ IM - 10 g (5 g in each buttock) <ul style="list-style-type: none"> • Consider mixing 5 g Magnesium Sulfate with 1 mL 2% Lidocaine to reduce discomfort • Utilize IM dosing if IV access cannot be obtained • Midazolam as above, for active seizure not responding to magnesium | <p>Consider IV/IO access</p> <p><u>Anticonvulsant Treatment - Initial</u> <i>For active and persistent seizure activity.</i></p> <ul style="list-style-type: none"> • Midazolam <ul style="list-style-type: none"> ○ IM – 0.2 mg/kg, Max 10 mg ○ IV / IO – 0.1 mg/kg, Max 4 mg <p><u>Anticonvulsant Treatment - Repeat</u> <i>For continued or recurring seizure activity post initial anticonvulsant treatment</i></p> <ul style="list-style-type: none"> • Midazolam <ul style="list-style-type: none"> ○ IM – 0.1 mg/kg, Max 5 mg ○ IV / IO – 0.05 mg/kg, Max 2 mg |
| Base Hospital Orders only | |
| Consult with ED Physician for further treatment measures | |
| <p>Additional Information:</p> <ul style="list-style-type: none"> • Route for anticonvulsant treatment – <ul style="list-style-type: none"> ○ The initial priority is cessation of seizure activity. When IV/IO access is not available IM is the preferred route to avoid delays in care. ○ When IV/IO access is available this is the preferred route. ○ Repeat doses should be administered IV/IO whenever possible. • Patients with a known seizure disorder or uncomplicated, apparent pediatric febrile seizures, no longer seizing and with a normal postictal state, may not require ALS intervention. | |

Effective Date: July 1, 2026

Date Revised: December 11, 2025
Last Reviewed: December 11, 2025



VCEMS Medical Director

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| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Airway Management | | Policy Number 710 | |
| APPROVED: Administration: | Steven L. Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director: | Daniel Shepherd, MD | Date: July 1, 2026 | |
| Origination Date: | June 1986 | | |
| Date Revised: | April 9, 2026 | Effective Date: July 1, 2026 | |
| Date Last Reviewed: | April 9, 2026 | | |

- I. Purpose: To define the indications, procedure, and documentation for airway management by Ventura County EMS personnel.
- II. Authority: California Health and Safety Code, §1798, §1798.2; §1798.160 and §1798.170 and California Code of Regulations, Title 22, §100091.01 and §100091.02.
- III. Policy: Airway management shall be performed on all patients with the following indications:
 - Hypoxic and/or hypercapnic respiratory failure with ineffective breathing
 - Inability to maintain their own airway
 - Airway Obstruction
 - A. Supraglottic Airway Device (SAD): May be performed by Accredited EMTs (**ONLY Accredited EMTs who have completed the VCEMS approved training course and are approved by the VCEMS Medical Director in accordance with VCEMS Policies 303 and 303B**) and Paramedics.
 - B. Endotracheal Intubation (ETI): May be performed by Paramedics and is approved for the following patients:
 1. Adults
 2. Pediatric patients who are longer than the standard pediatric length-based tape
- IV. Definitions:
 - A. **Attempt:** An interruption of ventilation, with,
 1. the purpose of inserting an endotracheal tube, OR
 2. a supraglottic airway device.
 - B. **Airway Management:** Techniques and interventions intended to address respiratory failure and/or airway obstruction. Techniques include repositioning, supplemental oxygen, suctioning, use of CPAP/BiPAP per VCEMS Policy 723, BVM ventilation, SAD and/or Endotracheal Intubation (ETI).

V. Procedure:

A. Bag-Valve-Mask (BVM):

1. Contraindications

- a. None

2. Equipment

a. PREEMIE – 2YR on Handtevy

- Infant BVM and mask: 240 mL with manometer
- Infant ETCO₂ filter line: < 0.5 mL sidestream -OR- < 1mL mainstream

b. 3 YR – 10 YR on Handtevy

- Child BVM and mask: 500 mL with manometer
- Pediatric/Adult ETCO₂ filter line: 6.6 mL sidestream -OR- < 5 mL mainstream

c. 11 YR – 13 YR on Handtevy & Adult

- Small Adult BVM and mask: 1,000 mL with manometer
- Pediatric/Adult ETCO₂ filter line: 6.6 mL sidestream -OR- < 5 mL mainstream

3. Technique

- a. 2-Person is the preferred technique for BVM

B. Supraglottic Airway Device (SAD): Authorized personnel may utilize the VCEMSA approved SAD as the primary airway management modality if determined it would be the most appropriate airway management device for the patient.

1. SAD Additional Indications

- a. The VCEMSA approved SAD shall be used if BVM ventilation is inadequate and attempts at ETI have failed.

2. SAD Contraindications

- a. Intact gag reflex
- b. Caustic ingestion
- c. Unresolved complete airway obstruction
- d. Trismus or limited ability to open the mouth such that the device cannot be inserted
- e. Oral trauma
- f. Distorted anatomy that prohibits proper placement (e.g. oropharyngeal mass or abscess).

3. SAD Equipment
 - a. Choose correct size based on Handtevy for pediatrics and recommended weight range for adults.
 4. SAD Attempts
 - a. The patient shall be ventilated with 100% O₂ by BVM for one minute before each attempt.
 - b. There shall be no more than two (2) attempts, lasting no longer than 40 seconds each.
 - i. If SAD placement cannot be accomplished in two (2) attempts, try again to ventilate the patient with BVM and progress to ETI if indicated.
 - c. For patients in cardiac arrest, chest compressions will not be interrupted.
 - d. Secure the SAD with appropriate strap, and prior to movement, patients shall have their head and neck maintained in a neutral position with head supports.
 5. SAD Confirmation
 - a. Attach ETCO₂ filter line and bag-valve device to verify placement utilizing capnography waveform.
- C. Endotracheal Intubation (ETI):
1. ETI Additional Indications
 - a. Unable to adequately ventilate with BVM and/or SAD.
 - b. Tracheal stoma intubation may be performed for patients where ETI is indicated and there is no replacement tracheostomy tube available.
 - c. After Base Hospital (BH) contact has been made, the BH Physician may order ETI in other situations.
 2. ETI Contraindications
 - a. Intact gag reflex
 3. ETI Attempts
 - a. The patient shall be ventilated with 100% O₂ by BVM for one minute before each attempt.
 - b. There shall be no more than two (2) attempts, lasting no longer than 40 seconds each.
 - i. If ETI cannot be accomplished in two (2) attempts, the VCEMSA approved SAD shall be inserted.
 - c. For patients in cardiac arrest, chest compressions will not be interrupted.
 - d. Insert ETT, advance, and hold at the following depth:

- i. Less than 5 ft. tall: balloon 2 cm past the vocal cords.
 - ii. 5'-6'6" tall: 22 cm at the teeth.
 - iii. Over 6'6" tall: 24 cm at the teeth or 2 cm past the vocal cords.
- e. Secure the ETT with the appropriate strap, and prior to movement, patients shall have their head and neck maintained in a neutral position with head supports.

4. ETI Confirmation

- a. Attach ETCO₂ filter line and bag-valve device to verify placement utilizing capnography waveform.
- b. If CO₂ measurement device indicates that the ETT may be in the esophagus, immediately reevaluate the patient.
 - i. The ETT should be removed if there is concern for esophageal intubation.
 - ii. If you are confident that the ETT is in the trachea, you must confirm placement by performing repeat laryngoscopy. If VL is available, confirm placement and document placement with a screenshot.
 - iii. When in doubt, take it out.
- c. The paramedic who performed the ETI has the responsibility for confirmation, ongoing management, and documentation of ETT placement until a formal transfer of care has been made.

5. Special Considerations

- a. Video Laryngoscopy
 - i. Providers may utilize a VL device **if authorized by VCEMS**.
 - ii. The VL device must be equipped with the ability to record the intubation attempt for post-event analysis.
 - iii. A "screenshot" confirming placement will be attached to the VCePCR for the incident.
 - iv. Optimal technique varies by device and shall be addressed in training prior to use of the device.
- b. Flexible stylet
 - i. A flexible stylet may be used for any ETI attempt that involves an ETT size of at least 6.0 mm.
- c. Tracheal stoma intubation
 - i. Select the largest ETT that will fit through the stoma without force, it should not be necessary to use lubricant, do not use a stylet.

- D. ETCO₂ Measurement (Additional information in Policy 711: Capnography):
1. ETCO₂ monitoring shall be utilized with all airway management modalities.
 - a. Ensure appropriate waveform is present with each ventilation.
Troubleshoot appropriately for irregular waveforms.
 - b. The typical normal range of exhaled carbon dioxide is 35-45 mmHg. Patients with underlying pulmonary conditions may have baseline values higher than this. Target 40 mmHg if no known such history. Otherwise, higher values may be acceptable (40-50 mmHg).
 - c. If the patient has been in cardiac arrest for a prolonged time (more than 5-10 minutes) the waveform may be diminished or, very rarely, absent.
 2. ETCO₂ device failure: If the measurement device fails, and second device is not immediately available, use a colorimetric CO₂ detector.
 - a. Colorimetric CO₂ detector:
 - i. Observe the color at the end of exhalation after six ventilations.
 - ii. Yellow indicates the presence of >5% exhaled CO₂ and tan 2-5% CO₂.
 - iii. Yellow or tan indicates successful ventilation.
 - iv. Purple indicates less than 2% CO₂ and is a strong indicator that ventilations are not success and the esophagus.
 3. Continuous ETCO₂ monitoring
 - a. If the waveform diminishes or disappears, reassess the patient for a change in circulation status and reassess SAD/ETT placement.

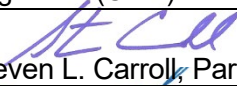

VI. Documentation

- A. All airway management techniques shall be documented in the procedure section of the Ventura County Electronic Patient Care Report (VCePCR)
- B. If a VL is used, a screenshot confirming placement will be attached to the VCePCR.
- C. Cardiac monitor data
 1. An electronic upload including ETCO₂ waveform is required in the VCePCR for all airway management techniques.
 2. In the event an upload cannot occur, a printed code summary shall be mounted, labeled, scanned, and attached to the VCePCR. The code summary must include a capnography waveform at the following key points.
 - a. Initial BVM ventilation, ETT, or SAD confirmation
 - b. Movement of patient
 - c. Transfer of care

- D. An electronic signature shall be captured on the mobile device used to document the care provided.
 - 1. The treating emergency room physician will sign the 'Advanced Airway Verification' section of the VCePCR, as well as document the supporting information (placement, findings, method, comments, name, and date).
 - 2. In the event the patient was not transported, another on-scene paramedic (if available) will sign and complete the verification section.

VII. CQI

- A. For all VL attempts, the ImageTrend intubation CQI module must be completed monthly. Provider agencies are encouraged, though not required, to complete the CQI module for all other intubation attempts.
- B. Failure to complete the module may result in loss of authorization to perform VL.
- C. VCEMSA reserves the right to request the complete video file as part of the VCEMS CQI program and medical oversight.
- D. Provider Agency EMS Medical Director commits to meeting with VCEMS Medical Director quarterly to review fall outs and complications.
- E. CQI Metrics
 - 1. Type of patient: med vs trauma
 - 2. Suction utilized appropriately?
 - 3. Grade view?
 - 4. Number of attempts?
 - 5. Bougie used?
 - 6. Blade entry to intubation time? (Defined as when the laryngoscope blade passes the teeth to when the ETT passes through the cords)
 - 7. Complications (Hypoxia, bleeding, bradycardia, etc.)

| | | | |
|---|---|---|--|
| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Cardiac Arrest Management (CAM) and Post Arrest (ROSC) Resuscitation | | Policy Number 733 | |
| APPROVED: Administration: |  Steven L. Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director: |  Daniel Shepherd, MD | Date: July 1, 2026 | |
| Origination Date: | April 30, 2016 | | |
| Date Revised: | March 12, 2026 | Effective Date: July 1, 2026 | |
| Date Last Reviewed: | March 12, 2026 | | |

- I. PURPOSE: To establish a standardized procedure for the treatment of patients in cardiac arrest, and for those who have a return of spontaneous circulation (ROSC) following treatment for cardiac arrest.
- II. AUTHORITY: California Health and Safety Code, Section 1797.220, and 1798. California Code of Regulations, Title 22, Section 100096.03.
- III. POLICY: For all patients in cardiac arrest who are greater than 28 days old, Cardiac Arrest Management (CAM) protocol will be followed. Patients less than 28 days old will follow VCEMS Policy 705.16: Neonatal Resuscitation. For patients who are 18-years-old and older, who achieve ROSC following a cardiac arrest that is non-traumatic in nature, Post Arrest (ROSC) Resuscitation protocol outlined in Section V.B of this policy will be followed.
- IV. DEFINITIONS
 - A. Cardiac Arrest Management: An organized team-based approach to the management of patients in cardiac arrest.
 - B. Chest Compression Fraction (CCF): The proportion of total cardiac arrest time spent performing chest compressions. CFF = the cumulative time spent providing chest compressions / the cumulative time of the patient is in cardiac arrest.
 - C. Post Arrest Resuscitation: An organized team-based approach that prioritizes recognition of re-arrest and management of C-A-B after ROSC has been achieved.
- V. CORE PRINCIPLES:
 - A. The foundation of CAM is high quality, consistent chest compressions with minimal interruptions (CFF \geq 90%).
 - B. The next priority is the recognition and defibrillation of malignant rhythms such as ventricular fibrillation.
 - C. The first dose of epinephrine should be administered as quickly as possible.
 - D. A methodical, coordinated approach and good communication are essential components of a well-run resuscitation

VI. POLICY:

A. Cardiac Arrest Management

*****PRIORITIES DURING CARDIAC ARREST RESUSCITATION*****

1. High quality continuous chest compressions with minimal interruptions
2. Immediate defibrillation & termination of refractory VF/VT
3. Expedient administration of epinephrine
4. Low-volume ventilations (on the recoil phase of every 10th compression)
5. Communication and Teamwork

Immediate Goals of Care

| BLS Goals of Care | ALS Goals of Care |
|---|---|
| <ul style="list-style-type: none"> ▪ Establish the Triangle of Life ▪ Immediate defibrillation (if indicated) <ul style="list-style-type: none"> ○ If refractory VF/VT [Vector change or Double Sequential Defibrillation (DSD)] ▪ BLS airway interventions as indicated | <ul style="list-style-type: none"> ▪ <i>BLS Goals of Care</i> established ▪ Initial dose of Epinephrine administered quickly ▪ ALS airway interventions as indicated |



Rescuer 1 (Initial Compressor)

- Verify Cardiac Arrest (<10 seconds)
 - Shake and Shout
 - Move the patient to a place that will allow for optimal CPR
 - Open airway with “Shark Hook” maneuver
 - Assess for apnea or agonal respirations
 - **If not breathing or agonal breathing:**
 - Immediately start high quality continuous compressions over clothing^①
- Switch with Rescuer 2 each rhythm check (alternating manual compressions/ventilations)
- LUCAS Device Application
 - Under the direction of the LUCAS Device Coordinator-will be responsible for attaching the device to the backplate on their own side. Initial attachment is on the side without compressions being performed.



If there is a suspected FBAO

- **BLS** – Inspect Airway, **ALS** – Laryngoscopy
- Rescuer 1 continues compressions
- Rescuer 2 or 3 focus on FBAO removal



| Rescuer 2 (Initial AED/Cardiac Monitor) | | | |
|--|--------------------|--|-----------------------------|
| <ul style="list-style-type: none"> • Activate metronome • Remove clothing to expose chest • Apply AED or Cardiac monitor defibrillator pads in the anterior/posterior (AP) position ② | | | |
| Basic Life Support (AED) | | Advanced Life Support (Manual Defibrillator) | |
| ▪ Turn on AED and follow prompts | | ▪ Pre-charge monitor③ | |
| ↓ | | | |
| “Shock Advised” | “No Shock Advised” | VF/VT | Non-Shockable rhythm |
| Clear patient/deliver immediate shock | Don't shock | Clear patient/deliver immediate shock | Disarm defibrillator charge |
| <ul style="list-style-type: none"> • Switch with Rescuer 1 each rhythm check (alternating manual compressions/ventilations) • LUCAS Device Application <ul style="list-style-type: none"> ○ Under the direction of the LUCAS Device Coordinator-will be responsible for attaching the device to the backplate on their own side. Initial attachment is on the side without compressions being performed. | | | |



RESUME CHEST COMPRESSIONS IMMEDIATELY!



| Rescuer 3 (Airway) |
|---|
| <ul style="list-style-type: none"> • Insert OPA/NPA • Assemble BVM/EtCO₂, attach BVM to 15 L/min high flow O₂ • Deliver 1-Rescuer ventilations until Rescuer 1 or 2 is available for 2-Rescuer ventilations • Ensure proper seal with BVM mask to the patient with “2 hand thumbs up” technique • Coach compression quality • LUCAS Device Application <ul style="list-style-type: none"> ○ Once LUCAS device is placed monitor for unwanted movement/drift |



| Rescuer 4 (ALS) TEAM LEAD |
|---|
| <ul style="list-style-type: none"> • Follow VCEMS Policy 705.07 (Asystole/PEA) or 705.08 (VF/VT) • Rhythm Checks/Defib (including DSD Coordination) • EtCO₂ Monitoring • IV/IO • ALS Medications • Advanced Airway PRN • Assess for causes • LUCAS Device Coordinator (When feasible, this role should be delegated to Rescuer 5, to allow Rescuer 4 to focus on primary tasks of rhythm interpretation & goals of care) |

*May delegate or perform any of these tasks as appropriate



| Rescuer 5 (ALS) |
|---|
| <ul style="list-style-type: none"> • Assist Rescuer 4 • Gather Information/Meds • Communicate with Family <p>*May be delegated variety of tasks based on scope of practice</p> |



| Continuous Cardiac Arrest Management |
|--|
| <ul style="list-style-type: none"> • Pre-Charge monitor^③ • Perform rhythm check every 2 min (Goal < 3-5 seconds) • Perform pulse check if EtCO₂ > 20 AND organized rhythm > 40 • Medications as indicated • Airway management as indicated |



| VF/VT | Non-Shockable rhythm |
|---|-----------------------------|
| Clear patient and deliver immediate shock | Disarm defibrillator charge |



| |
|--|
| RESUME CHEST COMPRESSIONS <u>IMMEDIATELY!</u> |
|--|



| LUCAS Device Application (NOT authorized for pediatrics) |
|---|
| <p>Integration of the LUCAS device during CAM requires a methodical & coordinated approach</p> <ul style="list-style-type: none"> • After the BLS and ALS Goals of Care have been established the LUCAS device may be applied • If there will be NO DELAY in starting compressions, the patient may be placed onto a prepositioned backplate when moving them to a workable space <p style="text-align: center;"><u>The LUCAS Device Coordinator will direct placement of the device</u></p> <p>Staged application: A two-stage method where application of the LUCAS device is done during rhythm checks to minimize pauses in chest compressions*</p> <p>Stage 1- The backplate is positioned under the patient and manual compressions are resumed</p> <p>Stage 2- During a subsequent rhythm check, the device is secured to the backplate and mechanical compressions are initiated</p> <ul style="list-style-type: none"> • Initial device attachment to the backplate is on the opposite side of the compressor • Once attached to both sides of the back plate, pull down the plunger and start the device • Secure the patient's arms to the device and place the neck strap • Mark the plunger location to monitor for device shifting** <p>*If during the application process, there is more than a 10 second pause in compressions, manual compressions are to be resumed before reattempting placement</p> <p>**If the LUCAS device alarms or shifts it may need to be adjusted. If there are a combined 3 alarms/adjustments needed, remove the device on the third alarm and resume manual CPR.</p> |

Additional Information:

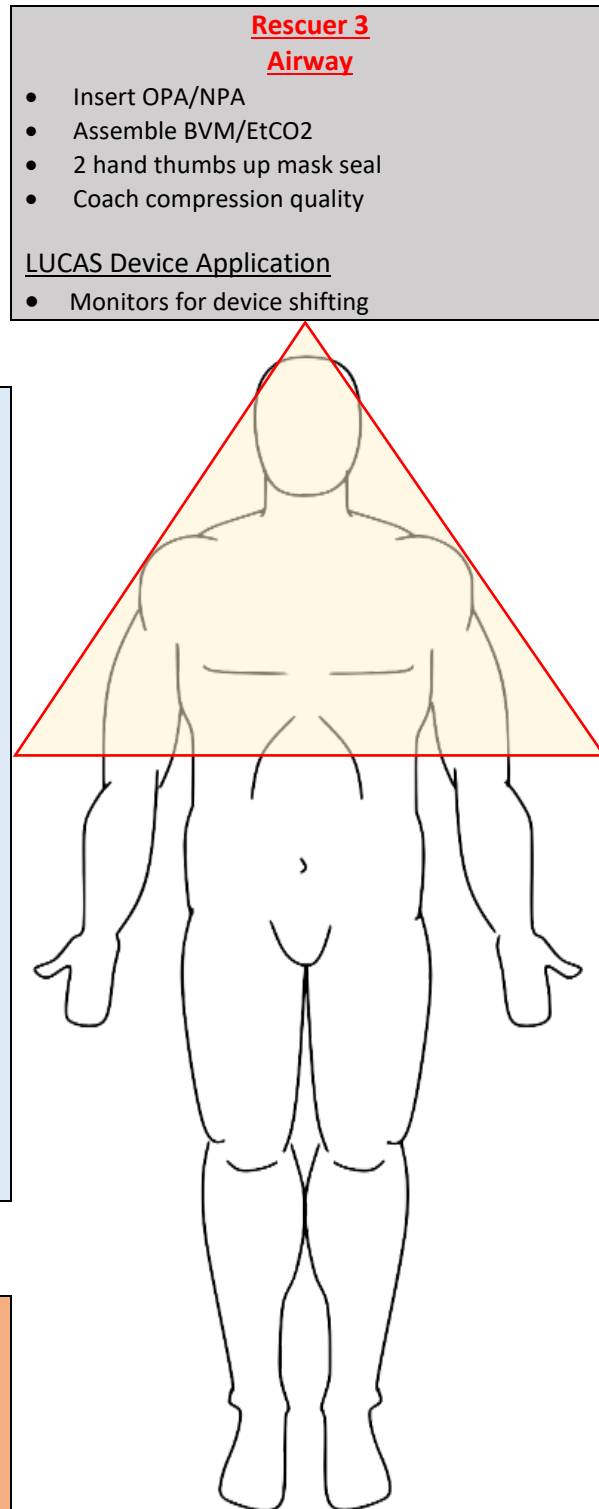
- ① Chest Compressions:
 - Rate: 100-120/min (preferred rate of 112/min)
 - Depth:
 - Adult: 2-2.4 inches
 - Child/Infant: 1/3 the anterior-posterior chest dimension
 - Full chest recoil after each compression

- ② Cardiac Monitors should be in paddles mode to capture compression data
Zoll-Utilize puck for cardiac arrest feedback and leave in place with LUCAS device application.

- ③ Energy level: Lifepak 360 Joules, Zoll 200 Joules

- 4 Defibrillate indeterminate rhythms rather than prolong rhythm analysis.

Triangle of Life Cardiac Arrest Management



Rescuer 3 Airway

- Insert OPA/NPA
- Assemble BVM/EtCO2
- 2 hand thumbs up mask seal
- Coach compression quality

LUCAS Device Application

- Monitors for device shifting

Rescuer 1 Initial Compressor

Initial Interventions

- Shake and Shout
- Move patient to floor
- Shark hook
- Begin compressions over clothing

Ongoing Interventions

- Switch with Rescuer 2 each rhythm check (alternating manual compressions/ventilations)

LUCAS Device Application

- Ensures arm is up
- Attaches device to backplate on their side (initial attachment is on the side without compressions being performed)

Rescuer 2 Initial AED/Cardiac Monitor

Initial Interventions

- Activate metronome
- Expose chest
- Apply defib pads in AP position & analyze rhythm

Ongoing Interventions

- Switch with Rescuer 1 each rhythm check (alternating manual compressions/ventilations)

LUCAS Device Application

- Ensures arm is up
- Attaches device to backplate on their side (initial attachment is on the side without compressions being performed)
- Pulls down plunger and starts device
- Marks plunger on chest
- Secures patient's arms/neck strap

Rescuer 4 (ALS) Team Lead

- Rhythm Checks/Defib
- EtCO2 Monitoring
- IV/IO
- ALS Medications
- Advanced Airway PRN
- Assess for causes
- LUCAS Device Coordinator

*May delegate or perform as appropriate

Rescuer 5

- Assist Rescuer 4
- Gather Information/Meds
- Communicate with Family

*May be delegated variety of tasks based on scope

B. Post Arrest Resuscitation

*****PRIORITIES IN POST ARREST RESUSCITATION*****

1. Immediate recognition and treatment of re-arrest
2. Preventing re-arrest through effective and continuous management of C – A – B
3. Thorough assessment and identification / treatment of correctable causes
4. Movement and transport decisions that prioritize ongoing patient care



Rescuer 1

- Palpate femoral pulse continuously for first 10 minutes prior to patient movement
- Immediately begin chest compressions if femoral pulse is lost or in question



Rescuer 2

- Continue rescue breathing
- Deliver 1 ventilation every 6 seconds, no more than 10 breaths per minute
- Deliver ventilations with ONE HAND on bag to avoid hyperventilation



Rescuer 3

- Ensure effective mask seal with continuous “2 thumbs up” technique
- Coach rescuer 2 as needed to ensure delivery of ventilations and avoid hyperventilation
- For spontaneously breathing patients apply nasal EtCO₂ device



Rescuer 4

TEAM LEAD

- Communicate treatment priorities to team – ensure roles are clear and effective
- Setup cardiac monitor to recognize change in patient status – monitor must remain attached to patient and observed through all phases of care
- Confirm monitor settings
 - VF alarm activated
 - Pads / paddles mode
 - EtCO₂ waveform
 - SpO₂ waveform
- Attach adhesive SpO₂ sensor to maintain a consistent and reliable waveform, if available
- Perform a thorough assessment: history, medications, circumstances, physical exam
- Lucas Device Coordinator: if device is not in place, directs placement prior to transport (if available)
- May delegate interventions as appropriate

| Rescuer 4 TEAM LEAD | |
|--|---|
| ASSESSMENT | |
| CIRCULATION | AIRWAY-VENTILATION-OXYGENATION |
| <ul style="list-style-type: none"> • Evaluate for palpable femoral pulse • Evaluate MANUAL blood pressure <ul style="list-style-type: none"> ○ repeat every 5 minutes ○ manual for patient changes or SBP < 90 mmHg • Monitor for falling EtCO₂ as sign of re-arrest • Obtain and evaluate 12 lead only after assessment and interventions | <ul style="list-style-type: none"> • Confirm EtCO₂ waveform present with every • Ventilation; normal 35 – 45 mmHg • Confirm presence of bilateral lung sounds • Evaluate SpO₂, goal is 94% – 99% • Consider likelihood of respiratory cause; E.g. choking |
| SUPPORT | |
| CIRCULATION | AIRWAY-VENTILATION-OXYGENATION |
| <ul style="list-style-type: none"> • Obtain peripheral IV – preferred 18g, minimum 20g • Initiate 1 L fluid bolus, use pressure bag for IO or rapid infusion via peripheral IV • Epinephrine 10mcg/mL* <ul style="list-style-type: none"> ○ 1mL (10mcg) every 2 minutes, slow IV/IO push ○ Titrate to SBP of greater than or equal to 90mm/Hg • Circulation treatment goals <ul style="list-style-type: none"> ○ Peripheral pulses present ○ Systolic BP > 90 mmHg ○ Ongoing fluid therapy** • Consider etiology to direct treatment where possible <ul style="list-style-type: none"> ○ Hypovolemia, sepsis, GI bleeding ○ MI, heart failure, idiopathic electrical anomaly ○ Hyperkalemia | <ul style="list-style-type: none"> • Place advanced airway as needed to <ul style="list-style-type: none"> ○ Improve ventilation or oxygenation ○ Protect against aspiration ○ Effectively ventilate while moving • SpO₂ goal 94%-99% - titrate supplemental oxygen down if SpO₂ is 100% • Ventilation treatment goals <ul style="list-style-type: none"> ○ EtCO₂ waveform present with each breath ○ Bilateral breath sounds • Consider etiology to direct treatment where possible <ul style="list-style-type: none"> ○ Tension pneumothorax ○ Bronchoconstriction ○ Pulmonary embolus ○ Upper airway obstruction ○ Opiate overdose |

*Refer to VCEMS Policy 735 for additional information on preparing push dose solution

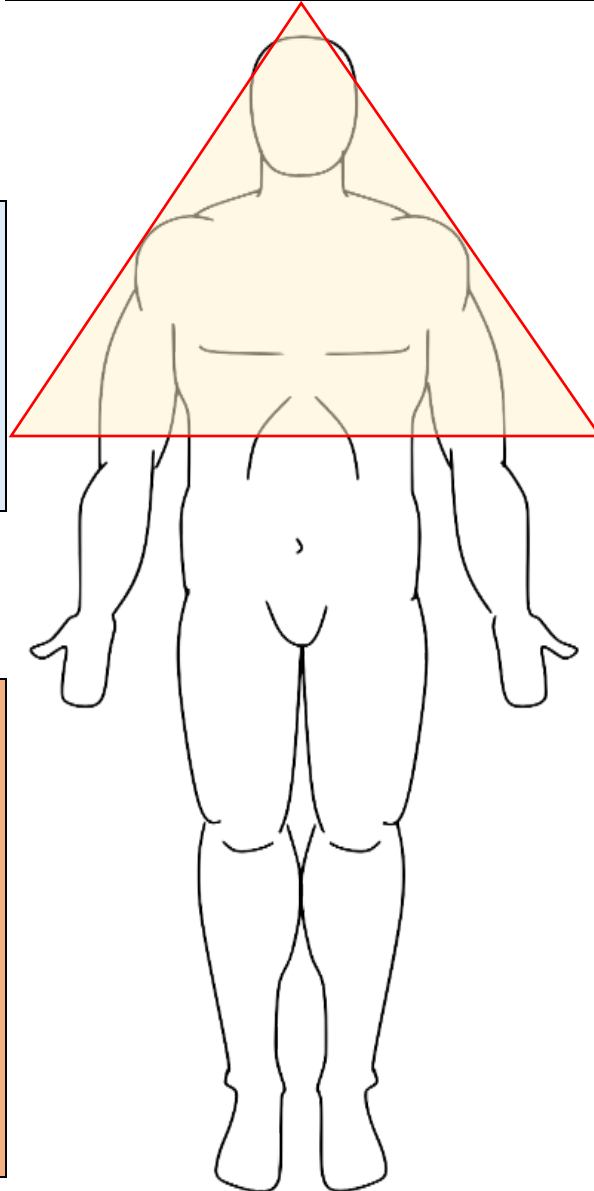
**Fluid therapy indicated unless indication of fluid overload or left sided heart failure



| Rescuer 5 |
|---|
| <ul style="list-style-type: none"> • Assist in overseeing triangle of life roles • Assist Rescuer 4 by preparing medications and equipment • Obtain manual blood pressure • Obtain 12-lead EKG once directed; assure monitor is returned to pads / paddles mode • May be delegated a variety of tasks based on scope |

Triangle of Life Post Arrest Resuscitation

- Rescuer 3**
- 2 hand thumbs up mask seal
 - Coaches to ensure adequate Ventilation
 - Coaches to avoid hyperventilation



- Rescuer 1**
- Palpates femoral pulse continuously for 10 minutes
 - Immediately starts compressions if femoral pulse lost or in question
 - **PRIORITY** position; does not take on additional tasks

- Rescuer 2**
- Provides 1 hand BVM ventilations
 - 1 breath every 6 seconds
 - Avoids hyperventilation
 - **PRIORITY** position; does not take on additional tasks

- Rescuer 4
Team Lead**
- Visually monitors EtCO₂, SpO₂, & Paddles EKG
 - Obtains/delegates peripheral IV
 - Initiates NS bolus
 - Provides ALS circulatory assessment and support
 - Provides airway assessment and support
 - Determines all ALS care-performs/delegates

- Rescuer 5**
- Directly assists team lead
 - Takes manual blood pressure
 - Assists in obtaining 12-lead
 - Most mobile position
- *May be delegated variety of tasks based on scope

| POST ARREST RESUSCITATION CHECKLIST | |
|--|---|
| <input checked="" type="checkbox"/> | Initial Actions |
| <input type="checkbox"/> | Initiate 10-minute continuous femoral pulse check |
| <input type="checkbox"/> | Continue rescue breathing as needed |
| <input type="checkbox"/> | Paddles attached and EKG waveform visible |
| <input type="checkbox"/> | VF alarm set, SpO ₂ and EtCO ₂ waveforms visible |
| Circulation | |
| <input type="checkbox"/> | Obtain peripheral IV access (18 g preferred, 20 g minimum) |
| <input type="checkbox"/> | Initiate NS fluid bolus |
| <input type="checkbox"/> | Assess for peripheral pulses |
| <input type="checkbox"/> | Obtain manual blood pressure |
| <input type="checkbox"/> | Push dose epinephrine IN ADDITION TO fluids for systolic BP < 90 mmHg |
| Airway / Ventilation | |
| <input type="checkbox"/> | Assess for responsiveness and spontaneous ventilations |
| <input type="checkbox"/> | Assess EtCO ₂ , lung sounds, SpO ₂ |
| <input type="checkbox"/> | Maintain BLS airway or place advanced airway as indicated |
| <input type="checkbox"/> | Place advanced airway if needed to ventilate while moving patient |
| <input type="checkbox"/> | Oxygenate to SpO ₂ 94% to 99% |
| <input type="checkbox"/> | Oxygen flow rate titrated to prevent SpO ₂ 100% |
| 12 Lead EKG | |
| <input type="checkbox"/> | Obtain 12-lead EKG only after managing C-A-B and prior to movement |
| Prior to Moving Patient, Confirm | |
| <input type="checkbox"/> | Patient has sustained ROSC approximately ≥ 10 minutes |
| <input type="checkbox"/> | C-A-B have been effectively stabilized or appropriate efforts made |
| <input type="checkbox"/> | LUCAS device is in place (if available) |
| <input type="checkbox"/> | Team has planned how to effectively ventilate during move |
| <input type="checkbox"/> | Team is prepared to recognize re-arrest: <ul style="list-style-type: none"> • STOP MOVING • RESUME CAM ON SCENE |

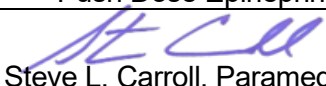

| Post Arrest Resuscitation Transport |
|--|
| <ul style="list-style-type: none"> • Transport is indicated after a patient has sustained ROSC for approximately 10 minutes and effective efforts have been made to stabilize airway, breathing, and circulation • Continuous patient assessment and treatment must remain the priority during transport. • Recognizing hypotension, inadequate ventilation, or re-arrest, will have a large impact on patient outcome. |

| Re-Arrest Guidelines (Loss of ROSC) |
|---|
| <ul style="list-style-type: none"> • Re-arrests require the same high-quality CAM and ALS care as the initial arrest: <ul style="list-style-type: none"> ○ Remain on scene ○ Ensure adequate workspace ○ Begin CAM Procedure ○ Defibrillate VF / VT ASAP • Provide an additional 20 minutes of high-quality CAM prior to any further movement or initiating transport. • If ROSC is obtained again, reassess, stabilize C – A – B as indicated, then continue with previous transport plan. • If no ROSC, or multiple re-arrests, through 20 minutes from initial re-arrest, consider underlying cause, circumstances, and presentation, then contact base for consultation. |

| Prioritizing Care in Re-Arrest | |
|---|---|
| Re-Arrest On Scene | Re-Arrest During Transport |
| <ul style="list-style-type: none"> • If re-arrest occurs during movement to gurney or ambulance, resume CAM on scene outside of ambulance • If re-arrest occurs after loading but prior to leaving scene, unload patient from ambulance, resume CAM, and move to workable space | <ul style="list-style-type: none"> • Prioritize immediate and continuous chest compressions • Prioritize immediate and q 2 min defib for VF/VT • Reassess patient considering correctable causes and previous interventions • Confirm advanced airway effective and in place if supraglottic airway or ETT was used |

NOTE:
 Most re-arrests occur in the first 10 minutes after ROSC is achieved.
 Most delayed identification of re-arrest occurs during movement of the patient and during transport.

| NO ROSC - NO ROSC AFTER RE-ARREST - FREQUENT RE-ARREST | | |
|--|---|--|
| Base Consultation | | |
| <ul style="list-style-type: none"> • Base consultation is indicated when considering DOD vs continuing resuscitation. • Assessment findings, observations, and clinical circumstances should be clearly communicated during base hospital consultation. • Direct consultation with base hospital physician is recommended in cases where the clinical scenario may warrant prolonged resuscitation or “early” termination of resuscitation. | | |
| Patient Factors | Base Consult Takes Place | DOD |
| <ul style="list-style-type: none"> • Asystole / PEA • Never defibrillated, no shockable rhythm observed | After 20 minutes of resuscitation efforts | Consider after 20 minutes; base consult |
| <ul style="list-style-type: none"> • VF / VT • Defibrillated at least once during arrest | After 40 minutes of resuscitation efforts without ROSC | Consider after 40 minutes; base consult |
| <ul style="list-style-type: none"> • Bystander witnessed collapse • EMS witnessed collapse or loss of pulse | After 40 minutes of resuscitation efforts without ROSC | Consider after 40 minutes; base consult |
| <ul style="list-style-type: none"> • Signs of survivability <ul style="list-style-type: none"> ○ EtCO₂ > 30 ○ Spontaneous breathing attempts ○ Spontaneous movement ○ Frequent / persistent VF / VT | After 40 minutes of resuscitation efforts without ROSC | Consider DOD after 40 minutes; base consult Physician consult preferred |
| <ul style="list-style-type: none"> • Re-arrest without ROSC • Frequent re-arrest | After 20 minutes of re-arrest, or 20 minutes of intermittent ROSC | Consider after base consult Consider rhythm and signs of survivability |

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| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Push Dose Epinephrine | | Policy Number 735 | |
| APPROVED: Administration:  Steve L. Carroll, Paramedic | | Date: July 1, 2026 | |
| APPROVED: Medical Director:  Daniel Shepherd, M.D. | | Date: July 1, 2026 | |
| Origination Date: January 10, 2019 | | | |
| Date Revised: March 12, 2026 | | Effective Date: July 1, 2026 | |
| Date Last Reviewed: March 12, 2026 | | | |

- I. PURPOSE: To define the indications, contraindications, and procedure related to administration of push dose epinephrine
- II. AUTHORITY: Health and Safety Code, Sections 1797.220 and 1798. California Code of Regulations, Title 22, Sections 100091.01 and 100096.02
- III. POLICY: Paramedics may administer push dose epinephrine to adult and pediatric patients as defined by VCEMSA treatment protocols.
- IV. Procedure:
 - A. Classification
 1. Sympathomimetic agent (catecholamine)
 - B. Indications
 1. Anaphylaxis with shock (ref: 705.02 – Allergic reaction / anaphylaxis)
 2. Hypotension secondary to presumed cardiogenic shock (ref: 705.09 – Chest Pain – Acute Coronary Syndrome, 705.21 – SOB – Pulmonary Edema)
 3. Hypotension secondary to Crush Injury (ref: 705.11 – Crush Injury)
 4. Symptomatic bradycardia (ref: 705.24 – Symptomatic Bradycardia)
 5. Sepsis Alert (ref: 705.27 – Suspect Shock)
 6. Deteriorating patient condition with unknown shock etiology
 - C. Contraindications
 1. None
 - D. Adverse Effects

| Cardiovascular | Neurological | Gastrointestinal |
|----------------|--------------|-------------------|
| Tachycardia | Anxiety | Nausea / Vomiting |
| Hypertension | Dizziness | |
| Chest Pain | Headache | |
| Palpitations | Tremors | |
| Arrhythmias | | |

E. Actions

Increases blood pressure and cardiac output via stimulation of alpha and beta adrenergic receptors.

F. Preparing the Concentration

1. Adults and Pediatrics

| | Using a Preload | Using a Vial |
|------------------------------|-----------------------|-----------------------|
| Epinephrine | 0.1 mg/mL (Preload) | 1 mg/mL (Vial) |
| Normal Saline | 100 mL bag of 0.9% | 100 mL bag of 0.9% |
| Final Concentration | essentially 10 mcg/mL | essentially 10 mcg/mL |
| Syringe needed for Push Dose | 1 mL | 1 mL |

2. Mixing Instructions

- Preload: Push 10 mL of 0.1 mg/mL epinephrine from preload into 100mL bag of normal saline
- Vial: Push 1 mL of 1 mg/mL epinephrine from vial into 100mL bag of normal saline
- Final concentration is essentially 10 mcg/mL (0.01 mg)

3. Points to Remember

- Confirm your concentration prior to mixing
- Maintain sterile technique
- Label the bag with the drug name and final concentration
 - Example: "Epinephrine 10 mcg/mL"
- DO NOT administer epinephrine and sodium bicarbonate in the same vascular access line and/or location unless that line has been flushed with at least 10mL of normal saline.

G. Dosing

1. Adults

- 1mL (10mcg) every 2 minutes, slow IV/IO push
 - Titrate to SBP of greater than or equal to 90 mm/Hg

2. Pediatrics



- 0.1 mL/kg (1 mcg/kg) every 2 minutes, slow IV/IO push
 - Max single dose of 1 mL or 10 mcg
 - Titrate to SBP of greater than or equal to 80 mm/Hg

H. Communication and Documentation

1. Communicate the use of push dose epinephrine to base hospital
 - Include final concentration delivered
 - Report total amount of push dose epinephrine administered, total elapsed time of administration, and patient response
2. Administration of epinephrine and any/all associated fields will be documented in the Ventura County electronic Patient Care Report (VCePCR)

I. Alternative Concentrations

1. In the event of a shortage that limits a provider agency from obtaining the necessary 100 mL bags of normal saline solution, please see below for acceptable alternatives:
 - Discard 1 mL from 10 mL saline flush syringe and draw 1 mL from epinephrine preload into flush syringe. This creates a solution of 10 mcg per 1 mL.
 - Draw 5 mL of from epinephrine preload into 50 mL bag of normal saline. This essentially creates a solution of 10 mcg per 1 mL.

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| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Air Unit Staffing Requirements | | Policy Number 1201 | |
| APPROVED: Administration: |  Steven L. Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director: |  Daniel Shepherd, MD | Date: July 1, 2026 | |
| Origination Date: | 5/30/1988 | Effective Date: July 1, 2026 | |
| Date Revised: | 1/08/2026 | | |
| Date Last Reviewed: | 1/08/2026 | | |

- I. PURPOSE: To provide guidelines for classification and staffing level for air unit(s) authorized or licensed to operate in Ventura County as a part of the Emergency Medical Services system.
- II. AUTHORITY: Health and Safety Code: 1797.103, 1797.206, 1797.218, 1797.220, 1797.252, 1798.2 and 1798.102. California Code of Regulations, Title 22, Division 9, Chapter 7
- III. POLICY: Agencies authorized by VCEMS to provide EMS services in the County of Ventura will be classified and staffed with medical personnel appropriate to the needs of the patient, according to this policy.
- IV. PROCEDURE
 - A. Aircraft Staffing Requirements
 1. Air Ambulance: The medical flight crew has at a minimum two (2) attendants certified or licensed in advanced life support.
 2. Advanced Life Support (ALS) Rescue Aircraft: The medical flight crew has at a minimum one attendant who is an authorized Independent Practice Paramedic, a Registered Nurse, Advanced Practice Provider or Physician who has also obtained training and experience in flight rescue operations.
 3. Basic Life Support (BLS) Rescue Aircraft: The medical flight crew has at a minimum one attendant certified as an EMT who is trained and experienced in rescue flight operations.
 4. Auxiliary Aircraft: An aircraft that does not have a medical flight crew.
 - B. Criteria for EMS Personnel to Staff Air Unit
 1. Paramedic
 - a. When staffing an aircraft based in Ventura County, a paramedic shall be:
 - 1) Accredited in Ventura County in accordance with VCEMS Policy 315, and
 - 2) Authorized as an Independent Practice Paramedic, in accordance with VCEMS Policy 318.
 - b. A Paramedic who meets the requirements of IV.B.1.a.1-2 and is selected to staff a rescue aircraft may work with an EMT.

2. Emergency Medical Technician
 - a. While assigned to work with a paramedic on a Ventura County-based rescue aircraft, an EMT shall:
 - 1) Complete mandatory training requirements outlined in VCEMS Policy 334.
 - 2) Perform duties as described below.
 - b. EMT Duties and Responsibilities
 - 1) Those functions within the EMT Scope of Practice.
 - 2) May transmit information to a Base Hospital regarding paramedic activity and transport information, but may not ask for, receive, or pass on ALS orders.
3. Registered Nurses
 - a. RN with a minimum of two (2) years of experience in a critical care or emergency department setting area within the previous three (3) years, prior to employment with the provider agency.
 - b. Current BLS and ACLS certification from the American Heart Association or equivalent course that meets/exceeds all current minimum ECC/ILCOR guidelines. Nurses staffing the air unit shall also be required to complete the VCEMS Cardiac Arrest Management training course.
 - d. Successful completion of an in-house orientation program provided by the Ventura County Aviation Unit
 - f. Advanced airway training (Endotracheal and Supraglottic Airway Device), as approved by the VCEMS Medical Director.
 - h. Certification in any of the following: Certified Emergency Nurse (CEN); Critical Care Registered Nurse (CCRN); Mobile Intensive Care Nurse (MICN); Certified Nurse Anesthetist (CRNA); Certified Flight Registered Nurse (CFRN); Certified or Transport Nurse (CTRN); Certified Trauma Nurse (TCRN)
 - i. Additional training/certifications as deemed appropriate by Ventura County Aviation Unit leadership, to include Prehospital Trauma Life Support (PHTLS), Trauma Nurse Core Course (TNCC)
 - j. Successful completion of competency assessments
 - 1) Scenario based psychomotor skills assessment conducted by Ventura County Aviation Unit Medical Director or designee
 - 2) Demonstrated proficiency in VCEMS policies and procedures through successful passing of the VCEMS Independent Practice

Paramedic Examination (policy and ECG). The minimum passing score is 80%. Candidates who do not successfully complete either examination with at least an 80% score may reattempt test one additional time. This requirement will be waived for MICNs currently authorized by the Ventura County EMS Agency.

4. Advance Practice Providers (Nurse Practitioner, Physician Assistant)
 - a. Current California License
 - b. Minimum two years' experience in a critical care or emergency department setting
 - c. Successful completion of an in-house orientation program administered by the Ventura County Aviation Unit
 - d. Orientation to the Ventura County Prehospital Care System – including all applicable policies and procedures
 - e. Advanced airway training (Endotracheal and Supraglottic airway device), as approved by the VCEMS Medical Director.
 - f. Additional training/certifications as deemed appropriate by Ventura County Aviation Unit leadership, to include Prehospital Trauma Life Support (PHTLS), Trauma Nurse Core Course (TNCC)
 - g. Demonstrated proficiency in VCEMS policies and procedures through successful passing of the VCEMS Independent Practice Paramedic Examination (policy and ECG). The minimum passing score is 80%. Candidates who do not successfully complete either examination with at least an 80% score may reattempt test one additional time.
 5. Physicians
 - a. Current California Medical License
 - b. Actively practicing Emergency Medicine at a Ventura County hospital
 - c. Successful completion of an in-house orientation program administered by the Ventura County Aviation Unit.
 - d. Orientation to the Ventura County Prehospital Care system – including all applicable policies and procedures
 - e. Physician staffing for the Ventura County Sheriff's Medical Team will be considered at the discretion of the team's medical director.
- D. Training Requirements
1. Initial Education for Medical Flight Crews

All medical flight crew personnel shall receive training in methods of air transportation, including but not limited to the following:

- a. General patient care in-flight.
 - b. Changes in barometric pressure, and pressure related maladies.
 - c. Changes in partial pressure of oxygen.
 - d. Other environmental factors affecting patient care.
 - e. Aircraft operational systems.
 - f. Aircraft emergencies and safety.
 - g. Care of patients requiring special consideration in the airborne environment.
 - h. EMS system and communications procedures.
 - i. Orientation to the Ventura County Prehospital Care system – including all applicable policies and procedures.
 - j. Use of onboard medical equipment.
2. Air Unit service providers will provide documentation of training to VC EMS.
 3. All medical flight crews shall participate in mandatory continuing education requirements as required by their licensure or certification and as defined in VC EMS Policy 334.
 - a. All air unit providers, regardless of the certification which qualifies them to serve on air unit within Ventura County, must attend EMS updates twice yearly.

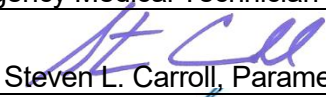

MINOR CHANGES

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| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Emergency Medical Technician Scope of Practice | | Policy Number 300 | |
| APPROVED: EMS Administrator: Steven L. Carroll, Paramedic | | Date: July 1, 2026 | |
| APPROVED: Medical Director: Daniel Shepherd, MD | | Date: July 1, 2026 | |
| Origination Date: August 1998 | | | |
| Date Revised: December 11, 2025 | | Effective Date: July 1, 2026 | |
| Date Last Reviewed: December 11, 2025 | | | |

- I. PURPOSE: To define the scope of practice of an Emergency Medical Technician (EMT) practicing in Ventura County.
- II. AUTHORITY: Health and Safety Code, Section 1797.107, 1797.109, 1797.160, 1797.170, and California Code of Regulations, Title 22, Division 9, Section 100066.02, and 100065.10.
- III. POLICY:
 - A. During training, while at the scene of an emergency and during transport of the sick or injured, or during interfacility transfer, a supervised EMT trainee or certified EMT is authorized to do any of the following:
 1. Evaluate the ill and injured
 2. Render basic life support, rescue and emergency medical care to patients.
 3. Obtain diagnostic signs to include, but not be limited to the assessment of temperature, blood pressure, pulse and respiration rates, pulse oximetry, level of consciousness, and pupil status.
 4. Perform cardiopulmonary resuscitation, including the use of mechanical adjuncts to basic cardiopulmonary resuscitation.
 5. Administer oxygen
 6. Use the following adjunctive airway and breathing aids:
 - a. Oropharyngeal airway
 - b. Nasopharyngeal airway
 - c. Suction devices
 - d. Basic oxygen delivery devices for supplemental oxygen therapy, including but not limited to, humidifiers, partial rebreathers, and venturi masks; and
 - e. Manual and mechanical ventilating devices designed for prehospital use, including continuous positive airway pressure (CPAP) and bilevel positive airway pressure (BiPAP).
 7. Use various types of stretchers and spinal immobilization devices.

8. Provide initial prehospital emergency care of trauma, including, but not limited to:
 - a. Bleeding control through the application of tourniquets;
 - b. Use of hemostatic dressings from a list approved by the California EMS Authority
 - c. Spinal motion restriction or immobilization;
 - d. Seated spinal motion restriction or immobilization;
 - e. Extremity splinting; and
 - f. Traction splinting.
 9. Administer oral glucose or sugar solutions.
 10. Extricate entrapped persons.
 11. Perform field triage.
 12. Transport patients.
 13. Apply mechanical patient restraint
 14. Set up for ALS procedures, under the direction of a Paramedic.
 15. Perform automated external defibrillation
 16. Assist patients with the administration of physician-prescribed devices including, but not limited to, patient-operated medication pumps, sublingual nitroglycerin, and self-administered emergency medications, including epinephrine devices.
- B. In addition to the activities outlined in the EMT Basic Scope of Practice, the VCEMS Medical Director may also establish policies and procedures to allow a certified EMT or a supervised EMT student who is part of the organized EMS System and in the prehospital setting and/or during interfacility transport to:
1. Monitor intravenous lines delivering glucose solutions or isotonic balanced salt solutions including Ringer's lactate for volume replacement. Monitor, maintain, and adjust, if necessary, in order to maintain, a preset rate of flow and turn off the flow of intravenous fluid;
 2. Transfer a patient, who is deemed appropriate for transfer by the transferring physician, and who has nasogastric (NG) tubes, gastrostomy tubes, heparin locks, Foley catheters, tracheostomy tubes and/or indwelling vascular access lines, excluding arterial lines;
 3. Administer naloxone by intranasal and/or intramuscular routes for suspected narcotic overdose;
 4. Administer epinephrine by auto-injector for suspected anaphylaxis and/or severe asthma;
 5. Perform finger stick blood glucose testing, and;
 6. Administer over the counter medications, when approved by the VCEMS medical director, including but not limited to:

- a. Aspirin
- C. During a mutual aid response into another jurisdiction, an EMT may utilize the scope of practice for which s/he is trained and authorized according to the policies and procedures established by VCEMS within the jurisdiction where the EMT is employed as part of the organized EMS system.

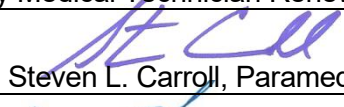

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| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title Emergency Medical Technician Initial Certification | | Policy Number 301 | |
| APPROVED: EMS Administrator: |  Steven L. Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director: |  Daniel Shepherd, M.D. | Date: July 1, 2026 | |
| Origination Date: | June 1, 1984 | | |
| Date Revised: | December 11, 2025 | Effective Date: July 1, 2026 | |
| Date Last Reviewed: | December 11, 2025 | | |

- I. PURPOSE: To identify the procedure for certification of Emergency Medical Technician.
- II. AUTHORITY: California Code of Regulations (CCR) Section 100068 and 100069.02; California Health and Safety Code Sections 1797.50 and 1797.175.
- III. POLICY:
 - A. General Eligibility

An individual who meets one of the following criteria shall be eligible for initial certification:

 1. Pass the cognitive examination and psychomotor skills examination of the National Registry of Emergency Medical Technicians within two (2) years from the date of application for EMT certification, and have:
 - a. A valid EMT course completion record or other documented proof of successful completion of any initial EMT course approved pursuant to Section 100067.02 of the CCR within two (2) years of the date of application, or
 - b. Have documentation of successful completion of an approved out of state initial EMT training course that meets the requirements outlined in Section 100079 of the California Code of Regulations within two (2) years of the date of application, or
 - c. A current and valid out-of-state EMT certificate. OR,
 2. Possess a current and valid National Registry EMT, Advanced EMT, or Paramedic registration certificate, or
 3. Possess a current and valid out-of-state Advanced EMT or Paramedic certificate, or
 4. Possess a current and valid California Advanced EMT certificate or a current and valid California Paramedic license.
 - B. In addition to meeting one of the criteria listen in Section III.A, to be eligible for initial certification, an individual shall:
 1. Be eighteen (18) years of age or older,
 2. Complete a background investigation via "Live Scan" through the California Department of Justice and Federal Bureau of Investigation for VCEMS as the

- requesting agency and a secondary notification for the State of California Emergency Medical Services Authority. Submit a copy of the “Request for Live Scan Services” form as proof the service has been completed,
3. Complete the Ventura County EMS (VCEMS) Personnel Application. VCEMS must be notified within 30 days of any change in personal contact information.
 4. Complete the Ventura County Eligibility Statement (a statement that the individual is not precluded from certification for reasons defined in Section 1798.200 of the Health and Safety Code),
 5. Submit proof of a valid CPR certification by completing **both cognitive and skills testing** through a Professional Rescuer or Healthcare Provider level CPR course, which is consistent with the current American Heart Association Guidelines for CPR and Emergency Cardiovascular Care (ECC),
 6. Provide a current government issued form of identification, and
 7. Pay the established fee
- C. The individual will be issued a wallet size card, pursuant to Section 100344, subdivisions (c) and (d) of Chapter 10 of the CCR, after the above steps are completed and the applicant has passed the criminal background clearance.
1. The effective date of initial certification shall be the day the certificate is issued.
 2. The certification expiration date for an initial EMT certificate shall be the last day of the month two (2) years from the effective date of the initial certification.
 3. An EMT shall only be certified by one (1) certifying entity during a certification period.
 4. It is the responsibility of the certified EMT to notify VCEMS within 7 days of any change in their eligibility status as outlined in Health and Safety Code, Division 2.5, Section 1798.200. (For items that this Section applies to see EMS Personnel Application & Eligibility Statement).

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| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Emergency Medical Technician Renewal and Reinstatement | | Policy Number 302 | |
| APPROVED: EMS Administrator:  Steven L. Carroll, Paramedic | | Date: February 20, 2026 | |
| APPROVED: Medical Director:  Daniel Shepherd, MD | | Date: February 20, 2026 | |
| Origination Date: June 1, 1984 | | Effective Date: February 20, 2026 | |
| Date Revised: December 11, 2025 | | | |
| Date Last Reviewed: December 11, 2025 | | | |

- I. PURPOSE: To identify the procedure for recertification of the Emergency Medical Technician.
- II. AUTHORITY: Health and Safety Code, Sections 1797.220, 1798. California Code of Regulations (CCR), Sections 100069.01 and 100069.02.
- III. POLICY: To maintain certification, an EMT shall participate in either continuing education courses or complete a refresher course approved by the Agency. Approved continuing education courses shall be accepted statewide.
 - A. To renew certification, an EMT shall:
 1. Possess a current EMT Certification issued in California.
 2. Meet one of the following continuing education requirements:
 - a. Successfully complete a twenty-four (24) hour refresher course from an approved EMT training program within the current certification cycle, or
 - b. Complete twenty-four (24) hours of continuing education (CE), within the current certification cycle, from an approved CE provider program, as defined in VCEMS Policy 1130 – Continuing Education Provider Program Approval.
 3. Complete the Ventura County EMS (VCEMS) Personnel Application. VCEMS must be notified within 30 days of any change in personal contact information.
 4. Complete the Ventura County Eligibility Statement (a statement that the individual is not precluded from certification for reasons defined in Section 1798.200 of the Health and Safety Code).
 5. A new applicant to VCEMS, or an applicant whose certification has lapsed (1 year or more), must complete a background investigation via “Live Scan” through the California Department of Justice and Federal Bureau of Investigation for VCEMS as the requesting agency and a secondary notification for the State of California Emergency Medical Services Authority. Submit a copy of the “Request for Live Scan Services” form as proof the service has been completed.
 6. Submit proof of a valid CPR certification by completing **both cognitive and skills testing** through a Professional Rescuer or Healthcare Provider level CPR course,

which is consistent with the current American Heart Association Guidelines for CPR and Emergency Cardiovascular Care (ECC).

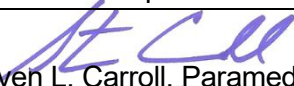

7. Provide a current government issued form of identification.
 8. Pay the established fee.
 9. Submit a completed skills competency verification form, EMSA-SCV (01/17). Skills competency shall be verified by direct observation of an actual or simulated patient contact. Skills competency shall be verified by an individual who is currently certified or licensed as an EMT, AEMT, Paramedic, Registered Nurse, Physician's Assistant, or Physician and who shall be designated by a VCEMS approved CE, EMT, Paramedic training program, or an approved VCEMS provider agency. Verification of skills competency shall be valid for a maximum of two (2) years for the purpose of applying for recertification.
 - a. Starting July 1, 2019, an EMT renewing his or her certification for the first time shall submit documentation of successful completion of the training outlined in Section 100080(a)(B)(6)(A-C) of the California Code of Regulations by an approved EMT training program or approved CE provider program, which includes training in the administration of naloxone, epinephrine, and the use of finger stick blood glucose testing by a glucometer.
 - b. If an individual possesses a current California-issued paramedic license or California Advanced EMT certificate, the individual need not comply with III.A.9.a.
- B. The individual will be issued a wallet size certificate card, pursuant to Section 100221.01, subdivisions (c) and (d), of Chapter 9 of the CCR, after the above renewal requirements are completed.
- C. If the EMT renewal requirements are met within six (6) months prior to the expiration date, VCEMS shall make the effective date of recertification the date immediately following the expiration date of the current certificate. The certificate will expire two (2) years from the day prior to the effective date.
- D. If the EMT renewal requirements are met greater than six (6) months prior to the expiration date, VCEMS shall make the effective date of renewal the date the certificate was issued. The certification expiration date will be the last day of the month two (2) years from the effective date.
- E. A California certified EMT who is a member of the Armed Forces of the United States and whose certification expires while deployed on active duty, or whose certification expires less than six (6) months from the date they return from active-duty deployment, with the Armed Forces of the United States shall have six (6) months from the date they return from active-

duty deployment to complete the requirements outlined in Section III.A.2-9 of this policy. To qualify for this exception, the individual shall:

1. Submit proof of their membership in the Armed Forces of the United States, and
2. Submit documentation of their deployment starting and ending dates.
3. Continuing education credit may be given for documented training in any of the topics contained in the current National Standard Curricula for training EMS personnel, While the individual was deployed on active duty.
4. The continuing education documentation shall include verification from the individual's Commanding Officer attesting to the training attended.

F. Reinstatement of an Expired California EMT Certificate.

1. The following requirements apply to individuals who wish to be eligible for reinstatement after their California EMT certificate has expired:
 - a. For a lapse of less than six (6) months, the individual shall complete the requirements outlined in Section III.A.2-9 of this policy.
 - b. For a lapse of six (6) months or more, but less than twelve (12) months, the individual shall:
 - 1) Complete the requirements outlined in Section III.A.2-9 of this policy.
 - 2) Complete an additional twelve (12) hours of continuing education.
 - c. For a lapse of twelve (12) months or more, the individual shall:
 - 1) Complete the requirements outlined in Section III.A.2-9 of this policy.
 - 2) Complete an additional twenty-four (24) hours of continuing education.
 - 3) Possess a current and valid NREMT certificate, unless the individual possesses a current and valid EMT, AEMT or paramedic National Registry Certificate or a current and valid AEMT certificate or paramedic license.

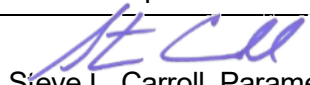

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| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: EMT Optional Skills | | Policy Number 303 | |
| APPROVED: EMS Administrator: |  Steven L. Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director: |  Daniel Shepherd, MD | Date: July 1, 2026 | |
| Origination Date: | July 13, 2017 | | |
| Date Revised: | December 11, 2025 | Effective Date: July 1, 2026 | |
| Date Last Reviewed: | December 11, 2025 | | |

- I. PURPOSE: To define the process related to authorizing EMT optional skills and EMT trial studies.
- II. AUTHORITY: Health and Safety Code, Section 1797.107, 1797.109, 1797.160, 1797.170, and California Code of Regulations, Title 22, Division 9, Section 100065.10.
- III. POLICY:
 - A. In addition to the basic and expanded skills outlined in VCEMS Policy 300 – EMT Scope of Practice, the VCEMS Medical Director may establish policies and procedures for local accreditation of an EMT student or certified EMT to perform any or all of the following optional skills specified in this policy. Accreditation for EMTs to practice optional skills shall be granted in accordance with VCEMS Policy 305 – EMT Accreditation, and will be limited to those whose:
 1. EMT certification is active,
 2. have completed the minimum required education and training outlined in this policy, and
 3. are employed by a VCEMS approved optional skills provider.
 - B. Use of perilaryngeal airway adjuncts
 1. Training in the use of perilaryngeal airway adjuncts shall consist of not less than five (5) hours to result in the EMT being competent in the use of the device and airway control. Included in the above training hours shall be the following topics and skills:
 - a. Anatomy and physiology of the respiratory system.
 - b. Assessment of the respiratory system.
 - c. Review of basic airway management techniques, which includes manual and mechanical.
 - d. The role of the perilaryngeal airway adjuncts in the sequence of airway control.
 - e. Indications and contraindications of the perilaryngeal airway adjuncts.
 - f. The role of pre-oxygenation in preparation for the perilaryngeal airway adjuncts.

- g. Perilaryngeal airway adjuncts insertion and assessment of placement.
 - h. Methods for prevention of basic skills deterioration.
 - i. Alternatives to the perilaryngeal airway adjuncts.
 2. At the completion of initial training a student shall complete a competency-based written and skills examination for airway management which shall include the use of basic airway equipment and techniques and use of perilaryngeal airway adjuncts.
- C. Administration of epinephrine by prefilled syringe and/or drawing up the proper drug dose into a syringe for suspected anaphylaxis and/or severe asthma.
 1. Training in the administration of epinephrine by prefilled syringe and/or drawing up the proper drug dose into a syringe for suspected anaphylaxis and/or severe asthma shall consist of no less than two (2) hours to result in the EMT being competent in the use and administration of epinephrine by prefilled syringe and/or drawing up the proper drug dose into a syringe and managing a patient of a suspected anaphylactic reaction and/or experiencing severe asthma symptoms. Included in the training hours listed above shall be the following topics and skills:
 - a. Names
 - b. Indications and contraindications
 - c. Complications
 - d. Side/adverse effects and interactions
 - e. Routes of administration
 - f. Dosage calculation
 - g. Mechanisms of drug actions
 - h. Medical asepsis
 - i. Disposal of contaminated items and sharps
 - j. Medical administration
 2. At the completion of this training, the student shall complete a competency based written and skills examination for the use and/or administration of epinephrine by prefilled syringe and/or drawing up the proper drug dose into a syringe, which shall include:
 - a. Assessment of when to administer epinephrine,
 - b. Managing a patient before and after administering epinephrine,
 - c. Using universal precautions and body substance isolation procedures during medication administration,
 - d. Demonstrating aseptic technique during medication administration,
 - e. Demonstrating preparation and administration of epinephrine by prefilled syringe and/or drawing up the proper drug dose into a syringe, and

- f. Proper disposal of contaminated items and sharps
- D. Administration of the following medications through the use of an auto-injector for the purposes of treating exposure to a nerve agent:
 1. Atropine
 2. Pralidoxime Chloride
 3. In addition to a basic weapons of mass destruction training, the nerve agent antidote training shall consist of no less than two (2) hours of didactic and skills training to result in competency. Training in the profile of the medications contained in the DuoDote/Mark I auto-injector and atropine auto-injector shall include, but not limited to:
 - a. Indications and contraindications
 - b. Side/adverse effects
 - c. Routes of administration
 - d. Dosages
 - e. Mechanisms of drug action
 - f. Disposal of contaminated items and sharps
 - g. Medication administration
 4. At the completion of this training, the student shall complete a competency based written and skills examination for the administration of the Duo-dote/Mark I and atropine auto-injector.
 - a. Assessment of when to administer the auto-injector,
 - b. Managing a patient before and after administering the auto-injector
 - c. Using the universal precautions and body substance isolation precautions during medication administration,
 - d. Demonstrating aseptic technique during medication administration,
 - e. Demonstrating the preparation and administration of medications by the intramuscular (IM) route, and
 - f. Proper disposal of contaminated items and sharps.
- E. Competency training in procedures and skills for all EMT optional skills shall be completed at least every two (2) years. At a minimum, ongoing training and demonstration of competency shall be comprised of the following:
 1. Review of indications and contraindications
 2. Patient assessment and management before and after medication administration
 3. Demonstration of appropriate aseptic technique
 4. Appropriate preparation and administration of the medication by the intramuscular route utilizing the Ventura County EMS psychomotor skills evaluation form

5. Demonstration of proper disposal of contaminated items sharps.
- F. VCEMS shall develop and maintain a plan for each EMT optional skill allowed. This plan will include:
1. A description of the need for use of the optional skill
 2. A description of the geographic area within which the optional skills will be utilized
 3. A description of the data collection methodology which shall also include an evaluation of the effectiveness of the optional skill
 4. The policies and procedures to be instituted by the LEMSA regarding medical control and use of the optional skill
- G. For an accredited EMT who fails to demonstrate competency in any of the optional skills outlined in this policy:
1. EMT accreditation shall be immediately suspended pending clinical remediation
 2. Employer agency will submit a written plan of action to VCEMS to include: method of remediation, course curriculum, date(s) and location(s) of remediation training.
 3. VCEMS will review and approve written plan of action prior to commencement of remediation training
 4. Once complete, evidence of satisfactory training and minimum competency in the optional skills will be submitted to VCEMS prior to the reinstatement of the EMT accreditation.

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| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: EMT Optional Skills Plan | | Policy Number 303-B | |
| APPROVED: EMS Administrator: |  Steve L. Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director: |  Daniel Shepherd, MD | Date: July 1, 2026 | |
| Origination Date: | September 14, 2023 | Effective Date: July 1, 2026 | |
| Date Revised: | December 11, 2025 | | |
| Date Last Reviewed: | December 11, 2025 | | |

- I. PURPOSE: This plan is intended to outline the optional skills utilized by EMTs, in accordance with VCEMS Policies and Procedures.
- II. AUTHORITY: California Health and Safety Code 1797.80, 1797.184, 1797.214, 1798; California Code of Regulations, Title 22, Sections 100065.09 and 100065.10
- III. PLAN:
 - A. Skills Allowed
 1. Certified EMTs, accredited in Ventura County in accordance with policy 305, will be allowed to perform the following optional skills:
 - a. Use of perilaryngeal airway adjuncts.
 - b. Administration of epinephrine by prefilled syringe and/or drawing up the proper drug dose into a syringe for suspected anaphylaxis and/or severe asthma
 - c. Administration of atropine and/or pralidoxime chloride using prepackaged products
 2. In order to perform the allowed optional skills a certified EMT must be:
 - a. employed by an agency that is authorized by VCEMS and that delivers prehospital care as part of the organized EMS system, and
 - b. must be accredited by Ventura County EMS in accordance with VCEMS Policy 305 – EMT Accreditation to Practice.
 3. In order to acquire accreditation EMTs must complete, and provide completion of, the training requirements detailed in VCEMSA policy 303 - EMT Optional Skills and section 100064 of the California Code of Regulations, as well as any additional mandatory training requirements outlined in VCEMS Policy 334 – Prehospital Personnel Mandatory Training Requirements. In addition, the EMT shall complete the accreditation process detailed in policy 305 - EMT Optional Skills Accreditation.

B. Need for Optional Skills

1. The optional skills listed above allow EMTs in Ventura County to perform critical, potentially lifesaving, interventions. The allowed skills are narrow in scope, but when indicated, should be performed as quickly as possible. The available research suggests that appropriately trained EMTs can perform these interventions safely and effectively.

C. Geographic Area of Skills Deployment


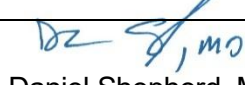
1. EMTs accredited to perform optional skills by VCEMS, in accordance with policies 303 and 305, and who work for authorized prehospital provider agencies, will be allowed to do so in all operational areas of the County.

D. Data Collection

1. Any EMT performing optional skills must document the intervention in the Ventura County Electronic Patient Care Report (VCePCR) in accordance with VCEMS Policy 1000 - Documentation of Prehospital Care
2. Optional skills will be monitored as part of VCEMS's quality improvement program (EMSQIP). All uses of optional skills will be reviewed to ensure they are performed safely and effectively.

E. Applicable Policies and Procedures

1. 303 - EMT Optional Skills
2. 305 - EMT Optional Skills Accreditation
3. 334 - Prehospital Personnel Mandatory Training Requirements
4. 705.02 - Allergic Reaction and Anaphylaxis
5. 705.17 - Nerve agent / Organophosphate Poisoning
6. 705.22 - Shortness of Breath – Wheezes/other
7. 710 - Airway Management
8. 733 - Cardiac Arrest Management (CAM) and Post Arrest (ROSC) Resuscitation
9. 1000 - Documentation of Prehospital Care

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| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: EMT Course Completion by Challenge Examination | | Policy Number 304 | |
| APPROVED: EMS Administrator: |  Steve L. Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director: |  Daniel Shepherd, MD | Date: July 1, 2026 | |
| Origination Date: | June 1, 1984 | | |
| Date Revised: | December 11, 2025 | Effective Date: July 1, 2026 | |
| Date Last Reviewed: | December 11, 2025 | | |

- I. PURPOSE: To identify the procedure for certification of the Emergency Medical Technician by challenge examination.
- II. AUTHORITY: California Code of Regulations (CCR) Title 22, Division 9, Article 1, Sections 100067.02, 100067.14 – and Health and Safety Code Sections 1797.107, 1797.170, 1797.208 and 1797.210.
- III. POLICY:
 - A. General Eligibility

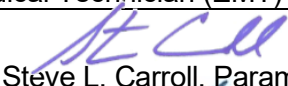

An individual may obtain an EMT course completion record from an approved EMT training program by successfully passing by pre-established standards, developed and/or approved by the Ventura County EMS Agency in accordance with Section 100067.02 of the CCR, a course challenge examination if s/he meets the following eligibility requirements:

 1. Submit proof of a valid CPR certification by completing **both cognitive and skills testing** through a Professional Rescuer or Healthcare Provider level CPR course, which is consistent with the current American Heart Association Guidelines for CPR and Emergency Cardiovascular Care (ECC); AND,
 2. Be currently licensed in the United States as a Physician, Registered Nurse, Physician Assistant, Vocational Nurse or Licensed Practical Nurse; OR,
 3. The individual provides documented evidence of having successfully completed an emergency medical service training program of the Armed Forces of the United States within the preceding two (2) years that meets the U.S. DOT National EMS Education Standards (DOT HS 811 077A, January 2009). Upon review of documentation, the EMT certifying entity may also allow an individual to challenge if the individual was active in the last two (2) years in a prehospital emergency medical classification of the Armed Services of the United States, which does not have formal recertification requirements. These individuals may be required to take a refresher course or

complete CE courses as a condition of certification.

B. Challenge Process

1. An approved EMT training program shall have a defined process for any EMT challenge request/application and shall offer the EMT challenge skills and written examination in conjunction with regularly scheduled testing times.
2. The course challenge examination shall consist of a competency based written and skills examination to test knowledge of the topics and skills per CCR 100067.14.
3. An eligible individual shall be permitted to take the EMT course challenge examination only one (1) time.
 - a. An individual who fails to achieve a passing score on the EMT course challenge examination shall successfully complete an EMT course to receive an EMT course completion record.
 - b. Upon successful completion of the written and skills challenge examination, the challenge applicant will be eligible to take the National Registry written examination.
4. Proof of passing the cognitive and psychomotor skills examination of the National Registry of Emergency Medical Technicians will make the applicant eligible to apply for EMT certification in California, in accordance with VCEMS Policy 301 – EMT Initial Certification.

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| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Emergency Medical Technician (EMT) Optional Skills Accreditation | | Policy Number 305 | |
| APPROVED: Administration: |  Steve L. Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director: |  Daniel Shepherd, M.D. | Date: July 1, 2026 | |
| Origination Date: | September 14, 2023 | Effective Date: July 1, 2026 | |
| Date Revised: | December 11, 2025 | | |
| Date Last Reviewed: | December 11, 2025 | | |

- I. PURPOSE: To establish a mechanism for an EMT to become accredited to practice Optional Skills in Ventura County. The purpose of accreditation is to ensure that the EMT:
 - A. Completed the minimum required education and training, and
 - B. Is oriented to the local EMS system, and
 - C. Adheres to the standards and guidelines outlined in all applicable VCEMS policies and procedures.
- II. AUTHORITY: California Health and Safety Code 1797.80, 1797.184, 1797.214, 1798; California Code of Regulations, Title 22, Sections 100065.09 and 100065.10.
- III. POLICY:
 - A. An EMT must be accredited by the Ventura County EMS Agency (VCEMS) in order to perform EMT optional skills.
 - B. An EMT must be employed by an VCEMS approved optional skills provider in order to practice.
- IV. PROCEDURE:
 - A. Application
 1. In order to be eligible for accreditation, the EMT applicant will:
 - a. Possess a current and valid California EMT certification;
 - b. Provide written documentation of employment with a prehospital provider agency that is approved by VCEMS
 - c. Complete a VCEMS personnel application form, if not already on file with VCEMS
 - d. Verification by employer that all training and education related to the EMT optional skills outlined in VCEMS Policy 303 – EMT Optional Skills has been completed.
 - e. This will include any skills approved by VCEMS Medical Director that are added to the policy in the future.

B. Accreditation

1. Upon successful completion of the application and training requirements, the EMT will be issued an accreditation letter. A copy will be placed in VCEMS certification file for tracking purposes.
2. The accreditation cycle will be the same as the individuals EMT certification, as long as all maintenance requirements are current.

C. Paramedics functioning as EMTs

1. Paramedics licensed in the State of California who function as EMTs and who are employed by a VCEMS approved prehospital provider agency shall be granted EMT accreditation upon completion of the following:
 - a. Verification by employer that all training and education requirements have been met.
 - b. Submission of a VCEMS personnel application if not already on file.

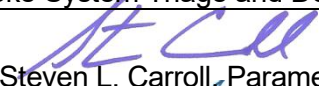

D. Accreditation Period

1. EMT accreditation shall be continuous as long as the following conditions are met:
 - a. Maintain current certification/licensure in the State of California, and
 - b. Maintain continuous employment with a VCEMS approved prehospital provider agency, and
 - c. Completion of all ongoing mandatory training requirements outlined in VCEMS Policies 303 – EMT Optional Skills and in VCEMS Policy 334 – Mandatory Training Requirements outlined in VCEMS

E. Lapse of Accreditation

1. EMT accreditation will be considered lapsed when any of the following circumstances occur:
 - a. An EMT is longer employed by a VCEMS approved prehospital provider agency, or
 - b. Certification or licensure as an EMT or Paramedic lapses, or
 - c. An individual fails to meet the minimum requirements outlined in this policy.
2. If EMT accreditation lapses, the following requirements shall be submitted to VCEMS in order to reestablish eligibility:
 - a. Verification of employment by a VCEMS approved prehospital provider agency.
 - b. Verification that certification / licensure as an EMT or Paramedic in the State of California is current and valid.

- c. Verification by employer that all mandatory training requirements have been completed, to include demonstration of psychomotor skills proficiency in approved optional skills.

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| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Stroke System Triage and Destination | | Policy Number 451 | |
| APPROVED: EMS Administrator:  Steven L. Carroll, Paramedic | | Date: July 1, 2026 | |
| APPROVED: Medical Director:  Daniel Shepherd, MD | | Date: July 1, 2026 | |
| Origination Date: October 11, 2012 | | Effective Date: July 1, 2026 | |
| Date Revised: September 24, 2025 | | | |
| Date Last Reviewed: September 24, 2025 | | | |

- I. **PURPOSE:** To outline the process of pre-hospital triage and transport of suspected acute stroke patients to facilities designated as an Acute Stroke Center (ASC) or a Thrombectomy Capable Acute Stroke Center (TCASC).
- II. **AUTHORITY:** California Health and Safety Code Sections 1797.220 and 1798, California Code of Regulations, Title 22, Division 9, Sections 100147, and 100169.
- III. **DEFINITIONS:**
 - Acute Stroke Center (ASC):** Hospital designated as an Acute Stroke Center, as defined in VCEMS Policy 450.
 - Comprehensive Stroke Center (CSC):** Hospital certified by either The Joint Commission, Det Norske Veritas, or the Healthcare Facilities Accreditation Program as a Comprehensive Stroke Center.
 - Large Vessel Occlusion (LVO):** An acute ischemic stroke caused by a large vessel occlusion.
 - LVO Alert:** A pre-arrival notification by pre-hospital personnel to the base hospital that a patient is suffering a possible LVO ischemic stroke.
 - Stroke Alert:** A pre-arrival notification by prehospital personnel that a patient is suffering a possible acute stroke.
 - Thrombectomy Capable Acute Stroke Center: (TCASC)** Acute Stroke Center (ASC) that has the capability to perform neuroendovascular procedures for acute stroke including thrombectomy and intra-arterial thrombolysis.
 - Time Last Known Well (TLKW):** The date/time at which the patient was last known to be without the current signs and symptoms or at his or her baseline state of health.
 - Ventura LVO Score (VES):** A tool designed for paramedics to screen for an LVO in the prehospital setting.
- IV. **POLICY:**
 - A. **Stroke System Triage:** Patients meeting criteria listed below shall be triaged into the VCEMS stroke system.
 1. Patient's TLKW is within 24 hours.

2. Blood Glucose is greater than sixty (60) OR patient continues to exhibit signs and symptoms of an acute stroke after pre-hospital treatment of abnormal blood glucose levels.

3. Identification of ANY abnormal finding of the Cincinnati Prehospital Stroke Scale (CPSS):

FACIAL DROOP

- Normal: Both sides of face move equally
- Abnormal: One side of face does not move normally

ARM DRIFT

- Normal: Both arms move equally or not at all
- Abnormal: One arm does not move, or one arm drifts down compared with the other side

SPEECH

- Normal: Patient uses correct words with no slurring
- Abnormal: Slurred or inappropriate words or mute

4. Perform the Ventura LVO Score (VES) on all patients who have abnormal CSS findings.

Forced Eye Deviation (1 point):

- Force full deviation of BOTH eyes to one side or the other
- Eyes will not pass midline

Aphasia (1 point): Patient is awake with ANY of the following present

- *Repetition:* Unable to repeat a sentence (“Near the chair in the dining room.”)
- *Naming:* Unable to name an object (show a watch and a pen, ask patient to name the objects)
- *Mute:* Ask the patient 2 Questions (What is your name? How old are you?)
- *Talking gibberish and/or not following commands*

Neglect (1 point):

- Touch the Patient’s right arm and ask if they can feel it.
- Touch the Patient’s left arm and ask if they feel it.
- Now touch both of the Patient’s arms simultaneously and ask the patient which side you touched.
- If patient can feel both sides individually, but only feels one side on simultaneous stimulation, this is neglect.
- If Aphasic: Neglect can be evaluated by noticing that patient is not paying

attention to you if you stand on one side but pays attention to you if you stand on the other side.

Obtundation: (1 point)



- Not staying awake in between conversation

- B. **Stroke Alert** = TLKW is within 24 hours, BG is greater than 60, & Abnormal CPSS
1. For a *Stroke Alert*, Base Hospital Contact (BHC) will be established with the regular catchment Base Hospital (BH) and a *Stroke Alert* will be activated.
 2. The BH will notify the appropriate ASC of the *Stroke Alert*.
- C. **LVO Alert** = TLKW is within 24 hours, BG is greater than 60, & CSS is +3 with VES ≥ 1
1. For an *LVO Alert*, BHC will be established with the appropriate TCASC.
 - a. East of Lewis Rd in Camarillo is LRRMC.
 - b. West of Lewis Rd in Camarillo is SJRMC.
 2. The appropriate specialist on-call will be notified by the MICN.
- D. Destination Decision
1. The BH will determine the nearest ASC or TCASC using the following criteria:
 - a. Patient condition
 - b. TCASC or ASC availability on ReddiNet
 - c. Transport time
 - d. Patient request
 2. Patients meeting stroke system criteria shall be transported to the nearest ASC/TCASC, except in the following cases:
 - a. Stroke patients in cardiac arrest shall be transported to the nearest receiving hospital. Patients who have greater than thirty seconds of return of spontaneous circulation (ROSC) shall be transported to the nearest STEMI Receiving Center (SRC).
 - b. The nearest ASC is incapable of accepting a stroke alert patient due to CT or Internal Disaster diversion, then transport to the next closest ASC.
 - c. The patient requests transport to an alternate facility, not extending transport by more than twenty (20) minutes, and approved by the BH.
 - d. Patients meeting *LVO Alert* criteria will be transported to the nearest TCASC if **total** transport time does not exceed 45 minutes. If nearest TCASC is on TCASC Diversion, then transport to the next closest TCASC.
- E. Upon Arrival to ASC/TCASC: You may be asked to take your patient directly to the CT scanner.
1. Give report to the nurse, transfer the patient from your gurney onto the CT scanner platform, and then return to service.

2. If there is any delay, such as CT scanner not readily available, or a nurse not immediately available, you will not be expected to wait. You will take the patient to a monitored bed in the ED and give report as usual.

F. Documentation

1. Care and findings related to an acute stroke patient shall be documented in the Ventura County electronic patient care reporting (VCePCR) system in accordance with VCEMS policy 1000.

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| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: BLS And ALS Unit Equipment And Supplies | | Policy Number: 504 | |
| APPROVED: Administration: |  Steven L. Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director |  Daniel Shepherd, MD | Date: July 1, 2026 | |
| Origination Date: | May 24, 1987 | Effective Date: July 1, 2026 | |
| Date Revised: | April 9, 2026 | | |
| Last Reviewed: | April 9, 2026 | | |

- I. PURPOSE: To provide a standardized list of equipment and supplies for response and/or transport units in Ventura County.
- II. POLICY: Each response and/or transport unit in Ventura County shall be equipped and supplied according to the requirements of this policy.
- III. AUTHORITY: California Health and Safety Code Section 1797.178, 1797.204, 1797.218, 1797.221 and California Code of Regulations Sections 100066.02, 100091.02, 100091.03, 100091.04, 100096.03
- IV. DEFINITIONS:
 - BLS – Basic Life Support Unit
 - ALS – Advanced Life Support Unit
 - PSV – Paramedic Support Vehicle or Paramedic Supervisor Vehicle
 - CCT – Critical Care Transport Unit
 - BLS Command – Basic Life Support Staffed Command Vehicle
 - FR/ALS – First Responder Advanced Life Support Unit
 - VCAU – Ventura County Aviation Unit
- V. PROCEDURE:
 - 1. The following equipment and supplies shall be maintained on each response and/or transport unit in Ventura County.
 - 2. Deviation from the standards outlined in this policy shall only be authorized with written approval (see 504 Waiver Request form) from the VCEMS Medical Director. Mitigation attempts should be documented in the comment section on the waiver request form, such as what vendors were contacted, etc.

| | BLS Unit Minimum Amount | BLS Command Minimum Amount | ALS Unit Minimum Amount | PSV/CCT Minimum Amount | FR/ALS Minimum Amount | VCAU Minimum Amount |
|---|---|----------------------------|---|-------------------------------------|-------------------------------------|-------------------------------------|
| A. ALL BLS AND ALS RESPONSE AND/OR TRANSPORT UNITS | | | | | | |
| Bag valve units with appropriate masks <ul style="list-style-type: none"> • Adult (1,000 mL) • Child (500 mL) • Infant (240 mL) | 1 Each Size | 1 Each Size | 1 Each Size | 1 Each Size | 1 Each Size | 1 Adult |
| Nasal cannula | 3 Adult | 3 Adult | 3 Adult | 3 Adult | 3 Adult | 3 Adult |
| Nasopharyngeal airway <ul style="list-style-type: none"> • 14 French • 18 French • 20 French • 22 French • 24 French • 26 French • 28 French • 32 French • 34 French • 36 French | 1 Each Size | 1 Each Size | 1 Each Size | 1 Each Size | 1 Each Size | 1 Each Size |
| Continuous positive airway pressure / Bi-level Positive Airway Pressure (CPAP/BiPaP) device | 1 Child 1 Small Adult 1 Adult | Optional | 1 Child 1 Small Adult 1 Adult | 1 Child 1 Small Adult 1 Adult | 1 Child 1 Small Adult 1 Adult | 1 Child 1 Small Adult 1 Adult |
| Nerve Agent Antidote (DuoDote Auto-Injector) | Optional | Optional | 3 | 3 | 3 | Optional |
| Blood glucose determination devices | 1 | Optional | 2 | 1 | 1 | 1 |
| Occlusive Dressing or Chest Seal | 5 | 5 | 5 | 5 | 5 | 5 |
| Oral glucose 15 g unit dose | 1 | 1 | 1 | 1 | 1 | 1 |
| Oropharyngeal Airways <ul style="list-style-type: none"> • 40 mm (Size 00) • 50 mm (Size 0) • 60 mm (Size 1) • 70 mm (Size 2) • 80 mm (Size 3) • 90 mm (Size 4) • 100 mm (Size 5) • 110 mm (Size 6) | 1 Each Size | 1 Each Size | 1 Each Size | 1 Each Size | 1 Each Size | 1 Each Size |
| Oxygen with appropriate adjuncts (portability required) | 15 L/min for 20 mins (40 mins for transport units) | 15 L/min for 20 mins | 15 L/min for 20 mins (40 mins for transport units) | 15 L/min for 20 mins | 15 L/min for 20 mins | 15 L/min for 20 mins |
| Portable suction equipment | 1 | 1 | 1 | 1 | 1 | 1 |
| Nonrebreather oxygen_masks <ul style="list-style-type: none"> • Adult • Child • Infant | 3 3 2 | 2 2 2 | 3 3 2 | 2 2 2 | 2 2 2 | 2 2 2 |
| Bandage scissors | 1 | 1 | 1 | 1 | 1 | 1 |

| | BLS Unit Minimum Amount | BLS Command Minimum Amount | ALS Unit Minimum Amount | PSV/CCT Minimum Amount | FR/ALS Minimum Amount | VCAU Minimum Amount |
|---|-------------------------|----------------------------|-------------------------|------------------------|-----------------------|---------------------|
| Bandages | | | | | | |
| • 4"x4" sterile compresses or equivalent | 12 | 12 | 12 | 12 | 12 | 5 |
| • 2",3",4" or 6" roller bandages | 6 | 2 | 6 | 2 | 2 | 4 |
| • 10"x 30" or larger dressing | 2 | 0 | 2 | 0 | 0 | 2 |
| Blood pressure cuffs: Thigh, Adult, Child, Infant | 1 Each Size | 1 Each Size | 1 Each Size | 1 Each Size | 1 Each Size | 1 Each Size |
| Emesis basin/bag | 1 | 1 | 1 | 1 | 1 | 1 |
| Flashlight | 1 | 1 | 1 | 1 | 1 | 1 |
| Traction splint or equivalent device | 1 | N/A | 1 | 1 | 1 | 1 |
| Pneumatic or rigid splints (capable of splinting all extremities) | 4 | N/A | 4 | 4 | 4 | 4 |
| Potable water or saline solution | 4 Liters | N/A | 4 Liters | 4 Liters | 4 Liters | 4 Liters |
| Cervical collar | 2 | N/A | 2 | 2 | 2 | 2 |
| Spinal immobilization backboard: 60" minimum with at least 3 sets of straps | 1 | N/A | 1 | N/A | 1 | 1 |
| Sterile obstetrical kit | 1 | 1 | 1 | 1 | 1 | 1 |
| Tongue depressor | 4 | Optional | 4 | Optional | Optional | Optional |
| Cold packs | 4 | 2 | 4 | 4 | 4 | 4 |
| Eye Shield | 2 | N/A | 2 | 2 | 2 | 2 |
| Tourniquet | 2 | 2 | 2 | 2 | 2 | 2 |
| 1 mL,5 mL, and 10 mL syringes with IM needles | N/A | N/A | 4 | 4 | 4 | 4 |
| Automated External Defibrillator | 1 | 1 | N/A | N/A | N/A | N/A |
| Manual Defibrillator | N/A | N/A | 1 | 1 | 1 | 1 |
| Defibrillator pads | 2 Adult 2 Peds | 2 Adult 2 Peds | 2 Adult 2 Peds | 2 Adult 2 Peds | 2 Adult 2 Peds | 2 Adult 2 Peds |
| Stethoscope | 1 | 1 | 1 | 1 | 1 | 1 |
| Cellular telephone | 1 | 1 | 1 | 1 | 1 | 1 |
| CO ₂ monitor | | | | | | |
| • Infant (<0.5 mL sidestream or <1 mL mainstream adaptor) | Optional | Optional | 2 Each Size | 2 Each Size | 2 Each Size | 2 Each Size |
| • Pediatric / Adult (6.6 mL sidestream or < 5 mL mainstream adaptor) | | | | | | |
| CO ₂ monitor | | | | | | |
| • Adult size EtCO ₂ sampling nasal cannula | Optional | Optional | 1 Each Size | 1 Each Size | 1 Each Size | 1 Each Size |
| • Pediatric size EtCO ₂ sampling nasal cannula | | | | | | |
| Pediatric length and weight tape | 1 | 1 | 1 | 1 | 1 | 1 |
| Intranasal mucosal atomization device | Optional | Optional | 2 | 2 | 2 | 2 |
| SpO ₂ Monitor (If not attached to cardiac monitor) | 1 | 1 | 1 | 1 | 1 | 1 |
| SpO ₂ Adhesive Sensor (Adult, Pediatric, Infant) | Optional | Optional | 1 Each Size | 1 Each Size | 1 Each Size | 1 Each Size |
| Thermometer | 1 | Optional | 1 | 1 | 1 | Optional |
| Personal Protective Equipment per State Guideline #216 | | | | | | |
| • Rescue helmet | 2 | | 2 | 1 | | |
| • EMS jacket | 2 | | 2 | 1 | | |
| • Work goggles | 2 | | 2 | 1 | | |
| • Tyvek suit | 2 L / 2 XXL | | 2 L / 2 XXL | 1 L / 1 XXL | N/A | N/A |
| • Tychem hooded suit | 2 L / 2 XXL | N/A | 2 L / 2 XXL | 1 L / 1 XXL | | |
| • Nitrile gloves | 1 Med / 1 XL | | 1 Med / 1 XL | 1 Med / 1 XL | | |
| • Disposable footwear covers | 1 Box | | 1 Box | 1 Box | | |
| • Leather work gloves | 3 L Sets | | 3 L Sets | 1 L Set | | |
| • Field operations guide | 1 | | 1 | 1 | | |

| | BLS Unit Minimum Amount | BLS Command Minimum Amount | ALS Unit Minimum Amount | PSV/CCT Minimum Amount | FR/ALS Minimum Amount | VCAU Minimum Amount |
|---|-------------------------------|-------------------------------------|-------------------------------|------------------------------|-----------------------------|---------------------------|
| OPTIONAL EQUIPMENT (No minimums apply) | | | | | | |
| Hemostatic gauze per EMSA guidelines | | | | | | |

| | BLS Unit Minimum Amount | BLS Command Minimum Amount | ALS Unit Minimum Amount | PSV/CCT Minimum Amount | FR/ALS Minimum Amount | VCAU Minimum Amount |
|---|-------------------------------|-------------------------------------|-------------------------------|------------------------------|-----------------------------|---------------------------|
| B. TRANSPORT UNIT REQUIREMENTS | | | | | | |
| Ambulance gurney | 1 | N/A | 1 | N/A | N/A | N/A |
| Collapsible stretcher or flat | 1 | N/A | 1 | N/A | N/A | 2 |
| KED or equivalent (One required for transport units) | 1 | N/A | 1 | N/A | N/A | N/A |
| Straps to secure the patient to the stretcher or ambulance cot and means of securing the stretcher or ambulance cot in the vehicle. | 1 Set | N/A | 1 Set | N/A | N/A | 1 Set |
| Powered portable suction unit | 1 | N/A | 1 | N/A | N/A | N/A |
| Soft ankle and wrist restraints | 1 Set of Each | N/A | 1 Set of E ac h | N/A | N/A | N/A |
| Sheets, pillowcases, blankets and towels for each stretcher or ambulance cot, and two pillows for each ambulance | 1 | N/A | 1 | N/A | N/A | N/A |
| Bedpan | 1 | N/A | 1 | N/A | N/A | N/A |
| Urinal | 1 | N/A | 1 | N/A | N/A | N/A |

| | BLS Unit Minimum Amount | BLS Command Minimum Amount | ALS Unit Minimum Amount | PSV/CCT Minimum Amount | FR/ALS Minimum Amount | VCAU Minimum Amount |
|---|-------------------------|----------------------------|---|---|---|---|
| C. ALS UNIT REQUIREMENTS | | | | | | |
| Supraglottic Airway Devices: I-Gel with passive oxygenation port Sizes: 1, 1.5, 2, 2.5, 3, 4, 5 | N/A | N/A | 2 Each Size | 2 Each Size | 2 Each Size | 2 Each Size |
| I-Gel Airway Support Straps | N/A | N/A | 2 | 2 | 2 | 2 |
| Arm Boards • 9" • 18" | N/A | N/A | 3 3 | 0 0 | 1 1 | 0 0 |
| Colorimetric CO2 Detector Device | N/A | N/A | 1 | 1 | 1 | 1 |
| ECG Electrodes | N/A | N/A | 10 sets | 3 sets | 3 sets | 6 sets |
| Endotracheal tubes with stylets, Sizes: 6.0, 6.5, 7.0, 7.5, 8.0 | N/A | N/A | 1 Each Size | 1 Each Size | 1 Each Size | 1 Each Size |
| EZ-IO intraosseous infusion system | N/A | N/A | 1 Each Size | 1 Each Size | 1 Each Size | 1 Each Size |
| IV admin set - macrodrip | N/A | N/A | 8 | 4 | 4 | 4 |
| IV catheter, Sizes: 14, 16, 18, 20, 22, 24 | N/A | N/A | 6: 14, 16, 18, 20 3: 22 3: 24 | 2 Each Size | 2 Each Size | 2 Each Size |
| Laryngoscope, replacement bulbs and batteries Curved blade: #2, 3, 4 Straight blade: #1, 2, 3 | N/A | N/A | 1 set 1 Each Size 1 Each Size | 1 set 1 Each Size 1 Each Size | 1 set 1 Each Size 1 Each Size | 1 set 1 Each Size 1 Each Size |
| Magill forceps • Adult • Pediatric | N/A | N/A | 1 1 | 1 1 | 1 1 | 1 1 |
| Nebulizer | N/A | N/A | 2 | 2 | 2 | 2 |
| Nebulizer with in-line adapter | N/A | N/A | 1 | 1 | 1 | 1 |
| Needle Thoracostomy kit | N/A | N/A | 2 | 2 | 2 | 2 |
| Flexible intubation stylet | N/A | N/A | 1 | 1 | 1 | 1 |
| OPTIONAL ALS EQUIPMENT (No minimums apply) | | | | | | |
| Blood Product and Equipment | | | | | | |
| Cyanide Antidote Kit | | | | | | |
| Needle Thoracostomy Anatomical Landmark Guide | | | | | | |

| | BLS Unit Minimum Amount | BLS Command Minimum Amount | ALS Unit Minimum Amount | PSV/CCT Minimum Amount | FR/ALS Minimum Amount | VCAU Minimum Amount |
|---|-------------------------|----------------------------|-------------------------|------------------------|-----------------------|---------------------|
| D. ALS MEDICATION, MINIMUM AMOUNT | | | | | | |
| Acetaminophen, 1 g | N/A | N/A | 2 g | Optional | 2 g | Optional |
| Adenosine, 6 mg | N/A | N/A | 5 | 5 | 5 | 5 |
| Albuterol 2.5 mg/3ml | N/A | N/A | 6 | 2 | 2 | 2 |
| Aspirin, 81 mg | N/A | N/A | 4 tablets | 4 tablets | 4 tablets | 4 tablets |
| Amiodarone, 50 mg/ml (3 ml) | N/A | N/A | 6 | 3 | 6 | 3 |
| Atropine sulfate, 1 mg/10 ml | N/A | N/A | 3 | 2 | 2 | 2 |
| Buprenorphine, 8 mg | N/A | N/A | 6 tablets | Optional | Optional | Optional |
| Diphenhydramine, 50 mg/ml | N/A | N/A | 2 | 1 | 1 | 2 |
| Calcium chloride, 1000 mg/10 ml | N/A | N/A | 2 | 1 | 1 | 1 |
| Dextrose <ul style="list-style-type: none"> • 5% 50 ml, AND • 10% 250 ml | N/A | N/A | 2 2 | 1 2 | 2 2 | 1 2 |
| Epinephrine <ul style="list-style-type: none"> • Epinephrine , 1mg/ml <ul style="list-style-type: none"> ○ 1 mL ampule / vial (with syringe and needle), OR ○ Adult auto-injector (0.3 mg) AND Peds auto-injector (0.15 mg) • Epinephrine 0.1 mg/ml (1 mg/10 ml preparation) | N/A | N/A | 5 Optional 6 | 5 Optional 3 | 5 Optional 6 | 5 Optional 4 |
| Fentanyl, 50 mcg/mL | N/A | N/A | 200 mcg | 200 mcg | 200 mcg | 200 mcg |
| Glucagon, 1 mg/ml | N/A | N/A | 2 | 1 | 2 | 1 |
| Intravenous Fluids (in flexible containers) <ul style="list-style-type: none"> • Normal saline solution, 100 ml • Normal saline solution, 500 ml • Normal saline solution, 1000 ml | N/A | N/A | 2 2 6 | 1 1 2 | 1 1 4 | 1 1 3 |
| Lidocaine, 100 mg/5 ml | N/A | N/A | 2 | 2 | 2 | 2 |
| Magnesium sulfate, 1 g per 2 ml | N/A | N/A | 10 g | 10 g | 10 g | 10 g |
| Midazolam Hydrochloride | N/A | N/A | 5 mg/ml 2 vials | 5 mg/ml 2 vials | 5 mg/ml 2 vials | 5 mg/ml 2 vials |
| Morphine sulfate, 10 mg/ml (Only required during a Fentanyl shortage) | N/A | N/A | 2 | 2 | 2 | 2 |
| Naloxone Hydrochloride <ul style="list-style-type: none"> • IN concentration - 4 mg in 0.1 mL (with atomizer) • IM / IV concentration – 2 mg in 2 mL preload | N/A | N/A | Optional 5 | Optional 5 | Optional 5 | Optional 5 |
| Nitroglycerin preparations, 0.4 mg | N/A | N/A | 1 bottle | 1 bottle | 1 bottle | 1 bottle |
| Normal saline flush, 5 or 10 ml | N/A | N/A | 5 | 5 | 5 | 5 |
| Ondansetron <ul style="list-style-type: none"> • 4 mg IV single use vial • 4 mg oral | N/A N/A | N/A N/A | 4 4 | 4 4 | 4 4 | 4 4 |
| Sodium Bicarbonate 8.4%, 1 mEq/mL (50 mL) | N/A | N/A | 4 | 2 | 2 | 2 |
| Tranexamic Acid (TXA) 1 g/10 mL | N/A | N/A | 2 | 1 | 1 | 1 |

| | BLS Unit Minimum Amount | BLS Command Minimum Amount | ALS Unit Minimum Amount | PSV/CCT Minimum Amount | FR/ALS Minimum Amount | VCAU Minimum Amount |
|--|-------------------------|----------------------------|-------------------------|------------------------|-----------------------|---------------------|
| E. BLS MEDICATION, MINIMUM AMOUNT | | | | | | |
| Epinephrine <ul style="list-style-type: none"> • Epinephrine , 1mg/ml <ul style="list-style-type: none"> ○ 1 mL ampule / vial (with syringe and needle), OR ○ Adult auto-injector (0.3 mg) AND ○ Peds auto-injector (0.15 mg) | 2 | 2 | N/A | N/A | N/A | N/A |
| Naloxone Hydrochloride (Narcan) <ul style="list-style-type: none"> • IN concentration - 4 mg in 0.1 mL (with atomizer) OR • IM concentration – 2 mg in 2 mL preload | 2 | 2 | N/A | N/A | N/A | N/A |



Ventura County EMS Agency Equipment/Medication Waiver Request

Date: Form completed by:

Agency:

Equipment/Medication (name, concentration, supplied dose, packaging):

Lot # and Expiration:

In response to an ongoing, or imminent shortage of the single and specific medication/equipment listed above, the provider agency requests the following Action Plan (choose one):

A) One-time, 30-day waiver exempting the provider agency from minimum stocking standards listed in Policy 504 for the medication listed above requested to begin
Explain specific issue and mitigation attempt in comment section below:

B) 90-day window for a preapproved, one-time, 30-day waiver exempting provider agency from minimum stocking standards listed in Policy 504 for the medication listed above to begin when on-hand stock of medication above falls below required minimum stocking levels.
Explain specific issue and mitigation attempt in comment below:

C) Request for substitution of medication with alternative (concentration & amount)
Explain specifics and mitigation attempts in comment section below:

Pending approval of this request, the requesting provider agency certifies an understanding, and compliance with each of the following:

The provider agency will immediately report any adverse impacts on patient care resultant of this shortage to the EMS Agency.

If a need for continuing waiver is expected beyond 30 days the provider agency will submit a new request no later than five days before this waiver's expiration.

The provider agency will notify the EMS Agency within 24 hours when medication restock becomes available and this waiver will become null and void, unless otherwise specified by EMS Agency.

Action B only - The provider agency will notify the EMS agency within 24 hours when medication stock falls below minimum stocking levels and preapproved 30-day waiver is enacted.

The provider agency will provide any evidence required by EMS Agency of educational plan deemed necessary by EMS Agency to prepare field personnel to incorporate this shortage into patient care.

Submit to EMSA by email: EMSAgency@venturacounty.gov

Comments:



Ventura County EMS Agency
Equipment/Medication
Waiver Request

EMS AGENCY USE ONLY

Requesting Agency

Date received:

Date Processed:

Equipment/Medication Shortage Mitigation and Response Strategies verified: Yes No

Waiver granted: Yes No

If yes, **Action Plan** granted: A B C

Waiver start date:

Expires:

Action plan B only - Preapproved period starts:

Expires:

Approved by

Medical Director:

EMS Administration:

| | |
|--------|-------|
| Print: | |
| Sign: | Date: |

| | |
|--------|-------|
| Print: | |
| Sign: | Date: |

Comments:

| | | | |
|---|--|---|--|
| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Hazardous Material Incident | | Policy Number 2607 | |
| APPROVED: Administration: Steven L. Carroll, Paramedic | | Date: July 1, 2026 | |
| APPROVED: Medical Director Daniel Shepherd, MD | | Date: July 1, 2026 | |
| Origination Date: February 12, 1987 | | Effective Date: July 1, 2026 | |
| Date Revised: February 12, 2026 | | | |
| Date Last Reviewed: February 12, 2026 | | | |

- I. PURPOSE: This policy establishes guidelines for the response of pre-hospital care providers to incidents involving hazardous materials.
- II. AUTHORITY: Health and Safety Code, Division 2.5, Sections 1797.220 & 1798. California Code of Regulations, Title 22, Division 9, Section 100106.02.
- III. POLICY: The Incident Commander assumes responsibility for “functional” control within a hazardous materials incident. Functional control includes all operations within all zones and control of any contamination.

The responding Emergency Medical Services personnel assume responsibility for patient care and transportation after release and/or decontamination by the Hazardous Materials Team (HAZMAT). EMS personnel and/or treatment team shall coordinate treatment/transport efforts with HAZMAT so as not to jeopardize scene integrity, causing unnecessary spread of contamination to ambulance, equipment, EMS personnel and hospital personnel or citizens.

IV. PROCEDURE:

A. INITIAL NOTIFICATION

- 1. The responding EMS unit shall be notified by the Fire Department as soon as possible on all hazardous material incidents in order to facilitate their entry into the scene. Necessary information should include:
 - a. Radio channel/frequency for the incident
 - b. Estimated number of patients or potential patients
 - c. Approach to the incident
 - d. Location of the staging area
 - e. Identification (radio designation) of the Incident Commander
 - f. Request for specialized equipment needed
- 2. While enroute, the EMS unit shall make radio contact with the Incident Commander or FCC and verify location, best access and staging information prior to their arrival on-scene.

B. ARRIVAL ON-SCENE

1. Upon arrival at the scene, the ambulance unit shall notify the base hospital or receiving hospital affected as to the number of patients, description of hazard, actions performed related to victim decontamination, and any other pertinent information relative to hospital needs. (Note: the IC or HAZMAT should provide this information upon request).
2. If the scene has been secured, the first-in ambulance unit should enter the staging area and report to the Incident Commander, or designee, for direction.

C. PATIENT DECONTAMINATION

1. Patients contaminated by a hazardous substance or radiation shall be appropriately decontaminated by HAZMAT or fire resources, despite the urgency of their medical condition, prior to being moved to the triage area for transportation.
2. HAZMAT shall determine the disposition of all contaminated clothing and personal articles.
3. The transfer of the patient from the contaminated zone to the support zone must be accomplished by trained personnel in an appropriate level of protective clothing and carefully coordinated so as not to permit the spread of contamination.
4. Contaminated clothing and personal articles shall be properly prepared for disposal by HAZMAT.
5. Every effort shall be made to preserve, protect and return personal articles.

D. TRANSPORTATION

1. Any equipment, including transportation units, found to have been exposed and contaminated by a hazardous substance shall be taken out of service pending decontamination and a second ambulance unit responded to transport patients to the hospital when available.
2. At no time shall ambulance personnel transport contaminated patients. If during transport a patient off-gasses a strong odor or vomits what is believed to be toxic emesis, personnel/patient shall vacate ambulance and request assistance from the Incident Commander.
3. Prior to transportation of patients to the hospital, the ambulance unit shall notify the hospital of the following:
 - a. number of patients
 - b. materials causing contamination (if known)
 - c. extent of patient contamination
 - d. decontamination actions taken

- e. patient assessment, including injuries
 - f. pertinent information related to scene or incident
 - g. ETA
4. Deceased victims shall be left undisturbed at the scene
- E. ARRIVAL AT EMERGENCY ROOM
1. Transport of patients that have not been at least grossly decontaminated is prohibited. Ideally, patients will be thoroughly decontaminated at the scene. Patients who have been transported should be considered exposed and treated accordingly.
 2. All hospitals should develop a plan for receiving patients who have been decontaminated and those patients who may need additional decontamination and a contingency plan for mass decontamination.
 3. If additional decontamination resources are needed, HAZMAT decontamination equipment and personnel may be requested through the Ventura County Regional Dispatch Center.
- F. EMERGENCY PERSONNEL DECONTAMINATION
1. All treatment team members coming in contact with contaminated patients or contaminated materials shall take appropriate measures to insure proper decontamination and elimination of cross contamination. Secondary decontamination is recommended, which includes taking a shower and changing clothes whenever necessary.
 2. Clothing, bedding, instruments, body fluids, etc. may be considered extremely hazardous and must be handled with care, contained and disposed of properly.
 3. Emergency medical responders who are accidentally contaminated at the hazmat incident scene shall not board the ambulance until they have been at least grossly decontaminated at the scene. Ideally, responders will be thoroughly decontaminated at the scene. Responders presenting with symptoms secondary to exposure to a contaminant should be considered patients.
 4. If medical responders identify that they are contaminated during any transport, they shall immediately stop at the closest safe location, notify FCC that they are contaminated and request a hazardous materials response. Responders presenting with symptoms secondary to exposure to a contaminant should be considered patients.
 5. Follow-up monitoring of all personnel shall be conducted as deemed necessary by Agency Policy.

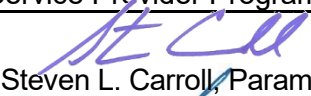

| Cardiac Arrest – Asystole/Pulseless Electrical Activity (PEA) | |
|---|--|
| ADULT | PEDIATRIC |
| BLS Procedures | |
| Initiate Cardiac Arrest Management (CAM) Protocol per VCEMS Policy 733 Airway management per VCEMS Policy 710 | |
| ALS Standing Orders | |
| <p>IV or IO access</p> <p>Epinephrine 0.1 mg/mL (Administer ASAP)</p> <ul style="list-style-type: none"> IV/IO – 1 mg (10 mL) q 6 min Repeat x 2 for max of 3 doses during initial arrest If ROSC then re-arrest: additional 3 doses may be administered <p>Normal Saline</p> <ul style="list-style-type: none"> IV/IO – 1 Liter bolus <p>Treat underlying causes when identified: <u>Renal Failure / History of Dialysis</u></p> <p>Calcium Chloride</p> <ul style="list-style-type: none"> IV/IO – 1g Repeat x 1 in 10 min <p>Sodium Bicarbonate</p> <ul style="list-style-type: none"> IV/IO – 1 mEq/kg Repeat 0.5 mEq/kg x 2 q 5 min <p><u>Tricyclic Antidepressant Overdose</u></p> <p>Sodium Bicarbonate</p> <ul style="list-style-type: none"> IV/IO – 1 mEq/kg Repeat 0.5 mEq/kg x 2 q 5 min <p><u>Beta Blocker Overdose</u></p> <p>Glucagon</p> <ul style="list-style-type: none"> IV/IO – 2 mg up to 10 mg when available <p><u>Calcium Channel Blocker Overdose</u></p> <p>Calcium Chloride</p> <ul style="list-style-type: none"> IV/IO – 1 g Repeat x 1 in 10 min <p>Glucagon</p> <ul style="list-style-type: none"> IV/IO – 2 mg up to 10 mg when available <p>ALS Airway Management</p> <ul style="list-style-type: none"> Ventilate by BLS measures. If indicated, initiate appropriate advanced airway procedures in accordance with VCEMS Policy 710 | <p>IV or IO access</p> <p>Epinephrine 0.1 mg/mL (Administer ASAP)</p> <ul style="list-style-type: none"> IV/IO – 0.01mg/kg (0.1 mL/kg) q 6 min Repeat x 2 for max of 3 doses during initial arrest. If ROSC then re-arrest and additional 3 doses may be administered <p>Normal Saline</p> <ul style="list-style-type: none"> IV/IO – 20 mL/kg bolus <p>Treat underlying causes when identified: <u>Renal failure / History of Dialysis</u></p> <p>Calcium Chloride</p> <ul style="list-style-type: none"> IV/IO – 20 mg/kg Repeat x 1 in 10 min <p>Sodium Bicarbonate</p> <ul style="list-style-type: none"> IV/IO – 1 mEq/kg Repeat 0.5 mEq/kg x 2 q 5 min <p><u>Tricyclic Antidepressant Overdose</u></p> <p>Sodium Bicarbonate</p> <ul style="list-style-type: none"> IV/IO – 1 mEq/kg Repeat 0.5 mEq/kg x 2 q 5 min <p><u>Beta Blocker Overdose</u></p> <p>Glucagon</p> <ul style="list-style-type: none"> IV/IO – 0.1 mg/kg up to 10 mg when available <p><u>Calcium Channel Blocker Overdose</u></p> <p>Calcium Chloride</p> <ul style="list-style-type: none"> IV/IO – 20 mg/kg Repeat x 1 in 10 min <p>Glucagon</p> <ul style="list-style-type: none"> IV/IO – 0.1 mg/kg up to 10 mg when available <p>ALS Airway Management</p> <ul style="list-style-type: none"> Ventilate by BLS measures. If indicated, initiate appropriate advanced airway procedures in accordance with VCEMS Policy 710 |
| Base Hospital Orders Only | |
| Consult with ED Physician for further treatment measures | |
| <p>Additional Information:</p> <ul style="list-style-type: none"> If sustained ROSC (> 30 seconds), activate VF/VT alarm and initiate post arrest resuscitation as outlined in VCEMS Policy 733. For termination of resuscitation, transport decisions, and use of base hospital consult reference VCEMS Policy 733. If patient is <u>hypothermic</u>: Limit treatment to ONE round of medication prior to Base Hospital contact. Field determination of death is discouraged in these patients and they should be transported to the most accessible receiving facility. | |

Effective Date: Ju 1, 2026

Date Revised: March 12, 2026
Last Reviewed: March 12, 2026



VCEMS Medical Director

| | | | |
|---|--|---|--|
| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Emergency Medical Technician (EMT) Automatic External Defibrillation (AED) Service Provider Program Standards | | Policy Number: 803 | |
| APPROVED: Administration:  Steven L. Carroll, Paramedic | | Date: July 1, 2026 | |
| APPROVED: Medical Director:  Daniel Shepherd, M.D. | | Date: July 1, 2026 | |
| Origination Date: November 1988 | | | |
| Date Revised: October 9, 2025 | | Effective Date: July 1, 2026 | |
| Date Last Reviewed: October 9, 2025 | | | |

- I. PURPOSE: To establish criteria and procedure for approval and oversight of EMT AED Service Provider programs.
- II. AUTHORITY: Health and Safety Code 1797.107, 1797.170, 1798 and California Code of Regulations, Title 22, 100066.03.
- III. DEFINITION: An EMT AED service provider is an agency or organization that employs individuals as defined in Title 22, Division 9, Section 100060, and who obtain AEDs for the purpose of providing AED services to the general public.
- IV. POLICY:
 - A. An AED Service Provider shall be approved by Ventura County Emergency Medical Services (VC EMS) prior to beginning service. In order to receive and maintain EMT AED Service Provider approval, an EMT AED Services Provider shall comply with the requirements of this policy.
 - B. An EMT AED Service Provider shall:
 1. Provide orientation of AED authorized personnel to the AED
 2. Ensure maintenance of AED equipment.
 3. Ensure initial training and continued competency of AED authorized personnel
 - a. Demonstration of skills competence at least every six months to the EMT Program Director or his/her designee as identified to the EMS office.
 - b. Skills competency records shall be maintained for at least four years.
 4. Ensure that EMT personnel complete first responder BLS Prehospital Care Record (PCR) or electronic PCR (ePCR) for all patient contacts.
 5. Authorize personnel and maintain a current list of all EMT AED Service Provider authorized personnel and provide a list upon request by the VCEMS Agency. Authorized personnel means EMT personnel trained to operate an AED and authorized by an approved EMT AED Service Provider.

6. Train all EMTs who have not already been trained in use of AED. Training shall include the following:
 - a. Perform emergency cardiac care in accordance with protocols developed and/or approved by the EMS Agency Medical Director.
 - b. Recognize that a patient is in cardiac arrest and that CPR and immediate application of the automated external defibrillator is required.
 - c. Set up the automated defibrillator correctly.
 - d. Correctly apply the defibrillator pads.
 - e. Ensure that rescuers or bystanders are not in contact with the patient while the AED is analyzing or delivering a shock.
 - f. Deliver shocks for ventricular fibrillation in the shortest time possible following their arrival at the patient side, ideally within 90 seconds.
 - g. Recognize that a shock was delivered to the patient.
 - h. Provide supportive care to a patient who has been successfully defibrillated.
 - i. Immediately recognize and respond to patients when an arrest recurs either at the scene or during transport, in accordance with protocols.
 - j. Record the pertinent events of the emergency response on a PCR.
 - k. Maintain the AED and voice/ECG recorder or other documentation device in accordance with manufacturer's recommendations.
7. Develop and maintain a quality improvement program, approved by the VCEMS Medical Director that contains the following:
 - a. Assure timely and competent review of EMT managed cardiac arrest cases, accurate logging of required data, and timely, accurate and informative statistical summaries of system performance over time, as well as recommendations, as indicated, for modifications of system design, performance protocols, or training standards designed to improve patient outcome.
 - b. Collect, store and analyze, at a minimum, the following data related to EMT management of cardiac arrest patients:
 - (1) Patient Data:
 - a) Age,
 - b) Sex,
 - c) Whether arrest was witnessed or unwitnessed,
 - d) Distance of collapse from EMT responding unit, and

- e) Initial cardiac rhythm.
 - (2) EMS System Data:
 - a) Estimated time from collapse to call for help,
 - b) Estimated time from collapse to initiation of CPR,
 - c) EMT responding unit response time, and
 - d) Scene to hospital transport time.
 - (3) EMT Performance:
 - a) Time from arrival to actual defibrillation,
 - b) Time between defibrillation attempts,
 - c) General adherence to established protocol.
 - (4) Patient Outcome:
 - a) Rhythm after each shock.
 - b) Return of pulse and/or spontaneous respirations in the field.
8. EMT AED documentation submission
- a. If EMT AED Service Provider has Ventura County Electronic Patient Care Record (ePCR) capabilities, documentation shall be consistent with VCEMS Policy 1000.
 - b. If EMT AED Service Provider does not have ePCR capabilities, documentation submission be as follows:
 - (1) EMT documentation (incident printout and prehospital care record (PCR) shall be submitted to the receiving hospital as soon as possible (not more than two hours after patient arrival).
 - (2) EMT documentation for all arrests (incident printout and PCR including times) shall be submitted by the provider to the involved base hospital within 30 days of the end of the calendar month of the occurrence.
 - (3) EMT documentation (incident printout, PCR including times, and audio tape) shall be submitted to the EMT medical director or designee within 10 working days of the occurrence.
9. The EMT AED Service Provider shall submit an annual written report to the EMS Agency to include as a minimum the following information.
- a. The total number of cases in which the AED was activated. The number of those cases where return of spontaneous circulation (ROSC) was achieved.

- b. The number of cases that presented in Ventricular Fibrillation (VF). The number of those cases where ROSC was achieved.
- c. The number of cases that presented in witnessed VF. The number of those cases where ROSC was achieved.
- d. The 90% fractile times from first notification to on-scene, to with patient and to first analysis, in case of secondary PSAP, time received.
- e. The number of cases of cardiac arrest responded to where the AED was not activated and the 90% fractile time from first notification to on-scene for those cases, in case of secondary PSAP, time received.

V. PROCEDURE:

A. Program Approval

- 1. Eligible programs shall submit a written request for EMT AED Service Provider approval to the EMS Agency and agree to comply with the provisions of this policy.
- 2. Application Receipt Process
Upon receipt of a complete application packet, the Agency will notify the applicant within fourteen business days that;
 - a. The request for approval has been received.
 - b. The request does or does not contain all required information.
 - c. What information, if any, is missing
- 3. Program Approval Time Frames
 - a. Program approval or disapproval shall be made in writing by the Agency to the requesting program, within sixty calendar days, after receipt of all required documentation.
 - b. The Agency shall establish an effective date for program approval in writing upon the satisfactory documentation of compliance with all program requirements.
 - c. Program approval shall be for four years following the effective date of the program and may be reviewed every four years subject to the procedure for program approval specified by the Agency.
- 4. Withdrawal of Program Approval
 - a. Noncompliance with any criterion required for program approval, use of any unqualified personnel, or noncompliance with any other applicable provision of Title 22 may result in suspension or revocation of program approval by the Agency.

Ventura County Emergency Medical Services Agency

Emergency Medical Technician AED Service Provider

APPROVAL REQUEST

General Information

Program/Agency Name: _____

Address: _____ City: _____ Zip: _____

Phone: _____ Fax: _____ Email: _____

Date Submitted: _____

Requirements

(All items below refer to Ventura County EMS Policy 803 and Title 22 Regulations)

1. Program Eligibility

| | |
|---|--|
| Eligible Programs <ul style="list-style-type: none"> Programs eligible for approval shall be limited to public or private organizations that meet the requirements identified in this policy. All private entities must possess a valid business license and proof of organizational registry (partnership, sole proprietorship, corporation, etc.) | Name of Program |
| Written request for EMT AED Service Provider Approval | <input type="checkbox"/> Attached |

2. Records and Quality Improvement

| | |
|---|------------------|
| Agree to maintain all records for a minimum of four years. | Signature: _____ |
| Agree to participate in the VCEMS Quality Improvement Program and in research data accumulation. | Signature: _____ |

VCEMS Office Use Only

| | |
|--|-------|
| All Requirements Submitted: | Date: |
| EMT AED SERVICE PROVIDER Application Approved: | Date: |
| Approval Letter Sent: | Date: |
| Re-Approval Due: | Date: |
| Signature of person approving EMT AED SERVICE PROVIDER | Date |
| | |
| Typed or printed name: | |

Ventura County Emergency Medical Services Agency Emergency Medical Technician AED Service Provider

ANNUAL REPORT

The Annual Report shall be submitted to EMSAgency@venturacounty.gov, by January 31st. It shall be compiled from data obtained the prior calendar year, January 1st through December 31st.

Program/Agency Name: _____

Report submitted by (Name): _____



Phone: _____ Email: _____

Date Submitted: _____

Program Data

(All items below refer to Ventura County EMS Policy 803 and Title 22 Regulations)

| | |
|---|--|
| The number of patients with sudden cardiac arrest receiving CPR prior to arrival of emergency medical care. | |
| The total number of patients on whom defibrillator shocks were administered, witnessed (seen or heard) and not witnessed; | Witnessed: _____ Unwitnessed: _____ |
| The number of these persons who suffered a witnessed cardiac arrest whose initial monitored rhythm was ventricular tachycardia or ventricular fibrillation | |
| The total number of cases in which the AED was activated. | |
| The number of those cases where return of spontaneous circulation (ROSC) was achieved | |
| The number of cases that presented in Ventricular Fibrillation (VF). | |
| The number of those cases where ROSC was achieved. | |
| The number of cases that presented in witnessed VF. | |
| The number of those cases where ROSC was achieved. | |
| The 90% fractile times from first notification to on-scene, to with patient and to first analysis, in case of secondary PSAP, time received. | |
| The number of cases of cardiac arrest responded to where the AED was not activated and the 90% fractile time from first notification to on-scene for those cases, in case of secondary PSAP, time received. | |

| | | | |
|---|---|---|--|
| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Air Unit Program | | Policy Number 1200 | |
| APPROVED: Administration: |  Steven L. Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director: |  Daniel Shepherd, MD | Date: July 1, 2026 | |
| Origination Date: | 5/01/1999 | Effective Date: July 1, 2026 | |
| Date Revised: | 1/08/2026 | | |
| Date Last Reviewed: | 1/08/2026 | | |

- I. PURPOSE: This policy will establish minimum standards for the integration of Emergency Medical Services (EMS) aircraft and personnel into the local EMS prehospital patient transport system as a specialized resource for the transport and care of emergency medical patients.
- II. AUTHORITY: Health and Safety Code Section 1797.200 and California Code of Regulations Division 9, Chapter 7.
- III. POLICY: EMS aircraft must be authorized by Ventura County (VC) EMS in order to provide prehospital patient transport within Ventura County. Authorized air unit service providers will comply with this and other VCEMS Policies and Procedures relating to provision of air transport for emergency patients.
- IV. Definitions utilized for Prehospital EMS Aircraft: The following definitions will be used when referring to air units in the VCEMS system. These shall be applicable for all VCEMS policies and procedures pertaining to any prehospital aircraft program operating in the County of Ventura.
 - A. Advanced Life Support (ALS) means those procedures and skills contained in the Paramedic scope of practice as listed in VCEMS Policy 310.
 - B. Basic Life Support (BLS) means those procedures and skills contained in the EMT scope of practice as listed in VCEMS Policy 300.
 - C. Medical Flight Crew means the individual(s), excluding the pilot, specifically assigned to care for the patient during aircraft transport.
 - D. Emergency Medical Services Aircraft means any aircraft utilized for the purpose of prehospital emergency patient response and transport. EMS aircraft includes air ambulances and all categories of rescue aircraft.
 - E. Air Ambulance means any aircraft specially constructed, modified or equipped, and used for the primary purposes of responding to emergency calls and transporting critically ill or injured patients whose medical flight crew has at a minimum two (2) attendants certified or licensed in advanced life support.
 - F. Rescue Aircraft means an aircraft whose usual function is not prehospital emergency patient transport but which may be utilized, in compliance with VC EMS policy, for prehospital emergency patient transport when use of an air or ground ambulance is

inappropriate or unavailable. Rescue aircraft includes ALS rescue aircraft, BLS rescue aircraft and Auxiliary rescue aircraft.

1. Advanced Life Support Rescue Aircraft means a rescue aircraft whose medical flight crew has at a minimum one attendant who is an authorized Independent Practice Paramedic, a Registered Nurse, Advanced Practice Provider or Physician who has also obtained training and experience in flight rescue operations.
2. Basic Life Support Rescue Aircraft means a rescue aircraft whose medical flight crew has at a minimum one attendant certified as an EMT who is trained and experienced in flight rescue operations.
3. Auxiliary Rescue Aircraft means a rescue aircraft which does not have a medical flight crew, or whose medical flight crew does not meet the minimum requirements outlined for ALS or BLS rescue aircraft. Examples of this may include United States Coast Guard, California Air National Guard, United States Navy, etc.

G. Air Ambulance Service means an air transportation service which utilizes air ambulances.

H. Air Rescue Service means an air service used for emergencies, including search and rescue.

I. Air Ambulance or Air Rescue Service Provider means the individual or group that owns and/or operates an air ambulance or air rescue service.

J. Classifying EMS Agency means the agency which categorizes the EMS aircraft into the types identified above. For the County of Ventura, the classifying agency shall be VCEMS. For aircraft operated by the California Highway Patrol, the California Department of Forestry or the California National Guard, the Classifying Agency shall be the California EMS Authority. It should be noted that military aircraft outside of the California Air National Guard are not under the purview of VCEMS or the California EMS Authority.

K. Designated Dispatch Center means an agency which has been designated by VCEMS for the purpose of coordinating air ambulance or rescue aircraft response to the scene of a medical emergency within Ventura County.

V. PROCEDURE:

A. VC EMS Policies and Procedures for medical control shall apply to air unit service providers and medical flight crews.



B. The VC EMS Policies and Procedures for record keeping, quality assurance, and continuous quality improvement shall apply to EMS aircraft operations in Ventura County.

C. Any air unit program operating authorized by VCEMS and operating in the County of Ventura shall be subject to the requirements outlined in VCEMS policies and procedures manual.

D. VCEMS Responsibilities:



1. Classify EMS aircraft.
 - a. EMS aircraft classifications shall be limited to the following categories:
 - 1) Air Ambulance.
 - 2) Rescue Aircraft.
 - a) Advanced Life Support Rescue Aircraft.
 - b) Basic Life Support Rescue Aircraft.
 - 3) Auxiliary Rescue Aircraft
 - b. EMS aircraft classification shall be reviewed at 2-year intervals.
Reclassification shall occur if there is a transfer of ownership or a change in the aircraft's category.
2. Maintain an inventory of the number and type of authorized EMS aircraft, the patient capacity of authorized EMS aircraft, the level of patient care provided by EMS aircraft personnel, and receiving facilities with landing sites approved by the State Department of Transportation, Aeronautics Division.
3. Establish policies and procedures to assure compliance with Federal, State and local statutes.
4. Develop written agreements with air unit service providers specifying conditions to routinely serve the County.
- E. No person or organization shall provide or hold themselves out as providing prehospital Air Ambulance or Air Rescue services unless that person or organization has aircraft which have been classified by VCEMS or in the case of the California Highway Patrol, California Department of Forestry, and California National Guard, the California EMS Authority.
- F. A request from a designated dispatch center shall be deemed as authorization of aircraft operated by the California Highway Patrol, Department of Forestry, National Guard or the Federal Government.
- G. Responsibilities of Ventura County Aviation Unit
 1. Respond to all response requests per VCEMS policy and procedures.
 2. Respond to all scenes when ground personnel determine the need for air transport that meets VCEMS policy and procedures.
- H. Prehospital ground personnel may be required to maintain patient care responsibility and fly-in with the patient in situations where patient care warrants and the flight crew is not medically qualified to assume responsibility for care.
- I. If air rescue/transport services are needed and the Ventura County Aviation Unit is not available, a mutual aid request from a neighboring jurisdiction may be required.

- J. Ventura County Aviation Unit may be considered as a last resort option for emergency interfacility transport only when other air ambulance or ground ambulance resources are unavailable, and only in life-or-death situations. All situations where this option is utilized will require EMS Agency Duty Officer Notification
- K. Any air transport service operating in the County of Ventura shall enter into a written agreement with VCEMS prior to integrating into the formal EMS system.

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| CITY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Helicopter Dispatch for Emergency Medical Responses | | Policy Number 1202 | |
| APPROVED: Administration: |  Steven L. Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director: |  Daniel Shepherd, MD | Date: July 1, 2026 | |
| Origination Date: | 5/30/1988 | Effective Date: July 1, 2026 | |
| Date Revised: | 1/08/2026 | | |
| Date Last Reviewed: | 1/08/2026 | | |

- I. PURPOSE: To define dispatch procedures for helicopter emergency medical responses.
- II. AUTHORITY: Health and Safety Code, Division 2.5, Sections 1797.204, 1797.206, 1797.220, and 1798. California Code of Regulations, Title 22, Division 9, Chapter 7.
- III. DEFINITIONS:
 - A. Designated Dispatch Center: The designated dispatch center for air unit programs based in the County of Ventura will be the Ventura County Fire Protection District Fire Communications Center (FCC).
 - B. Automatic Response Area(s): Any remote area where the response time for ground ambulance personnel exceeds twenty-five (25) minutes as determined by the FCC Computer Aided Dispatch (CAD) system.
- IV. POLICY: Helicopters will be dispatched when an incident is in an Automatic Response Area or when requested by prehospital personnel on scene or enroute to an incident.
- V. PROCEDURE
 - A. Helicopters, staffed and equipped in accordance with VCEMS policies and procedures, will be dispatched by the designated dispatch center in the following manner:
 1. All requests for and cancellations of EMS helicopters at the scene of an emergency shall be made through FCC. The authority for requesting the dispatch of a helicopter for patient transport shall be vested with the on-scene public agency or other prehospital personnel that are authorized to function with the organized EMS system. This policy does not preclude the Ventura County Aviation Unit from responding to incidents requiring law enforcement response - including Search and Rescue (SAR) operations.
 2. FCC personnel will determine the appropriate aviation resources using information from on-scene public safety/prehospital personnel or from the reporting party if the patient is located in an Automatic Response Area.

3. No EMS helicopter shall respond to an incident without the request of and/or notification of FCC. All responding public safety/EMS personnel shall be notified of the dispatch of a helicopter
 4. Specific procedures will be drafted to account for the dispatch and utilization of air ambulance versus rescue aircraft, if/when an air ambulance service is licensed to operate by VCEMS for operations within the County of Ventura.
 5. A Ventura County Aviation Unit (VCAU) helicopter will be dispatched to incidents that describe the need for the specialized skills and capabilities of a rescue aircraft. If the VCAU helicopter is unavailable, mutual aid resources may be requested. Incidents that require a rescue helicopter may involve the need for:
 - a. Hoist operations: use of a mechanical device (“hoist”; attached to the helicopter) to lift a patient from a location inaccessible to ground personnel and transfer him/her into the cabin of the helicopter.
 - b. Short haul operations: use of a long line (attached to the helicopter) to lift a patient from a location inaccessible to ground personnel, and transport him/her to a location on the ground a short distance away where care may be provided.
 - c. The need for search capabilities, including the utilization of Night Vision Goggles (NVG).
- B. Helicopter transportation should be considered for all cases that meet criteria per VCEMS Policy 1203 - Criteria for Patient Emergency Transport by Helicopter
1. Helicopter transportation will not be used as a means of mitigating/bypassing hospital diversion guidelines.
- C. A helicopter response may be terminated:
1. By FCC if on-scene prehospital personnel determine that the helicopter is not needed.
 2. If the helicopter pilot and/or flight crew determine the call should be terminated for safety considerations.

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| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: EMS Aircraft Classification | | Policy Number 1203 | |
| APPROVED: Administration: |  Steven L. Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director: |  Daniel Shepherd, MD | Date: July 1, 2026 | |
| Origination Date: | October 31, 1994 | Effective Date: July 1, 2026 | |
| Date Revised: | January 8, 2026 | | |
| Date Last Reviewed: | January 8, 2026 | | |

- I. PURPOSE: To define criteria for patient transport via helicopter
- II. AUTHORITY: Health and Safety Code, Division 2.5, Sections 1797.204, 1797.206, 1797.220, and 1798. California Code of Regulations, Title 22, Division 9, Chapter 7
- III. POLICY: Patients shall be transported to hospitals via ground ambulance unless such transport is unavailable or if ground transport is significantly longer than air transport, and this difference in time would negatively impact the patient's condition. For the purposes of this policy, significantly is defined as at least a 15-minute ground transport time.
- IV. PROCEDURE:
 - A. If a helicopter is being considered for patient transport, early recognition (including request for a helicopter while enroute to the call) will help decrease delay in patient transport.
 - B. Helicopter transportation of patients will be considered for cases that meet all three of the following criteria. Transport decisions will be determined jointly by the Base Hospital (BH), if BH contact is established, and on-scene personnel.
 1. A minimum of 15 minutes ground travel time to the *appropriate* hospital,
 2. The helicopter can deliver the patient to the hospital in a shorter time than the ground unit based on the time that the patient is ready for transport. This decision should be based on the following formula:



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|--|
| ___ minutes for ETA of the helicopter to the scene + ___ minutes for air transport time to the hospital + 10 minutes for loading/unloading/transfer of patient to ED <hr style="width: 80%; margin: 0 auto;"/> = ___ ETA to hospital for the helicopter |
|--|

3. Any one or more of the following patient conditions:
 - a. Medical-related complaints:
 - 1) Hypotension/shock (non-traumatic)
 - 2) Snake bite with signs of significant envenomation
 - 3) Unstable near drowning

- 4) Status epilepticus refractory to medications
 - 5) Cardiovascular instability (chest pain with dysrhythmias or post-resuscitation)
 - 6) Critical burns or electrical burns
 - 7) Critical respiratory patients (use caution with altitude)
 - 8) SCUBA-related emergencies or barotrauma (use caution with altitude)
 - 9) Any other medical problems in areas inaccessible to, or with prolonged ETA times, for responding ground units
 - 10) Other conditions subject to the approval of the BH physician or the highest medical authority on-scene
- b. Traumatic injuries – Patients with traumatic injuries who are to be transported by helicopter shall be triaged prior to transport according to VCEMS Policy 1405 (Trauma Triage and Destination Criteria)
- 1) Trauma Step 1-3 criteria:
 - a) All trauma patients to be transported by helicopter that meet Step 1-3 criteria will be transported to a designated trauma center.
 - b) Helicopter personnel may determine on a case-by-case basis which trauma center is the closest and most appropriate destination.
 - c) BH contact with the destination trauma center shall be initiated by the caregiver(s) staffing the helicopter and coordination with the ground units.
 - d) On rare occasion, the most appropriate destination hospital may be outside the county. However, it is preferred that trauma patients involved in incidents within Ventura County are transported to a designated Ventura County trauma center.
 - 2) Trauma Step 4 criteria:
 - a) An on-scene paramedic shall contact the base hospital in whose catchment area the incident occurred
 - b) A BH order is required for all patients meeting Step 4 criteria, unless the patient is located within an inaccessible area or if patient transport will be prolonged.

- c) If the patient is directed other than to the regular catchment base hospital, the MICN will notify the receiving hospital or trauma center of an inbound patient and relay paramedic report.
 - c. Multi-Casualty Incidents (MCI) or multi-patient incidents
 - 1) Helicopter transport may be utilized during MCI responses
 - 2) Patient transport should be coordinated between the Medical Communications Officer (MEDCOMM) at the scene and the managing base hospital.
 - 3) The highest priority patients should be transported by helicopter and be taken to a farther facility(ies), allowing for ground providers to transport lower category patients to the closer facility(ies)
- C. Contraindications to air transport
 - 1. Patients contaminated with hazardous materials regardless of decontamination status.
 - 2. Violent or potentially violent patients who have not been sedated.
 - 3. Stable patients (except in backcountry areas inaccessible to ground units or if patient transport will be prolonged).
 - 4. When ground transport time is shorter than air transport time
 - a. Circumstances exist in which the lack of an established landing zone and/or the risk of additional approach and landing maneuvers are deemed unsafe by the pilot and flight crew. In these events, the patient may be transported to the most appropriate receiving facility by air. It should be noted that these events should be the exception to the standard (ground transport) and not the rule.
- D. Relative contraindications to transport
 - 1. Asystole, not responding to appropriate therapy and not meeting any criteria of an exceptional situation (e.g., cold water drowning, lightning strike or electrocution)
 - 2. Transports from heavily populated areas
 - 3. Pilot and/or flight crew at the scene are unable to determine conditions at the receiving facility prior to initiating transport.
 - a. Factors influencing this could include weather conditions, helipad status, lighting, etc.
 - 4. Other safety conditions as determined by pilot and/or flight crew



- E. BH contact will be attempted to establish standard medical control. If ALS personnel are unable to establish BH contact, Standing Order Protocols will be followed per VCEMS Policy 705.
- F. Provider agencies that utilize medical flight crew members who have an expanded scope of practice beyond the paramedic scope of practice may utilize specific treatments/procedures only upon prior written approval by the VCEMS Medical Director.
- G. A minimum of one independent practice paramedic must accompany the patient if ALS procedures are initiated and no physician is present.
 - a. Exception - In an MCI situation, a patient who has had an IV started that does not contain any additives may be transported/monitored by a BLS flight crew. Destination will be determined by the pilot and flight crew, taking into consideration the patient(s) condition, flight conditions, and any other factors necessary
- H. Complications during patient transport via helicopter:
 - 1. If a helicopter is transporting a patient to the hospital and is unable to complete the transport due to weather, mechanical/safety issues, or any other factor that was impossible to predict prior to the helicopter lifting from the scene, the helicopter will notify FCC as soon as possible to arrange an alternate LZ and for a ground ambulance to rendezvous with the helicopter
 - 2. Medical personnel staffing the helicopter shall retain responsibility for patient care until transfer of care to ground ambulance personnel is accomplished. If the final destination for the helicopter was to be a trauma center, ground personnel shall complete the transport to the designated trauma center within that catchment area.

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| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Air Unit Specifications, Equipment and Supplies | | Policy Number 1205 | |
| APPROVED: Administration: |  Steven L. Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director: |  Daniel Shepherd, MD | Date: July 1, 2026 | |
| Origination Date: | May 1, 1999 | Effective Date: July 1, 2026 | |
| Date Revised: | January 8, 2026 | | |
| Date Last Reviewed: | January 8, 2026 | | |

- I. PURPOSE: To define air unit specifications, equipment and supplies.
- II. AUTHORITY: Health and Safety Code, Division 2.5, Sections 1797.204, 1797.206, 1797.220, and 1798. California Code of Regulations, Title 22, Division 9, Chapter 7
- III. POLICY: All air units transporting patients in Ventura County shall meet the requirements of this policy.
- III. PROCEDURE:
 - A. EMS Aircraft Configuration
 1. Air ambulances shall be accredited by the Commission on Accreditation of Medical Transport Systems
 2. All EMS aircraft shall be configured so that: There is sufficient space in the patient compartment to accommodate a minimum of one (1) patient on the stretcher and a minimum of one (1) patient attendant.
 3. There is sufficient space for medical personnel to have adequate access to the patient in order to carry out necessary procedures including CPR on the ground and in the air.
 4. There is sufficient space for all medical equipment and supplies required for aviation resources, as outlined in VCEMS Policy 504 – ALS and BLS Equipment and Supplies.
 5. Any additional VCEMS minimum requirements outlined in air unit operations policies 1200-1203 are met.
 - B. Safety Equipment.
 1. Each EMS aircraft shall have adequate safety belts and tie-downs for all personnel, patient(s), stretcher(s) and equipment to prevent inadvertent movement.
 2. Providers shall assure that adequate safety equipment is available for the flight and medical crews to meet any Federal, State or local statutes, regulations or policies.

- C. Each EMS aircraft shall have on-board equipment and supplies commensurate with the scope of practice of the medical flight crew as specified in VCEMS Policy 504. This requirement may be fulfilled through the utilization of appropriate medical kits (cases/packs) which can be carried on a given flight to meet the needs of a specific type of patient and/or additional medical personnel not usually staffing the aircraft.
- D. Communications
 - 1. In accordance with VCEMS policies, all EMS aircraft shall have the capability of communicating with:
 - a. Designated dispatch center(s).
 - b. EMS ground units at the scene of an emergency.
 - c. Designated base hospitals.
 - d. Receiving hospitals.
 - e. Other appropriate facilities or agencies.
 - 2. All EMS aircraft shall utilize radio frequencies in accordance with the established operational area fire communications plan, as they relate to the dispatch, routing and coordination of flights.

NO CHANGES

| | | | |
|---|--|---|--|
| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Fireline Medic | | Policy Number 627 | |
| APPROVED: Administration: |  Steven Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director |  Daniel Shepherd, MD | Date: July 1, 2026 | |
| Origination Date: | October 5, 2011 | | |
| Date Revised: | April 14, 2022 | Effective Date: July 1, 2026 | |
| Date Last Reviewed: | February 12, 2026 | | |

- I. PURPOSE: To establish procedures for a fire line paramedic (FEMP) response from and to agencies within or outside local EMS agency (LEMSA) jurisdiction when requested through the statewide Fire and Rescue Mutual Aid System, to respond to and provide advanced life support (ALS) care on the fireline at wildland fires.
- II. AUTHORITY: California Health and Safety Code, Division 2.5, Sections 1797.204, 1797.220; California Code of Regulations, Title 22, Division 9, Sections 100094.01 and 100095
- III. POLICY:
 - A. County accredited paramedics shall carry the ALS/BLS inventory consistent with the FIRESCOPE FEMP position description. Reasonable variations may occur; however, any exceptions shall have prior approval of the VCEMSA. The equipment lists are a scaled down version of standard inventory in order to meet workable/packable weight limitations (45 lbs including wildland safety gear, divided between a two-person team. Weight limit to include the Personal Pack Inventory as outlined in FireScope).
 1. It will not be possible to maintain standard ALS minimums on the fireline. The attached ALS inventory essentially prioritizes critical and probable fireline needs.
 2. VCEMS accredited paramedics may function within their scope of practice, when serving in an authorized capacity assignment, as an agent of their authorized ALS fire agency.

IV. PROCEDURE:

- A. Under the authority of State regulations, a paramedic may render ALS care during emergency operations as long as the following conditions are met:
1. The paramedic is currently licensed by the State of California and is accredited by the Ventura County EMS Agency.
 2. The paramedic is currently employed with a Ventura County ALS provider and possesses the requisite wildland fireline skills and equipment.
 3. The paramedic practices within the treatment guidelines set forth in VCEMSA ALS standing orders, policies and procedures.
 4. The FEMP is expected to check in and obtain a briefing from the Logistics Section Chief, or the Medical Unit Leader (MEDL) if established at the Wildfire Incident.
 5. Documentation of patient care will be completed as per VCEMSA policy 1000.
 - a. Documentation of patient care will be submitted to incident host agencies. A VCePCR shall be completed for all ALS patients contacted, and shall be completed by the FEMP upon return to camp, or as soon as practical.
 6. Continuous Quality Improvement activities shall be in accordance with VCEMSA standards.

APPENDIX A

**FIRELINE EMERGENCY MEDICAL TECHNICIAN
BASIC LIFE SUPPORT (BLS) PACK INVENTORY**

| | |
|---------------------------------|---|
| Airway, NPA Kit (1) | Mask, Face, Disposable w/eye shield (1) |
| Airway, OPA Kit (1) | Mylar Thermal Survival Blanket (2) |
| Bag Valve Mask (1) | Pad, Writing (1) |
| Bandage, Sterile 4 x 4 (6) | Pen and Pencil (1 ea.) |
| Bandage, Triangular (2) | Pen Light (1) |
| Biohazard Bag (2) | Petroleum Dressing (2) |
| Burn Sheet (2) | Shears (1) |
| Cervical Collar, Adjustable (1) | Sphygmomanometer (1) |
| Coban Wraps/Ace Bandage (2 ea.) | Splint, Moldable (1) |
| Cold Pack (3) | Splinter Kit (1) |
| Combat Gauze | |
| Dressing, Multi-Trauma (4) | Stethoscope (1) |
| Exam Gloves (1 box) | Suction, Manual Device (1) |
| Eye Wash (1 bottle) | Tape, 1 inch, Cloth (2 rolls) |
| Glucose, Oral (1 Tube) | Tourniquet (1) |
| Kerlix, Kling, 4.5, Sterile (2) | Triage Tags (6) |
| Digital Thermometer (1) | |

APPENDIX B

FIRELINE EMERGENCY MEDICAL TECHNICIAN

PARAMEDIC (ALS) PACK INVENTORY **IN ADDITION TO THE BASIC LIFE SUPPORT INVENTORY, THE FOLLOWING ADDITIONAL ITEMS OR EQUIVALENTS SHALL BE CARRIED BY THE FEMP

ALS AIRWAY EQUIPMENT:

| | |
|--|---|
| Endotracheal Intubation Equipment (6.0, 7.5 ET – Mac 4, Miller 4, stylet and handle) | Needle Thoracostomy Kit (1) |
| End Tidal CO2 Detector | Pulse Oximeter (Optional) |
| ETT Restraint | iGel Airway (1 – Size 3 and 1 – Size 4) |

IV/MEDICATION ADMIN SUPPLIES:

| | |
|------------------------|--------------------------------------|
| 1 ml TB Syringe (2) | 20 ga. IV Catheter (2) |
| 10 ml Syringe (2) | IV Site Protector (2) |
| 18 ga. Needle (4) | IV Administration Set-Macro-Drip (2) |
| 25 ga. Needle (2) | Alcohol Preps (6) |
| Adult EZ-IO Kit (1) | Betadine Swabs (4) |
| | E-Z IO Stabilizer |
| EZ Connect Tubing (2) | Glucometer Test Strips (4) |
| 25 mm EZ-IO Needle (1) | Lancet (4) |
| 45 mm EZ-IO Needle (1) | Razor (1) |
| 14 ga. IV Catheter (2) | Tape (1) |
| 16 ga. IV Catheter (2) | Tourniquet (2) |
| 18 ga. IV Catheter (2) | |

MISCELLANEOUS:

| | |
|--------------------------------------|-----------------------------|
| AMA Paper Forms (3) | PCR Paper Forms (6) |
| FEMP Pack Inventory Sheet (1) | Sharps Container – Small(1) |
| Narcotic Storage (per agency policy) | |

BIOMEDICAL EQUIPMENT:

| | |
|---|----------------|
| Defibrillator Electrodes (2) | Glucometer (1) |
| Defibrillator with ECG Waveform Display (1) | |

MEDICATIONS:

| | |
|---|--|
| Amiodarone 50 mg/ml 3 ml (3) | Epinephrine 1mg/10ml (3) |
| Albuterol – 90mcg/puff (1 MDI) with Spacer Device | Glucagon 1 mg/unit (1) |
| Aspirin-Chewable (1 Bottle) | Midazolam 10 mg |
| Atropine Sulfate 1mg (2) | Fentanyl 50 mcg/ml (4) |
| | Naloxone – 2mg (2) |
| Dextrose 10% 10 G, 250ml. (1) | Nitroglycerin 1/150 gr (1) |
| Diphenhydramine 50 mg (4) | Saline 0.9% IV 1,000 ml – Can be configured into two 500 ml or four 250 ml |
| Epinephrine 1mg/mL (2) | 5% Dextrose in Water, 50 ml (1) |

Suspected Stroke

BLS Procedures

Administer oxygen for SpO2 less than 94%

Perform Stroke Assessment

- Cincinnati Prehospital Stroke Scale (CPSS)
- Time Last Known Well
- Determine Blood Glucose level

ALS Standing Orders

IV/IO access

Cardiac monitor

Patients meeting Stroke Alert criteria:

- **Cincinnati Prehospital Stroke Scale (CPSS)** – 1 or more Abnormal results
- **Time Last Known Well (TLKW)** - within 24 hours
- **Blood Glucose** > 60 mg/dl
- Notify Base hospital within 10 minutes of identifying a Stroke Alert
- Expedite transport to appropriate Acute Stroke Center (ASC)

Patients meeting LVO Alert criteria (3 + 1):

- **CPSS Score of 3** – Abnormal results for facial droop, arm drift, and speech
- **+ Ventura County LVO Score (VES) of 1 or more** – 1 or more Abnormal results
- **Time Last Known Well (TLKW)** – within 24 hours
- **Blood Glucose** > 60 mg/dl
- Notify TCASC within 10 minutes of identifying an LVO Alert
- Expedite transport to appropriate Thrombectomy Capable Acute Stroke Center (TCASC)

Base Hospital Orders Only

Consult with ED Physician for further treatment measure

Additional Information:

Cincinnati Prehospital Stroke Scale (CPSS)

Ventura County LVO Score (VES)

Facial Droop

Forced Eye Deviation

Normal: Both sides of face move equally

Abnormal: One side of face does not move normally

Aphasia

Arm Drift

Neglect

Normal: Both arms move equally or not at all

Abnormal: One arm does not move, or one arm drifts down compared with the other side

Obtundation

Speech

Normal: Patient uses correct words with no slurring

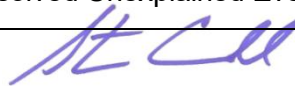
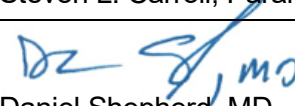
Abnormal: Slurred or inappropriate words or mute

- Document name and phone number in ePCR of person who observed patient's Time Last Known Well (TLKW) and report this information to the receiving facility.
- Refer to VCEMS Policy 451 for CPSS, VES and alert criteria details.

Effective Date: July 1, 2026

Date Revised: September 24, 2025
Last Reviewed: September 24, 2025


VCEMS Medical Director

| | | | |
|--|---|---|--|
| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Brief Resolved Unexplained Event (BRUE) | | Policy Number: 724 | |
| APPROVED: Administration: |  Steven L. Carroll, Paramedic | Date: July 1, 2026 | |
| APPROVED: Medical Director |  Daniel Shepherd, MD | Date: July 1, 2026 | |
| Origination Date: | March, 2005 | Effective Date: July 1, 2026 | |
| Date Revised: | April 11, 2024 | | |
| Date Last Reviewed: | February 12, 2026 | | |

- I. PURPOSE: To define and provide guidelines for the recognition, assessment and treatment of infants with a Brief Resolved Unexplained Event (BRUE).
- II. AUTHORITY: Health and Safety Code, Sections 1797.220 and 1798.
- III. POLICY: All EMS personnel should be knowledgeable with BRUE and follow the guidelines listed below.
- IV. PROCEDURE:
 - A. Recognition:
 1. BRUE is used to describe an event occurring in an infant less than 1 year of age when the observer reports a sudden, brief, and now resolved episode of 1 or more of the following:
 - a. Cyanosis or pallor
 - b. Absent, decreased, or irregular breathing
 - c. Marked change in tone (hyper- or hypotonia)
 - d. Altered level of responsiveness
 2. These events are characterized as “brief” (less than 1 minute and usually less than 20 – 30 seconds) and “resolved” (meaning the patient returned to baseline state of health after the event).
 3. BRUEs are also “unexplained,” meaning that a clinician is unable to explain the cause of the event after an appropriate history and physical examination.
 4. High and Low-risk Infants
 - a. High-risk infants
 - i. Infants less than 2 months of age
 - ii. History of prematurity (higher in infants born at less than 32 weeks)
 - iii. More than one event

b. Low-risk infants

- i. Age greater than 60 days
 - ii. Born greater than or equal to 32 weeks gestation
 - iii. Corrected gestational age is greater than or equal to 45 weeks
 - iv. First event (no previous BRUE ever and not occurring in clusters)
 - v. Event lasted less than 1 minute
 - vi. No CPR by trained medical provider
 - vii. No concerning historical features
 - viii. No concerning physical examination findings
- c. Infants who have experienced a BRUE who do not qualify as lower-risk patients are, by definition, at higher risk.

B. Assessment and Treatment

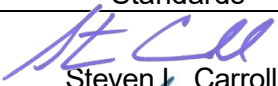

1. Perform a physical exam that includes general appearance, skin color, extent of interaction with the environment, and evidence of current or past trauma.

Note: Exam May Be Normal.

2. Obtain medical history, family history, and history of the event.
3. Treat any identifiable causes as indicated.
4. Base Hospital contact required.

C. Precautions

1. In most cases, the infant will have a normal physical exam when assessed by healthcare providers. The parent/caregiver's perception that "something is or was wrong" must be taken seriously. **Assume the history given is accurate.**
2. Keep in mind, especially if the parent/guardian declines transport to the hospital, that child abuse may be a cause of the BRUE symptoms listed above.
 - a. If child abuse is suspected, refer to the reporting guidelines in VCEMS Policy 210.

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|---|--|---|--|
| COUNTY OF VENTURA HEALTH CARE AGENCY | | EMERGENCY MEDICAL SERVICES POLICIES AND PROCEDURES | |
| Policy Title: Lay Rescuer Automated External Defibrillation (AED) Service Provider Standards | | Policy Number 1301 | |
| APPROVED: EMS Administrator:  Steven L. Carroll, Paramedic | | Date: July 1, 2026 | |
| APPROVED: Medical Director:  Daniel Shepherd, M.D. | | Date: July 1, 2026 | |
| Origination Date: September 14, 2000 | | | |
| Date Revised: October 9, 2025 | | Effective Date: July 1, 2026 | |
| Date Last Reviewed: October 9, 2025 | | | |

I. PURPOSE:

- A. To provide for system wide lay rescuer automated external defibrillation standards, review and oversight by Ventura County Emergency Medical Services.
- B. To provide structure to programs implementing automated external defibrillators for use by lay persons treating victims of cardiac arrest.
- C. To provide for integration of public access defibrillation (PAD) programs in the established emergency medical services system.
- D. To provide a mechanism for AED quality improvement throughout the Ventura County EMS System.

II. AUTHORITY: California Health and Safety Code Sections 1797.5, 1797.107, 1797.190, 1797.196 and 104113.

III. SERVICES PROVIDED AND APPLICABILITY: AED programs shall be operated consistent with VCEMS policy and California state statutes and regulations.

IV. DEFINITIONS:

- A. "AED Service Provider" means any agency, business, organization or individual who purchases an AED for use in a medical emergency involving an unconscious person who is not breathing normally. This definition does not apply to individuals who have been prescribed an AED by a physician for use on a specifically identified individual.
- B. "Automated External Defibrillator" or "AED" means an external defibrillator that, after user activation, is capable of cardiac rhythm analysis and will charge and deliver a shock, either automatically or by user interaction, after electronically detecting and assessing ventricular fibrillation or rapid ventricular tachycardia.
- C. "Lay Rescuer" means any person, not otherwise licensed or certified to use the automated external defibrillator, who has met the training standards of this policy.
- D. "Cardiopulmonary resuscitation" or "CPR" means a basic emergency procedure for life support, consisting of artificial respiration, manual external cardiac massage, and maneuvers for relief of foreign body airway obstruction.

- E. “Internal Emergency Response Plan” means a written Internal Emergency Response Plan of action which utilizes responders within a facility to activate the “9-1-1” emergency system, and which provides for the access, coordination, and management of immediate medical care to seriously ill or injured individuals.
 - F. “Health studio” means a facility permitting the use of its facilities and equipment or access to its facilities and equipment, to individuals or groups for physical exercise, body building, reducing, figure development, fitness training, or any other similar purpose, on a membership basis. “Health studio” does not include a hotel or similar business that offers fitness facilities to its registered guests for a fee or as part of the hotel charges.
- V. AED VENDOR REQUIREMENTS: Any AED vendor who sells an AED to an AED Service Provider shall:
- A. Notify the AED Service Provider, at the time of purchase, in writing of the AED Service Provider’s responsibility to comply with this policy.
 - B. Provide to the acquirer of the AED all information governing the use, installation, operation, training, and maintenance of the AED.
- VI. GENERAL TRAINING PROVISIONS: APPLICATION AND SCOPE
- A. In an emergency situation, always call 9-1-1 first. A 9-1-1 operator can provide directions on how you can help someone experiencing sudden cardiac arrest. AEDs are not difficult to use, but **training in the use of AEDs is highly recommended**. This training, in connection with CPR training, is offered by major health organizations such as the American Heart Association and Red Cross as well as a number of private companies.
 - B. The training standards prescribed by this policy shall apply to employees of the AED service provider and not to licensed, certified or other prehospital emergency medical care personnel as defined by Section 1797.189 of the California Health and Safety Code.
- VII. AED TRAINING PROGRAM REQUIREMENTS: CPR and AED training shall comply with the American Heart Association or American Red Cross CPR and AED Guidelines. The training shall include the following topics and skills:
- A. Basic CPR skills;
 - B. Proper use, maintenance and periodic inspection of the AED;
 - C. The importance of;
 - 1. Early activation of an Internal Emergency Response Plan,
 - 2. Early CPR,
 - 3. Early defibrillation, and
 - 4. Early advanced life support
 - D. Overview of the local EMS system, including 9-1-1 access, and interaction with EMS personnel.

- E. Assessment of an unconscious patient, to include evaluation of airway and breathing, to determine appropriateness of applying and activating an AED.
- F. Information relating to defibrillator safety precautions to enable the individual to administer a shock without jeopardizing the safety of the patient or the Lay Rescuer or other nearby persons to include, but not limited to;
 - 1. Age and weight restrictions for use of the AED,
 - 2. Presence of water or liquid on or around the victim,
 - 3. Presence of transdermal medications, and
 - 4. Implantable pacemakers or automatic implantable cardioverter-defibrillators;
- G. Recognition that an electrical shock has been delivered to the patient and that the defibrillator is no longer charged.
- H. Rapid, accurate assessment of the patient's post-shock status to determine if further activation of the AED is necessary; and,
- I. The responsibility for continuation of care, such as continued CPR and repeated shocks, as indicated, until the arrival of more medically qualified personnel.

The training standards prescribed by this section shall not apply to licensed, certified or other prehospital emergency medical care personnel as defined by Section 1797.189 of the California Health and Safety Code.

VIII. AED SERVICE PROVIDER OPERATIONAL REQUIREMENTS

- A. An AED Service Provider shall do all of the following:
 - 1. Comply with all regulations governing the placement of an AED.
 - 2. Notify an agent of the local EMS agency of the existence, location, and type of AED acquired. (See attachment A)
 - 3. Ensure that the AED is maintained and tested according to the operation and maintenance guidelines set forth by the manufacturer.
 - 4. Ensure that the AED is tested at least biannually and after each use.
 - 5. Ensure that an inspection is made of all AEDs on the premises at least every 90-days for potential issues related to operability of the device, including a blinking light or other obvious defect that may suggest tampering or that another problem has arisen with the functionality of the AED.
 - 6. Ensure that records of the maintenance and testing required pursuant to this paragraph are maintained.
 - 7. Notify an agent of the local EMS agency of any application and activation of the AED. (see Attachment B)
- B. When an AED is placed in a building, the building owner shall do all of the following:

1. At least once a year, notify the tenants as to the location of the AED units and provide information to tenants about who they can contact if they want to voluntarily take AED or CPR training.
 2. At least once a year, offer a demonstration to at least one person associated with the building so that the person can be walked through how to use an AED properly in an emergency. The building owner may arrange for the demonstration or partner with a nonprofit organization to do so.
 3. Next to the AED, post instructions, in no less than 14-point type, on how to use the AED.
- C. A medical director or other physician and surgeon is not required to be involved in the acquisition or placement of an AED.
- D. When an AED is placed in a public or private K–12 school, the principal shall ensure that the school administrators and staff annually receive information that describes sudden cardiac arrest, the school’s emergency response plan, and the proper use of an AED. The principal shall also ensure that instructions, in no less than 14-point type, on how to use the AED are posted next to every AED. The principal shall, at least annually, notify school employees as to the location of all AED units on the campus.

IX. HEALTH STUDIO AED SERVICE PROVIDER OPERATIONAL REQUIREMENTS

- A. A Health Studio AED Service Provider shall do all of the following:
1. Every health studio, as defined, shall acquire, maintain, and train personnel in the use of, an automatic external defibrillator pursuant to this section.
 2. Comply with all regulations governing the placement of an automatic external defibrillator.
 3. Ensure all of the following:
 - a. The automatic external defibrillator is maintained and regularly tested according to the operation and maintenance guidelines set forth by the manufacturer, the American Heart Association, or the American Red Cross, and according to any applicable rules and regulations set forth by the governmental authority under the federal Food and Drug Administration and any other applicable state and federal authority.
 - b. The automatic external defibrillator is checked for readiness after each use and at least once every 30 days if the automatic external defibrillator has not been used in the preceding 30 days. The health studio shall maintain records of these checks.
 - c. A person who renders emergency care or treatment to a person in cardiac arrest by using an automatic external defibrillator activates the emergency medical services system as soon as possible and reports the use of the

automatic external defibrillator to the licensed physician and to the local EMS agency.

- d. For every automatic external defibrillator unit acquired, up to five units, no less than one employee per automatic external defibrillator unit shall complete a training course in cardiopulmonary resuscitation and automatic external defibrillator use that complies with the regulations adopted by the Emergency Medical Services Authority and the standards of the American Heart Association or the American Red Cross. After the first five automatic external defibrillator units are acquired, for each additional five automatic external defibrillator units acquired, a minimum of one employee shall be trained beginning with the first additional automatic external defibrillator unit acquired. Acquirers of automatic external defibrillator units shall have trained employees who should be available to respond to an emergency that may involve the use of an automatic external defibrillator unit during staffed operating hours. Acquirers of automatic external defibrillator units may need to train additional employees to ensure that a trained employee is available at all times.
- e. There is a written plan that exists that describes the procedures to be followed in the event of an emergency that may involve the use of an automatic external defibrillator, to ensure compliance with the requirements of this section. The written plan shall include, but not be limited to, immediate notification of 911. and trained office personnel at the start of automatic external defibrillator procedures.



Ventura County EMS Agency Notice of New Public Access Defibrillation Program

| Location of AED | |
|---|--|
| Name of Building / Business | |
| Address of Building City, State, Zip | |
| Floor and/or AED Location Description | |
| Is AED in public view (yes/no) | |
| Can public access the AED (yes/no) | |
| Make/Model of AED | |
| AED Serial Number | |

| On-Site Contact Information | |
|--|--|
| Name of On-Site Contact | |
| Email Address of On Site Contact | |
| Phone Number of On-Site Contact | |
| Mailing Address of On-Site Contact (if different from Business) | |

Please check if you wish to be excluded from our Pulse Point Database.
For more information on the Pulse Point Program, please visit:
<http://www.pulsepoint.org/>

**Please complete a separate form for each AED Site.
Additional locations on the same site can be listed on page 2.**

Return this completed form to:
Ventura County EMS - AED Program
2220 E. Gonzales Road, Suite 200
Oxnard, CA 93036-0619

Phone: 805-981-5301 FAX: 805-981-5300 Email: EMSAgency@venturacounty.gov

| | | | |
|-----------------------|----------|-------|-----|
| For Internal Use Only | Received | Date: | By: |
| PSAP Notified | | Date | By: |

Requirements for acquiring and placing a public access AED are located in Sections 1797.196 and 104113 of the California Health and Safety Code and 1714.21 of the Civil Code.



Additional Locations on the Same Site

| Location of AED | |
|---|--|
| Building, Floor and/or Room AED Location Description | |
| Is AED in public view (yes/no) | |
| Can public access the AED (yes/no) | |
| Make/Model of AED | |
| AED Serial Number | |

| Location of AED | |
|---|--|
| Building, Floor and/or Room AED Location Description | |
| Is AED in public view (yes/no) | |
| Can public access the AED (yes/no) | |
| Make/Model of AED | |
| AED Serial Number | |

| Location of AED | |
|---|--|
| Building, Floor and/or Room AED Location Description | |
| Is AED in public view (yes/no) | |
| Can public access the AED (yes/no) | |
| Make/Model of AED | |
| AED Serial Number | |

| Location of AED | |
|---|--|
| Building, Floor and/or Room AED Location Description | |
| Is AED in public view (yes/no) | |
| Can public access the AED (yes/no) | |
| Make/Model of AED | |
| AED Serial Number | |



Ventura County EMS Agency REPORT OF CPR OR AED USE

| | |
|---|--------|
| AED Program (location name) | |
| AED Provider (defibrillator user) | |
| Place of Occurrence (address and specific site) | |
| Date Incident Occurred | |
| Time of Incident | |
| Patient's Name (if able to determine) | |
| Patient's Age (Estimate if unable to determine) | |
| Patient's Sex (Male or Female) | |
| Time (Indicate best known or approximated time lapse between events): | |
| • Witnessed arrest to CPR | min(s) |
| • Witnessed arrest to 9-1-1 Called | min(s) |
| • Witnessed arrest to first shock | min(s) |
| • Patient contact to first shock | min(s) |
| • 9-1-1 to arrival on scene | min(s) |
| • 9-1-1 to first shock | min(s) |
| Total number of defibrillation shocks | |

| | | |
|--|-----|----|
| Was the cause of the arrest determined? | Yes | No |
| Was the cause of the arrest cardiac? | Yes | No |
| Was the arrest witnessed? | Yes | No |
| Was bystander CPR implemented? | Yes | No |
| Was there any return of spontaneous circulation? | Yes | No |

Please attach any additional information that you think would be helpful.

This form must be completed and sent to Ventura County EMS within 96 hours of a cardiac arrest incident at an AED site.

Return this completed form to:
Ventura County EMS - AED Program
2220 E. Gonzales Road, Suite 200
Oxnard, CA 93036-0619

Phone: 805-981-5301 FAX: 805-981-5300 Email: EMSAgency@venturacounty.gov

Office Use Only

| | |
|-----------------------------------|--|
| Date Received by EMS Agency | |
| Patient prehospital outcome | |
| Patient discharged from hospital? | |