NORTHWEST
COMMUNITY
EMERGENCY
MEDICAL
SERVICES
SYSTEM

PROCEDURE MANUAL

February 6, 2024

NWC EMSS PROCEDURE MANUAL Feb. 6, 2024

NWC EMSS Skill Performance Record

GENERAL (Medical) PATIENT ASSESSMENT

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: You are asked to assess the patient, intervene as needed, and call your findings in to the hospital.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
SCENE SIZE UP Situational awareness; dynamic risk assessment –Assess/intervene as needed:		
* Determine scene safety; control & correct hazards; remove pt/crew from unsafe environment ASAP		
If a potential crime scene, make efforts to preserve possible evidence		
* Determine nature of illness; scan environment for clues; DNR/POLST orders		
* Universal blood/body secretion & sharps precautions; use appropriate PPE for patient situation		
Determine number of patients & triage if necessary. Determine need for additional assistance and request additional help if necessary, Weigh risk of waiting for resources against benefit of rapid transport to definitive care. Consider if medium or large scale MPI declaration is needed.		
PRIMARY ASSESSMENT/RESUSCITATION (IMC) | Time assessment began:		
Introduce self to patient; explain your role, establish rapport; ask the patient their legal name (aligned w/ their SS number) and what they prefer to be called		
Use touch appropriately: handshake, touch on the arm, holding a hand based on patient consent		
Make eye contact and sit at eye level when possible		
Form general impression: age, gender, general appearance, position, purposeful movements		
*Determine if immediate life threat exists and resuscitate as found		
*Determine **Level of consciousness** using AVPU or GCS		
Determine chief complaint S&S		
*If unconscious, apneic or gasping, & pulseless START QUALITY CPR		
***AIRWAY**: Assess for impairment: Snoring, gurgling, stridor, silence; consider possible neuro deficit		
Intervention: ☐ Open/maintain using position, suction, and appropriate adjuncts ☐ If impaired: Go to AIRWAY FB Airway OBSTRUCTION or Advanced airways | DAI SOPs ☐ Loosen tight clothing; vomiting and seizure precautions as indicated		
***Breathing**/gas exchange/adequacy of ventilations. Assess/intervene as needed ☐ Assess for spontaneous ventilations; general rate (normal, fast or slow) ☐ Assess depth; effort/WOB; accessory muscle use ☐ Assess position, adequacy of air movement, symmetry of chest expansion, retractions ☐ Lung sounds if in ventilatory distress ☐ **Assess gas exchange;** apply SpO_2 monitor; assess for hypoxia, cardiorespiratory or neurological compromise. Note before & after O_2 if able. Note signs of hypoxia ☐ Assess $ETCO_2$ number& waveform if possible ventilatory, perfusion, metabolic compromise		
***Correct hypoxia/**assure adequate ventilations: Target SpO_2: 94%-98% (88%-92% COPD) unless hyperoxia contraind. ☐ **O_2 1-6 L/NC**: Adequate rate/depth; minimal distress; SpO_2 92%-93% (88%-91% COPD) ☐ **O_2 12-15 L/NRM:** Adequate rate/depth: mod/severe distress; SpO_2 < 92%; (<88% COPD) ☐ **O_2 15 L/ BVM:** Apnea and/or shallow/inadequate rate/depth with moderate/severe distress; unstable. Adults: 1 breath every 6 sec (10 breaths/minute) (Asthma: 6-8 BPM) ☐ **CPAP:** Complaints related to primary respiratory, ventilatory, or cardiovascular dysfunction (See SOP appendix for indications/contraindications). *Hyperoxia contraindicated: Uncomplicated AMI; post-cardiac arrest; COPD; stroke; newborn resuscitation. Give O_2 only if evidence of hypoxia; titrate to relieve hypoxemia w/o causing hyperoxia: SpO_2 94% (92% COPD)		
***CIRCULATION / PERFUSION / ECG**: ☐ Central and peripheral pulses for presence, general rate/quality/regularity ☐ **Perfusion**: Mental status (central); skin: color, temperature, moisture; turgor (peripheral) ☐ Identify type, volume, & source(s) of internal bleeding/volume loss from a medical cause		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
☐ Assess jugular veins for distension ☐ Verbalize need for **ECG:** (rhythm/12 L) based on CC or PMH: pain/discomfort nose to navel (including abdominal pain), resp. distress/ dyspnea; HF, AMS - weak/tired/ fatigued, dizziness/syncope, c/o nausea, indigestion, palpitations/ dysrhythmia, diaphoresis, etc.		
☐ Treat rate/rhythm/pump/volume/volume distribution disorders per appropriate SOP ☐ **Vascular access:** actual/potential volume replacement and/or IV meds prior to hospital arrival **0.9% NS** – Catheter size, access site, & infusion rate based on pt size, hemodynamic status; SOP or OLMC. Do not delay transport of time-sensitive pts to establish elective vascular access on scene ☐ **Indications for IO**: Pts in extremis urgently needing fluids and/or meds (circulatory collapse; difficult, delayed, or impossible venous access; or conditions preventing venous access at other sites). If conscious: Lidocaine 2% 1 mg/kg (max 50 mg) IO before NS flush unless contraindicated ☐ If peripheral IV unsuccessful / not advised, may use central venous access devices already placed based on OLMC		
***Disability if altered mental status** ☐ Assess glucose level (verbalizes) ☐ Assess pupils for size, shape, equality, reactivity to light (direct & consensual) ☐ Assess Glasgow Coma Score (using chart in SOP) ☐ Evaluate gross motor and sensory function in all extremities; if acute stroke suspected go to Stroke SOP		
***Exposure/environment** ☐ Discretely undress patient to inspect appropriate body areas; protect patient modesty ☐ Maintain body warmth		
*Identify time-sensitive (priority transport) patients/makes appropriate transport decision Scene time goal: 10 min or less		
SECONDARY ASSESSMENT		
Vital signs ☐ *BP (MAP); obtain 1st manually; trend pulse pressure, MAP, orthostatic changes prn ☐ *Pulse: rate, quality, rhythmicity (location) ☐ *Resp: rate, pattern, depth, effort ☐ Temperature if skin hot, cool, cold		
History of present illness (HPI) / Chief complaint(s) ☐ Onset ☐ *Quality ☐ *Severity ☐ *Provocation/palliation ☐ *Region/radiation/recurrence ☐ *Time (last seen normal) ☐ Clarifying questions / Associated complaints		
SAMPLE history ☐ *Allergies (medications, latex, insects, animals, environment, chemicals, foods) ☐ *Medications: Rx; OTC, street, Complementary and alternative meds (CAM) – bring to hospital if possible ☐ *PMH: Past pertinent history: medic-alert jewelry; advance directives; medical devices/implants ☐ *Last oral intake/LMP ☐ *Events leading to present illness | In pts with **syncope, seizure, AMS, cardiac arrest, or acute stroke**, consider bringing witness to hospital or obtain **call back phone number** ☐ *Date of birth; approx. weight		
PHYSICAL EXAM (Review of Systems) – must touch the patient		
Head/eyes, ear, nose throat (HEENT) ☐ *Inspect for contour/symmetry, weakness, abnormal secretions, sensation, movements, edema ☐ Palpate: skull, orbits, nasal and facial bones		
Neck ☐ *Inspect: jugular veins, edema | ☐ Palpate: position of trachea; cervical spines		
Chest: Pulmonary/Cardiovascular ☐ *Inspect: Symmetry, contour/shape; AP/lateral diameter; movement, deformity, retractions ☐ *Palpate ☐ *Auscultate breath sounds; heart sounds if applicable		
Abdomen/pelvis/genitalia/reproductive organs - in correct order ☐ *Inspect (contour, symmetry, discoloration; pain; changes in function (verbalizes) ☐ Auscultate bowel sounds ☐ *Palpate (light) for point tenderness, guarding, rigidity; ✓ rebound tenderness if S&S peritonitis		
Musculoskeletal assessment: Lower extremities ☐ Inspect contour, symmetry, edema, skin changes, discoloration ☐ *Palpate: pulses, warmth, pain; pitting edema ☐ Sensory/Motor/Vascular status of each limb		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Upper extremities ☐ Inspect contour, symmetry, edema, skin changes, discoloration ☐ *Palpate: pulses, warmth, pain; pitting edema ☐ Sensory/Motor/Vascular status of each limb		
Back ☐ Inspect ☐ Palpate		
Neurologic ***Mental status**: Affect, behavior, cognition (verbalizes), insight; memory/orientation; GCS **Cranial nerves** (Select) ☐ Loss of smell ☐ *Visual acuity/fields ☐ EOMs (Abn. eye movements/gaze palsy) ☐ *Pupil size, shape, equality ☐ *Pupil reactivity to light (direct/consensual) ☐ Facial sensation/bite strength ☐ Facial movement/symmetry/eyelid opening/closing ☐ Hearing ☐ Gag reflex ☐ Stick out tongue **Cerebellar exam**: Assess for ataxia ☐ **Eyes**: nystagmus ☐ **Upper extremities**: Have pt. touch their index finger to their nose and then reach out to touch examiner's finger; OR perform alternating movements by rapidly pronating and supinating hands; OR bring fingers to thumb in rapid succession ☐ **Lower extremities**: Have pt. slide heel of one foot rapidly up and down shin of opposite leg ☐ If possible stroke: Prehospital **Stroke Screen**:		
Skin: Integumentary assessment (integrated above) color (variation), moisture, temp, texture, turgor, lesions/breakdown; hair distribution; nails (clubbing)		
Psychological/social assessment		
*State **EMS impression**:		
Verbalize treatment plan and appropriate interventions		
Nausea/vomiting: Ondansetron per SOP		
Pain: Treat per PAIN management SOP		
Transport decision re-evaluated		
On-going assessment enroute		
Repeat primary & secondary assessments		
Evaluate responses to treatments		
Reassess VS/pt. responses. Every transported pt. should have at least 2 sets of VS. ☐ **Stable**: At least q. 15 min & after each drug/cardiorespiratory intervention; last set should be taken shortly before arrival at receiving facility ☐ **Unstable**: More frequent reassessments; continue to reassess all abnormal VS & physical findings		
Actual time to complete assessment in minutes		
Report to hospital		
Identification ☐ *Hospital being contacted ☐ *EMS provider agency and unit #; call back number		
☐ *Age, gender, and approximate weight of patient ☐ *Level of consciousness (conscious/unconscious responds to ....)		
HPI / Chief complaint(s) (list): ☐ Onset ☐ *Quality ☐ *Severity ☐ *Provocation/palliation ☐ *Region/radiation/recurrence ☐ *Time		
Associated complaints:		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
History ☐ *Allergies ☐ *Medications (current): time and amount of last dose if applicable ☐ *Past medical history (pertinent) ☐ Last oral intake, last menstrual period if indicated ☐ *Events leading up to present illness/injury (history of present illness)		
Vital signs: ☐ *BP: Auscultated/automated ☐ *Respirations: rate, pattern, depth, effort ☐ Temp prn ☐ *Pulse: rate , quality, rhythmicity ☐ SpO_2 ☐ $EtCO_2$ (number & waveform)		
*Physical examination findings; include pertinent positives and negatives		
Treatments initiated prior to hospital contact (IMC) and patient response to treatment		
ETA		
Critical error criteria in addition to starred items - Check if occurred during an attempt ☐ Failure to initiate or call for transport of the patient within 10 minute time limit ☐ Failure to find or appropriately manage problems associated with airway, breathing, hemorrhage or shock [hypoperfusion] ☐ Failure to differentiate the pt's need for immediate transport vs assessment & treatment at scene ☐ Did not perform with appropriate technique, sequence, or timing; needed excessive prompts, coaching, or reliance on procedure manual ☐ Performed in a way that could cause harm to a pt or is inconsistent with competent care ☐ Exhibited unacceptable affect with patient or other personnel		

Factually document below your rationale for checking any of the above critical criteria.

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Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

☐ **Competent:** All key steps independently performed with correct technique, sequence and timing. All starred (*) items explained/performed correctly with no critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 1/24

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Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

BLOOD PRESSURE ASSESSMENT- Auscultation

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: You are asked to assess an adult's BP using the auscultatory method.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Equipment needed: Aneroid sphygmomanometer (well-maintained including regular recalibration) w/ multiple size cuffs | Stethoscope		
State the determinants of obtaining an accurate BP Proper pt position & preparation; proper cuff size selection, no talking or movement during measurement; effective inflation and deflation of cuff bladder; careful detection of Korotkoff sounds		
***Properly position patient**: Seat comfortably with back supported or supine, Uncross legs. Place arm in a relaxed, slightly flexed position close to the level of the heart. Do not lift arm during procedure.		
***Select arm: Do not use** one that has an injury, shunt or graft, or is on the side of a mastectomy. A mastectomy should be considered a relative rather than absolute contraindication to arm selection.		
Properly expose the patient / remove clothing that covers the arm if possible Assess BP during secondary assessment, which begins with exposing the pt.		
***Select appropriate size cuff.** Individualized selection of cuff for pt. size An air bladder allows the cuff to be inflated and deflated and typically runs ½-2/3 the length of the cuff. Bladder length should be 75%–100% of the pt's measured mid-upper arm circumference Width should be 37%–50% of the patient's arm circumference (a length-to-width ratio of 2:1) or ~2/3rd the height of the upper arm. Most adults require a large or regular size cuff. Need multiple sizes of peds cuffs. **Range and Index markings** on the cuff: If the correct size, the index marking will fall between the range markings when the cuff is wrapped on the patient's arm. Using wrong size cuff (too wide, narrow, long, or short) will result in an inaccurate measurement. ▪ Cuff too small: Falsely high reading ▪ Cuff too large: Falsely low reading **Obese pt:** Most frequent error is "miscuffing," with undercuffing large arms (84% of the miscuffings) Alternative: Use an extra-large cuff or place regular cuff around forearm and auscultate over radial artery.		
***Palpate the brachial artery with arm fully extended** Pulse is generally felt at medial aspect of the antecubital fossa where the artery comes closest to the skin.		
***Properly position the cuff on bare skin –** do not roll up sleeves as this may create a tourniquet effect Find the artery indicator on the cuff (↓ or symbol) and place directly over the brachial artery. Wrap the cuff smoothly and snugly around the arm with the lower cuff margin positioned 1 inch above point where the pulse was located. (Difficult to make cuff too tight to the arm; easy to make it too loose). Clear tubing away from the cuff. Sources vary re: BP changes if cuff is placed over clothing. Best practice statements: If possible, place cuff directly on skin (unless burned).		
☐ *Place the aneroid manometer gauge so you can see it: Graduation marks denote pressure in mm Hg. The location of the needle indicates pressure in the cuff. ☐ *Ask patient not to talk while reading is being obtained		
***INITIALLY palpate systolic BP for proper cuff inflation** (see note below) ☐ While palpating the radial or brachial artery, sequentially squeeze the inflation bulb to inflate cuff to ~30 mmHg above point where pulse disappears. Slowly turn release valve counter clockwise to deflate cuff until pulse returns and note reading. Deflate cuff entirely ☐ ***Place stethoscope head over point where brachial pulse was palpated;** hold firmly in place. ☐ *Inflate cuff to 30 mmHg above palpated SBP. This avoids under- and over-inflation.		
***Deflate cuff:** Slowly deflate cuff at a rate of 2-3 mmHg per beat while looking straight-on at the manometer. Don't deflate too fast or too slow! Looking at the manometer at an angle can result in parallax error—an inaccurate measurement due to optics.		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
***Accurately auscultate (Korotkoff) sounds** Five distinct phases of Korotkoff sounds are acknowledged to be significant in BP measurement: Phase 1: First detectable sounds; correspond to appearance of a palpable pulse (Systolic); Phase 2: Sounds take on a fainter, swishing sound and may transiently disappear; Phase 3: Sounds become loud with a thumping quality; Phase 4: Pitch intensity changes and sounds suddenly become muffled; and Phase 5: Sounds disappear. Diastolic pressure note at start of phase 5 (AHA, 1981).		
***If readings are unclear or not distinctly heard:** Fully deflate cuff. Wait 30 seconds, let the artery rest, and try again. DO NOT pump the cuff up again from a partially inflated state. It may cause the artery to spasm and will change the accuracy of the reading.		
Critical error criteria in addition to starred items - Check if occurred during an attempt ☐ Failure to take or verbalize body substance isolation precautions ☐ Failure to position and support patient appropriately ☐ Miscuffs: Failure to select and correctly apply an appropriately sized cuff on bare skin ☐ Failure to palpate brachial pulse and estimate palpated SBP ☐ Failure to properly inflate or deflate cuff ☐ Failure to accurately interpret systolic and diastolic readings ☐ Performs in a way that could cause harm to a pt or is inconsistent with competent care ☐ Exhibits unacceptable affect with patient or other personnel		

Factually document below your rationale for checking any of the above critical criteria.

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_____

Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

☐ **Competent:** All key steps independently performed with correct technique, sequence and timing. All starred (*) items explained/performed correctly with no critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 11/23

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Preceptor (PRINT NAME – signature)

Note on auscultated vs machine BPs:

With the auscultated technique the role of the cuff is to compress the artery under a defined reference pressure, whereas with the automated method the cuff is the signal sensor and the reference point is not the artery occlusion but the oscillometric peak signal that measures MAP then calculates systolic and diastolic blood pressures. Standard of care is to take 1st set of VS manually and then compare reading from automated approach.

Note on need to palpate SBP first:

Skipping this step can lead to overinflation of the cuff and an underestimation of the SBP in the presence of an auscultatory gap (Korotkoff sounds disappear for up to 30 mmHg before reappearing. Typically noted during Phase 2, the auscultatory gap has been assoc. with serious vascular disease and chronic HTN). As with pericardial tamponade, only by using an aneroid sphygmomanometer can one observe this clinically significant finding, which in turn can inform diagnostic decisions.

BP cuff sizes corresponding to patient ARM size		
Cuff size	Arm circumference (cm)	Bladder dimension (width X length), cm*
Small adult	22-26	12 X 22
Adult	27-34	16 X 30
Large adult	35-44	16 X 36
Extra-large adult	45-52	16 X 42

*Bladder and cuff size may vary by manufacturer Adapted with permission from Pickering et al, (American Heart Association, Inc.)

Effects of Cuff Size on the Accuracy of Blood Pressure Readings: The Cuff(SZ) Randomized Crossover Trial JAMA Intern Med 2023 Aug 07; [EPub Ahead of Print], J Ishigami, J Charleston, ER Miller, K Matsushita, LJ Appel, TM Brady

NWC EMSS Skill Performance Record

TRAUMA ASSESSMENT

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: You are asked to assess the patient, intervene as needed, and call your findings in to the hospital.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
SCENE SIZE UP- Time Assessment began:		
*Determine scene safety; control & correct hazards; remove pt/crew from unsafe environment ASAP		
If a potential crime scene, make efforts to preserve possible evidence		
*Determine nature of injury; scan environment for clues		
*Universal blood/body secretion & sharps precautions; use appropriate PPE for patient situation		
Determine # of pts & triage prn. Determine need for additional resources and request help if needed. Weigh risk of waiting for resources against benefit of rapid transport to definitive care. Consider if medium or large scale MPI declaration is needed.		
PRIMARY ASSESSMENT/RESUSCITATION (ITC) – Use MARCH approach if exsanguinating		
MARCH: Massive hemorrhage, Airway, Respiratory/breathing; Circulation; Head Inj.; Hypothermia		
Determine **Level of consciousness** using AVPU or GCS		
*If unconscious, apneic, & pulseless consider if CPR is indicated per Traumatic Arrest SOP		
Introduce self to patient; explain your role, establish rapport; ask the patient their legal name (aligned w/ their SS number) and what they prefer to be called		
Use touch appropriately: handshake, touch on the arm, holding a hand based on patient consent		
Make eye contact when possible		
Form general impression: age, gender, general appearance, position, surroundings, obvious injuries/ bleeding; purposeful movements		
Determine chief complaint S&S | Assess for immediate life threats; resuscitate as found		
***Airway/Spine**: Snoring, gurgling, stridor, silence; consider possible spine injury		
*Verbalize interventions for airway access/control if necessary ☐ Open/maintain using position, suction, appropriate adjuncts, & manual spine motion restriction prn ☐ Once airway controlled: Apply appropriate size c-collar + standard spine motion restriction if indicated ☐ Vomiting/seizure precautions as indicated		
***Breathing**/ventilatory/gas exchange status; assess for impairment ☐ Assess for spontaneous ventilations; general rate (fast or slow) ☐ *Assess effort (WOB); air movement, symmetry of expansion; accessory muscle use; retractions ☐ Assess breath sounds if in ventilatory distress ☐ **Assess gas exchange**; apply SpO_2 monitor if possible hypoxia, CR or neurological compromise (note before and after O_2 if able) ☐ Assess $EtCO_2$ number and waveform if ventilatory, perfusion, metabolic compromise ☐ **Assess for immediate life threats**: tension pneumothorax; open pneumothorax; flail chest ☐ Verbalize appropriate resuscitative intervention for life-threats ☐ Correct hypoxia to target SpO_2/ensures adequate ventilations to target $EtCO_2$ per SOP		
***Circulation/Perfusion/ECG**; assess for impairment ☐ Identify type, volume, source(s) and rate of bleeding; verbalize sequencing of external hemorrhage control per ITC SOP and Hemorrhage Control procedure if present ☐ Central and peripheral pulses for presence, general rate/quality/regularity/equality ☐ If no carotid pulse & CPR indicated: Rapid transport decision per Traumatic arrest SOP ☐ **Perfusion**: Mental status (central); skin: color, temperature, moisture; turgor (peripheral) ☐ Assess jugular veins for distension (consider obstructive shock etiologies) ☐ **Assess for immediate life threats**: Cardiac tamponade; blunt aortic or cardiac injury; shock ☐ Verbalize appropriate resuscitative intervention for life-threats		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
☐ **Vascular access:** Actual/potential volume replacement and/or IV meds prior to hospital arrival **0.9% NS (warm)** – Catheter size, access site, & infusion rate (warm fluids) based on pt size, hemodynamic status per IV Access procedure; SOP/OLMC. SHOCK: 14-16 g. WO up to 1 L based on SBP (MAP) targets, radial pulse, & mental status Do not exceed BP targets: Excess IVF may lead to uncontrolled hemorrhage, hypothermia, hypocoagulable state, & abdominal compartment syndrome o Penetrating torso trauma: Target SBP 80 (MAP 50-60) (permissive hypotension) o Blunt trauma: Target SBP 90 (MAP 60-65) | TBI: target SBP 110 (MAP > 65) or higher Do not delay transport in time-sensitive pts to establish elective vascular access on scene: Limit 2 attempts/route unless situation demands/OLMC order | May place peripheral line when moving; IO while stationary ☐ **Indications for IO**: Pts in extremis urgently needing IV fluids and/or meds (circulatory collapse; difficult, delayed, or impossible venous access; or conditions preventing venous access at other sites). If conscious/responsive ADULT: 1 mg/kg (max 50 mg - 2.5 mL) | PEDS: 0.5 mg/kg (max 40 mg - 2 mL) Push slowly over 2 min BEFORE NS flush, unless contraindicated. Allow lidocaine to dwell in IO space 60 sec. If needed; slowly give an addl. 0.5 mg/kg (max dose as above) IO over 60 sec. ☐ If peripheral IV unsuccessful / not advised, may use central venous access devices already placed based on OLMC ☐ Verbalize need for **ECG monitor** if pulse absent/irregular; actual or potential CR compromise ☐ Treat rate/rhythm/pump/volume/volume distribution disorders per appropriate SOP		
*__Disability if altered mental status: Assess the following__ ☐ Glucose ☐ Pupils: size, shape, equality, direct & consensual light reflex ☐ GCS ☐ Gross motor & sensory function all extremities; S&S ↑ ICP or herniation syndromes		
Exposure/environment ☐ Discretely undress patient to inspect appropriate body areas; protect patient modesty ☐ *Keep patient warm: **Prevent lethal triad:** hypothermia; acidosis; coagulopathy		
☐ **Transport decision per Trauma Triage | Transport Criteria** ☐ **Request scene response of aeromedical unit per System policy if applicable**		
SECONDARY ASSESSMENT: Continue SMR if indicated; complete enroute if needed		
Vital signs ☐ *BP (MAP); obtain 1st manually, trend pulse pressure, MAP, orthostatic changes prn ☐ Define hemodynamic instability: Hypotension on 2 consecutive assessments; 5 min apart ☐ *Pulse: rate, quality, rhythmicity ☐ *Resp: rate, pattern, depth, effort ☐ Temp based on skin		
History of present illness/trauma (HPI): Chief and associated complaints ☐ Onset ☐ *Quality ☐ *Severity ☐ *Provocation/palliation ☐ *Region/Radiation/Recurrence ☐ *Time		
*__SAMPLE history__ from patient/family/bystanders ☐ Allergies ☐ PMH; medical devices/implants ☐ *Events leading to injury/MOI ☐ Medications ☐ Last oral intake/LMP ☐ Age ☐ Approx. wt.		
PHYSICAL EXAM (Review of Systems): Deformities, **C**ontusions, **A**brasions, **P**unctures/penetrations, **B**urns, **L**acerations, **S**welling, **T**enderness**, I**nstability, **C**repitus, and distal **p**ulses, **m**otor/**s**ensory deficits **+ the following** based on CC; S&S; scope of practice, and level of acuity | **Must touch the patient**		
Head/face, eyes, ears, nose, mouth, throat (HEENT) ☐ *Inspect: DCAP-BLS, Drainage; ability to open & close jaw; malocclusion ☐ *Palpate: skull, orbits, nasal and facial bones		
Neck: May temporarily remove anterior c-collar to assess neck ☐ *Inspect: DCAP, BLS; jugular veins; SUBQ emphysema ☐ *Palpate: position of trachea; C-spines, carotid pulses		
Chest ☐ *Inspect: DCAP-BLS ☐ *Palpate TIC ☐ *Auscultate breath/heart sounds ☐ Suspect injuries: trauma to heart, lungs, thoracic great vessels; ribs, hemothorax, pneumothorax		
Abdomen/pelvis - in correct order ☐ *Inspect DCAP, BLS, Contour, pulsations, characteristic bruising patterns, pain referral sites ☐ *Auscultate bowel sounds ☐ *Palpate, localized tenderness, guarding, rigidity; rebound ☐ Suspect S&S of peritonitis by quadrant: involuntary guarding, rigidity; rebound tenderness ☐ **PELVIS/GU:** Inspect perineal brusing; blood at urinary meatus/rectum; swollen ecchymotic scrotum ☐ If suspected pelvic fracture; apply commercial pelvic binder; upside down KED		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Lower extremities ☐ *DCAP, BLS, Inspect for position, false motion, skin color, S&S of injury ☐ *Palpate ☐ *Assesses SMV status of each limb		
Upper extremities ☐ DCAP, BLS, Inspect for position, false motion, skin color, S&S of injury ☐ *Palpate ☐ *Assesses SMV status of each limb		
Posterior thorax/flank and buttocks ☐ *Inspect DCAP, BLS ☐ *Palpate (assess for muscle spasms)		
Neurologic ***Mental status**: Affect, behavior, cognition (verbalizes); insight, memory/orientation; GCS **Cranial nerves** (Select) ☐ Loss of smell ☐ *Visual acuity/fields ☐ EOMs (Abn. eye position/movements) ☐ *Pupil size, shape, equality ☐ *Pupil reactivity to light (direct/consensual) ☐ Facial sensation/bite strength ☐ Facial movement/symmetry/eyelid opening/closing ☐ Hearing ☐ Gag reflex ☐ Stick out tongue ☐ Unilateral or bilateral deficits? **Cerebellar exam**: Assess for ataxia ☐ **Eyes**: nystagmus ☐ **Upper extremities**: Have pt. touch their index finger to their nose and then reach out to touch examiner's finger; OR perform alternating movements by rapidly pronating and supinating hands; OR bring fingers to thumb in rapid succession ☐ **Lower extremities**: Have pt. slide heel of one foot rapidly up and down shin of opposite leg.		
Skin: Integumentary assessment (integrated above) color (variation), moisture, temp, texture, turgor, lesions/burns; breakdown; hair distribution;		
*State EMS impression:		
Verbalize treatment plan using appropriate SOP		
☐ Pain mgt if SBP ≥ 90 (MAP≥ 65): Fentanyl, ketamine, acetaminophen per pain mgt SOP ☐ Nausea: ONDANSETRON standard dose per IMC		
Actual total time to complete assessment in minutes		
On-going assessment		
Repeat primary assessments		
Evaluate response to treatments		
Reassess VS/pt. responses. Every transported pt. should have at least 2 sets of VS. ☐ **Stable**: At least q. 15 min & after each drug/CR intervention; take last set shortly before arrival at receiving facility ☐ **Unstable**: More frequent reassessments; continue to reassess all abnormal VS & physical findings		
Document Revised Trauma Score		
OLMC REPORT		
Identification ☐ *Hospital being contacted ☐ *EMS provider agency and unit #; call back number		
☐ *Age, gender, approximate weight of patient ☐ *Level of consciousness (conscious/unconscious responds to ....)		
Chief complaint S&S: ☐ Onset ☐ *Region/radiation/recurrence ☐ *Provokes/palliates ☐ *Severity 0-10 ☐ *Quality ☐ *Time		
Associated complaints		
History ☐ *Allergies ☐ *Medications (current): time and amount of last dose if applicable ☐ *Past medical history (pertinent) ☐ Last oral intake, LMP if indicated ☐ *Events leading up to present injury (history of present illness)		
Vital signs ☐ *BP (MAP) ☐ *Respirations: rate, pattern, depth, effort ☐ *SpO_2;/ $EtCO_2$ ☐ *Pulse: rate, quality, rhythmicity ☐ Temp prn		
*Physical examination; include pertinent positive and negative findings ☐ HEENT ☐ Abdomen ☐ Extremities ☐ Skin ☐ Chest ☐ Pelvis/GU ☐ Back		
Treatments initiated prior to hospital contact (ITC) and pt response to treatment / ETA		
Handover report at hospital: EMS time out		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Critical error criteria in addition to starred items - Check if occurred during an attempt ☐ Failure to assess for and provide spine motion restriction when indicated ☐ Failure to find or appropriately manage problems associated with airway, breathing, gas exchange, perfusion/hemorrhage/shock; disability or environmental factors ☐ Failure to differentiate pt's need for immediate transport vs cont. assessment/treatment at scene ☐ Error in technique, sequence, or timing; needed excessive coaching, or reliance on procedure manual ☐ Performed in a way that could cause harm to a pt or is inconsistent with competent care ☐ Exhibited unacceptable affect with patient or other personnel		

Comments: _____

_____

_____

_____

Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

☐ **Competent:** All key steps independently performed with correct technique, sequence and timing. All starred (*) items explained/performed correctly with no critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 2/24

_____

Preceptor (PRINT NAME – signature)

GLASGOW COMA SCALE : Do it this way

GCS EYES VERBAL MOTOR

Institute of Neurological Sciences NHS Greater Glasgow and Clyde

CHECK	OBSERVE	STIMULATE	RATE
For factors Interfering with communication, ability to respond and other injuries	Eye opening , content of speech and movements of right and left sides	Sound: spoken or shouted request Physical: Pressure on finger tip, trapezius or supraorbital notch	Assign according to highest response observed

Eye opening

Criterion	Observed	Rating	Score
Open before stimulus	✔	Spontaneous	4
After spoken or shouted request	✔	To sound	3
After finger tip stimulus	✔	To pressure	2
No opening at any time, no interfering factor	✔	None	1
Closed by local factor	✔	Non testable	NT

Verbal response

Criterion	Observed	Rating	Score
Correctly gives name, place and date	✔	Orientated	5
Not orientated but communication coherently	✔	Confused	4
Intelligible single words	✔	Words	3
Only moans / groans	✔	Sounds	2
No audible response, no interfering factor	✔	None	1
Factor interferring with communication	✔	Non testable	NT

Best motor response

Criterion	Observed	Rating	Score
Obey 2-part request	✔	Obeys commands	6
Brings hand above clavicle to stimulus on head neck	✔	Localising	5
Bends arm at elbow rapidly but features not predominantly abnormal	✔	Normal flexion	4
Bends arm at elbow, features clearly predominantly abnormal	✔	Abnormal flexion	3
Extends arm at elbow	✔	Extension	2
No movement in arms / legs, no interfering factor	✔	None	1
Paralysed or other limiting factor	✔	Non testable	NT

Sites For Physical Stimulation

Finger tip pressure | Trapezius Pinch | Supraorbital notch

Features of Flexion Responses

Modified with permission from Van Der Naalt 2004
Ned Tijdschr Geneeskd

Abnormal Flexion

Slow Sterotyped
Arm across chest
Forearm rotates
Thumb clenched
Leg extends

Normal flexion

Rapid
Variable
Arm away from body

For further information and video demonstration visit www.glasgowcomascale.org

NWC EMSS/NCH Paramedic Program Skill Performance Record

Neuro Assessment: Stroke

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions to the participant: You have 10 minutes to assess the patient, verbalize the prehospital interventions that are indicated and determine the most appropriate receiving hospital (Comprehensive or Primary Stroke Center).

Performance standard 0. Step omitted (or leave blank) 1. Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2. Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
* Scene size up/safety; Determine nature of illness; scan environment for clues; apply appropriate PPE		
Determine need for additional assistance		
PRIMARY ASSESSMENT ***Airway**: Assess for impairment and assure patency ☐ Manual airway maneuvers if needed ☐ Verbalize if adjuncts are needed for airway access/control (BLS or ALS) ☐ Aspiration risk due to dysfunctional swallowing reflex/weak throat muscles? Verbalize seizure/vomiting precautions; suction prn ☐ Maintain head/neck in neutral alignment; NO pillows. If SBP > 100: Elevate head of bed 10° - 15°		
***Breathing**/ventilatory/gas exchange status; assess for impairment ☐ Assess for spontaneous ventilations; general rate and pattern (normal, fast or slow) ☐ Assess depth; effort/WOB; accessory muscle use ☐ Assess patient position, adequacy of air movement, symmetry of chest expansion, retractions ☐ Lung sounds if in ventilatory distress ☐ **Assess gas exchange;** apply SpO_2 monitor; assess for hypoxia, cardiorespiratory (CR) or neurological compromise. Note before & after O_2 if able. Note signs of hypoxia ☐ **Assess $EtCO_2$ number& waveform** if possible ventilatory, perfusion, or metabolic compromise. ☐ Verbalize if ventilatory assistance is needed w/ BVM		
***Correct hypoxia/**assure adequate ventilations per IMC: Target SpO_2: 94%. ☐ O_2 if SpO_2 < 94% or O_2 sat unknown ☐ If ≥94%: NO Oxygen; avoid hyperoxia to prevent cerebral vasoconstriction, free radical formation, and excess mortality		
Circulatory status; assess for impairment ☐ *Pulses for presence, general rate/quality/rhythmicity ☐ Skin (color, temperature, moisture, turgor) ☐ *Monitor ECG: rhythm ID and 12 L for evidence of acute/old changes ☐ *IV: 18 g AC. (Max 2 attempts); NS TKO (avoid excess fluid loading)		
Disability: explore causes of AMS ☐ If generalized tonic/clonic seizure activity: Observe and record per Seizure SOP ☐ ***MIDAZOLAM** usual dosing for seizures ☐ * If AMS, seizure activity, or any neuro deficit: Assess blood glucose per System procedure ☐ * If < 70 or low reading: **DEXTROSE** / Glucagon per Hypoglycemia SOP		
Exposure/environment ☐ Discretely undress pt. to inspect approp body areas ☐ Protect pt modesty, maintain body warmth		
SECONDARY ASSESSMENT **Vital signs** ☐ *BP/MAP: ☐ *Pulse: ☐ Resp: ☐ Temperature ☐ Repeat VS frequently & after each intervention. **Anticipate HTN with ICH/SAH (bleed) & ↑ ICP** ☐ Do NOT Rx HTN | No not give atropine for bradycardia if SBP > 90 (MAP > 65)		
HISTORY ☐ **Attempt to determine baseline status:** dementia, pre-existing limitations/deficits, unable to care for self? Severe headache or seizure at onset? ☐ Y ☐ N Head trauma at onset? ☐ Y ☐ N		
Stroke Screen **Call back number:**		

Performance standard 0. Step omitted (or leave blank) 1. Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2. Successful; competent with correct timing, sequence & technique, no prompting necessary			Attempt 1 rating	Attempt 2 rating
B	**BALANCE**/Coordination – Unsteady, fall? Finger to nose, rapid alternating movements, heel to shin. Note ataxia; tilting to one side, vertigo (timing/ trigger)	R L		
E	**EYES**: Vision changes: blurred, diplopia, loss of visual field | bidirectional nystagmus | Eye position: Ptosis / Horizontal **gaze deviation**	R L		
F	**FACE:** Smile/*grimace*, show teeth; close eyelids, wrinkle forehead Note unilateral weakness/asymmetry:		R	L
A	Motor – **ARM** (close eyes and; hold out both arms (palms up) for 10 sec) Normal; Abnormal: drift to no effort against gravity		R	L
S	**SPEECH** (Repeat "You can't teach an old dog new tricks" or sing Happy Birthday Listen for slurring, inability to pronounce the words or inability to remember all the words and repeat them correctly. Note if the patient is unable to attempt the phrase (completely aphasic) or not verbally responsive, Expressive/receptive/global aphasia ☐ Word substitution/retrieval deficits ☐ Dysarthria		☐ Normal ☐ Abnormal	
T	**TIME last known normal(LKN)** for pt baseline w/o new S&S ☐ ≤ 24 hrs ☐ > 24 hrs			
	Time of S&S discovery: Earliest time pt known to have new S&S:			
Other assessments	Orientation: Answers accurately: Name, age, month of year; location, situation			
	Responds to commands: open/close eyes		Y	N
	Gross hearing – Note new onset unilateral hearing deficit; sound sensitivity		R	L
	Say "Ah", palate rises, uvula midline; Stick out tongue: remains midline (note abnormalities)		Y	N
	Agnosia: Inability to recognize an object (part of body) or person **Neglect:** One sided extinction (visual, auditory, sensory):			
	Motor: Lift leg. Normal; Abnormal: drift to no effort against gravity		R	L
	Sensory: Focal changes/deficits (face, arms, legs); paresthesias, numbness		R	L
	ANS: Sweating only one side		R	L
	Neck stiffness (cannot touch chin to chest; vomiting			
	Blood glucose level - List reading:			
***History of present illness** ☐ Onset (suddenly) ☐ Provocation/palliation ☐ Quality ☐ Region/radiation ☐ Severity ☐ Clarifying questions re: assoc. complaints ☐ Date of birth ☐ ~Weight				
***Allergies** (meds, environment, foods)				
PMH	☐ None ☐ AF/Flutter ☐ AVM, tumor, aneurysm ☐ Bleeding disorders ☐ CAD/Heart dx ☐ Cancer ☐ Carotid stenosis ☐ Pregnant (≤6 wks. post-partum) ☐ Depression ☐ DM ☐ Drug/Alcohol Abuse ☐ Dyslipidemia ☐ Family Hx stroke ☐ HF ☐ Hormone RT ☐ HTN ☐ Migraine ☐ Obesity ☐ Previous stroke ☐ Previous TIA ☐ Previous intracranial surgery/bleed ☐ Head trauma ☐ *Prosthetic valve ☐ PVD ☐ Renal failure ☐ Sleep apnea ☐ Tobacco			
MEDS	☐ *Meds: Rx & OTC (complementary and alternative medicines (CAM) – bring containers to hospital if possible) Anticoagulant use in 48 hrs: ☐ warfarin/Coumadin ☐ apixaban/Eliquis ☐ argatroban ☐ dabigatran/Pradaxa ☐ desirudin/Privask ☐ edoxaban/Savaysa ☐ enoxaparin/Lovenox ☐ fondaparinux/Arixtra ☐ LMW heparin ☐ lepirudin/Refludan ☐ rivaroxaban/Xarelto Platelet inhibitors: ☐ ASA ☐ clopidogrel/Plavix ☐ dipyridamole/Aggrenox ☐ prasugel/Effient ☐ ticagrelor/Brilinta ☐ ticlodipine/Ticlid ☐ Cocaine/other vasoconstrictors, e.g. amphetamines: PCP			
Last oral intake				
Event surrounding this incident				
Review of Systems in addition to stroke screen				
Head: DCAP, BLS, TIC				
Chest: DCAP, BLS, TIC; Auscultate breath sounds				
Abdomen/pelvis ☐ Inspect ☐ Palpate (guarding. rigidity)				
Extremities: ☐ Palpate ☐ Assess equality of peripheral pulses; evidence of trauma				

Performance standard 0. Step omitted (or leave blank) 1. Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2. Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
Skin: Integumentary assessment (integrated above) color (variation), moisture, temp, texture, turgor, lesions/breakdown; hair distribution; nails (clubbing)		
Psychological/social assessment		
***Considers stroke mimics** (below)		
*EMS **impression**: (Acute stroke)		
Verbalize treatment plan ☐ Provide comfort & reassurance; establish means of communicating with aphasic patients ☐ *Limit activity; do not allow pt to walk; protect limbs from injury		
TRANSPORT Decision tree: Patient presents with new onset + BEFAST or other focal S&S suggesting stroke or TIA ***Minimize scene time (< 15 minutes) - transport per Stroke SOPs ☐ **Nearest hospital:** Patient unstable ☐ ***Nearest Comprehensive SC:** + LVO cortical signs or **SAH/ICH (bleed) suspected (HTN + localizing S&S)** if **LKN ≤ 24 hrs** & transport time ≤ 30 min □ ABMC □ LGH □ NCH □ CDH ☐ All others: Transport to the **Nearest Stroke Center (Comprehensive or Primary)** ☐ ***Call Stroke Alert to OLMC ASAP**		
Critical error criteria in addition to starred items - Check if occurred during an attempt ☐ Failure to initiate or call for transport of the patient within 15 minutes of patient contact ☐ Does Secondary assessment before treating threats to airway, breathing, and circulation ☐ Performs in a way that could cause harm to a pt or is inconsistent with competent care ☐ Exhibits unacceptable affect with patient, bystanders, or other personnel		

Factually document below your rationale for checking any of the above critical criteria.

Rating: (Select 1)

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☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 1/24

Preceptor (PRINT NAME – signature)

Stroke mimics	
Etiology	**History and Exam Findings**
Psychogenic	Lack of objective CN findings, neuro findings in nonvascular distribution, inconsistent exam
Seizures	Hx of seizures, witnessed seizure activity, postictal period; post-seizure w/ persistent neuro signs (Todd's paralysis) (Tonic clonic seizures can occur simultaneous with hemorrhagic stroke)
Hypoglycemia	Hx DM, low serum glucose, ↓ LOC
Infection	Bell's palsy: Complete hemiparesis of face; can't wrinkle forehead on affected side; TB, fungal, herpes simplex encephalitis, meningitis
Complicated migraine/with aura	Hx similar events, preceding aura, headache
Hypertensive encephalopathy	Headache, delirium, significant HTN, cortical blindness, cerebral edema, seizure
Wernicke's encephalopathy	Hx alcohol abuse, ataxia, EOM paralysis, confusion
CNS abscess	Hx drug abuse, endocarditis, medical device implant w/ fever
CNS mass	Tumors; epidural/subdural hematomas: Gradual progression, seizure at onset of S&S
Drug toxicity	Med Hx includes Lithium, phenytoin, carbamazepine

NWC EMSS Skill Performance Record

MANUAL AIRWAY MANEUVERS

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: You are asked to open the airway of a patient who has snoring ventilations.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
HEAD-TILT, CHIN-LIFT MANEUVER		
*Identify S&S of upper airway impairment.		
☐ *State indications: upper airway impairment ☐ ☐ *Confirm absence of contraindications: No c-spine or jaw injury ☐ Don appropriate PPE		
*Position patient supine		
Place one hand on pt's forehead; apply firm, downward pressure with the palm of the hand tilting the head backwards. Place fingertips of the other hand underneath the anterior mandible		
*****Pull the chin forward, supporting the jaw and tilting the head backward as far as possible **Do not compress the soft tissues underneath the chin; this may obstruct the airway**		
Continue to press the other hand on the pt's forehead to keep head tilted backward		
Lift the chin so the teeth are brought nearly together. May use the thumb to depress the lower lip to allow the patient's mouth to remain slightly open.		
If dentures in place: Hold them in position to avoid obstruction. Mask seal is easier when dentures are in place. If the dentures cannot be managed, remove them.		
*****Assesses airway patency: look, listen and feel for unobstructed air movement and spontaneous ventilations.		
☐ If successful, state need for an OPA or NPA to hold airway open. ☐ If unsuccessful, state need to try patient repositioning, suction, or alternate interventions		
JAW-THRUST MANEUVER		
☐ *State indications: Upper airway impairment w/ possible C-spine injury ☐ Confirm absence of contraindications: No jaw injury ☐ Don appropriate PPE		
*Position patient supine		
☐ *Position clinician at top of patient's head. *Grasp angles of jaw on both sides. ☐ Without moving neck, lift jaw forward to pull tongue away from posterior oropharynx.		
Use thumb to retract the lower lip if the lips are closed.		
*****Assesses airway patency: look, listen and feel for unobstructed air movement and spontaneous ventilations.		
☐ *****If unable to open the airway reposition jaw and attempt again. ☐ If successful, state need for an OPA or NPA to hold airway open. ☐ If unsuccessful, state need to try patient repositioning, suction, or alternate interventions.		
Critical error criteria in addition to starred items - Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Performs in a way that could cause harm to a pt or is inconsistent with competent care ☐ Exhibits unacceptable affect with patient or other personnel		

Rating: (Select 1)

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☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 8/23

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

OROPHYARNGEAL AIRWAY (OPA)

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: An adult appears unconscious with snoring respirations. You are asked to assemble the equipment, choose the correct size adjunct from those available, and insert an oral pharyngeal airway.

Equipment needed: Airway management trainer; various sizes OPAs, tongue blades, suction catheters, PPE

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
☐ *State indications: Respiratory distress/failure; unconscious/unresponsive pt; need for PPV vent. ☐ *Confirm absence of contraindications: ☐ Intact gag reflex ☐ Oral trauma ☐ Epiglottitis Assess for +gag reflex by stroking eyelashes or perform a glabellar tap & observe response		
* Don appropriate PPE for patient situation (gloves/medical grade face mask/eye protection)		
Prepare patient Explain procedure to patient - even if unconscious		
* Position patient supine | * Use appropriate manual maneuver to open airway		
Obtain SpO_2 reading on room air if time permits		
Clear mouth and pharynx of debris, secretions, blood, or vomitus | suction prn		
Prepare equipment: * Sizing: Airway length should align with the distance from front of teeth/gums to the angle of the jaw (Color-coded OPAs that correlate to peds pt sizes on length-based tapes assist in rapid selection)		
Perform procedure Support pt's head with one hand; open mouth w/ cross-finger technique		
☐ *Depress tongue with a tongue blade ☐ *Insert airway along the curvature of tongue until the distal tip rests behind the base of the tongue in the oropharynx. ☐ *Flange should rest on pt's lips. Verify tongue/lips are not caught between teeth and airway.		
* Verify airway patency by closing nose and feeling for air movement through the mouth. Auscultate bilateral breath sounds.		
Reassess VS and SpO_2		
Verbalize two complications: ☐ Induction of gag/vomiting ☐ Obstruction from misplaced airway ☐ Swelling of epiglottis ☐ Intraoral injuries		
Verbalize steps to take if patient gags: (remove airway and ready suction)		
Critical error criteria in addition to starred items: Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Exhibits unacceptable affect with patient or other personnel ☐ Performs in a way that could cause harm to a pt or is inconsistent with competent care		

Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

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☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 8/23

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

NASOPHARYNGEAL AIRWAY (NPA)

Name:	
Date:	

Instructions: An adult appears unconscious with snoring respirations. You are asked to assemble the equipment, choose the correct size adjunct from those available, and insert a nasopharyngeal airway.

Equipment needed: Airway management trainer; various sizes NPAs, lubricant, suction catheters, PPE

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
State indications: upper airway impairment; need for suctioning, BVM assist where gag is still intact		
***Confirm absence of contraindications** for inserting this airway ☐ Midface or above trauma ☐ Anterior basilar skull fx ☐ Visible obstruction in nasal passageway: FB, polyp, hematoma, deviated septum		
* Don appropriate PPE for patient situation (gloves/medical grade face mask/eye protection)		
Prepare patient Explain procedure to patient - even if unresponsive		
Obtain SpO_2 reading on room air if time permits		
Clear nose, mouth and pharynx of debris, secretions, blood, or vomitus | suction prn		
* Use appropriate manual maneuver to open airway		
Prepare equipment: * Sizing: Airway length should align with the distance from the tip of the nose to the ear lobe. Airway diameter should not exceed the size of the nostril		
* Lubricate outside of airway w/ water-soluble gel; do not obstruct distal opening		
Perform procedure * Elevate tip of nose and gently insert distal end of airway into the largest unobstructed nostril Bevel to septum only applies to insertion on right side		
* Advance gently along floor of the nasal passage until flange is against nostril.		
Open mouth to check airway position behind the tongue in the posterior oropharynx		
* Assess airway patency by closing mouth and feeling for air movement through the airway. Reassess VS & SpO_2.		
* Verbalize steps if resistance is met: (withdraw airway and try other side)		
* **Verbalize at least two complications:** ☐ Nasal bleeding ☐ Tissue trauma ☐ Gagging ☐ Vomiting ☐ Gastric distention if airway is too long		
Critical error criteria in addition to starred items: Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Exhibits unacceptable affect with patient or other personnel ☐ Performs in a way that could cause harm to a pt or is inconsistent with competent care		

Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

☐ **Competent:** All key steps independently performed with correct technique, sequence and timing. All starred (*) items explained/performed correctly with no critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 8/23

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

OROPHARYNGEAL SUCTIONING

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult's mouth is filled with blood. You are asked to assemble the equipment, choose the correct catheter from those available, and perform oropharyngeal suctioning.

Equipment needed: Airway management trainer; various sizes suction catheters, suction devices: battery-operated, outlet-powered, and hand-pump suction devices; PPE

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	**Attempt 2 rating**
State indications for procedure: Secretions in mouth, nose or pharynx		
* Don appropriate PPE for patient situation (gloves/medical grade face mask/eye protection)		
Prepare patient Explain steps of procedure to patient		
Obtain SpO_2 on room air if available and time allows		
* Preoxygenate patient prior to suctioning if time allows		
Prepare equipment: Inspect suction unit for power (if applicable) and proper assemblage		
* Select appropriate suction catheter (flexible or rigid); attach to suction tubing		
Perform procedure Open mouth using cross-finger technique		
☐ Turn power on to high (if applicable) ☐ Kink tubing and ensure that unit achieves vacuum of 300 mmHg.		
Without applying suction ☐ Insert suction catheter no deeper than pharynx. ☐ If rigid tip, insert with convex side along roof of mouth.		
* Apply suction using a gentle twisting motion while limiting suction application to 10 sec on an adult and 5 sec in a child		
Refrain from jabbing catheter up and down while applying suction		
* Reoxygenate patient with O_2 15 L/NRM or BVM		
Verbalize: Flush the suction catheter with NS or water between suction attempts to remove any material that could clog ports		
Verbalize 2 complications if suction were applied improperly or for too long: ☐ *Hypoxia ☐ Atelectasis ☐ *Bradycardia ☐ Coughing/retching ☐ Hypotension ☐ Tissue trauma ☐ ↑ ICP/↓ Cerebral blood flow		
Critical error criteria in addition to starred items: Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Exhibits unacceptable affect with patient or other personnel ☐ Performs in a way that could cause harm to a pt or is inconsistent with competent care		

Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

☐ **Competent:** All key steps independently performed with correct technique, sequence and timing. All starred (*) items explained/performed correctly with no critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 1/24

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

TRACHEAL SUCTIONING

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult is intubated. You note secretions in the ET tube. You are asked to assemble the equipment, choose the correct catheter from those available, and perform tracheal suctioning.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
* Don appropriate PPE: Universal plus droplet precautions (gloves/medical grade face mask/eye protection)		
Verbalize indications for tracheal suction: secretions impairing airway in an intubated patient		
Prepare patient Explain steps of procedure to patient even if unconscious		
Obtain SpO_2 on room air if time allows		
* Preoxygenate patient prior to suctioning if time allows		
* Connect patient to cardiac monitor		
Prepare equipment: (Airway management trainer; O_2 source; O2 delivery devices; SpO_2; suction device with disposable receptacle, various sizes suction catheters) ☐ Inspect suction unit for power and proper assemblage. ☐ Set suction between 80-120 mmHg if suction source is adjustable.		
* Select appropriate size suction catheter (~ ½ the internal diameter (ID) of the TT)		
* Using sterile technique, open suction kit and catheter packaging. Apply one sterile glove on dominant hand. Using sterile hand, lift catheter from packaging and wrap catheter around sterile hand. Maintain sterility of the catheter.		
* Using non-dominant hand, connect catheter to suction tubing.		
* Turn power on to high		
Perform procedure * Without applying suction, insert catheter into ETT. Advance catheter until resistance is met or pt coughs taking no longer than 2-3 sec to advance catheter.		
* Apply suction while withdrawing the catheter in a twisting motion limiting suction application and catheter insertion time to 10 sec in adult and 5 sec in child.		
* Refrain from jabbing catheter up and down while applying suction		
* Reoxygenate patient with 15 L O_2/ BVM		
Verbalize at least 2 complications if suction were applied for too long: ☐ *Hypoxia ☐ Atelectasis ☐ *Bradycardia ☐ Hypotension ☐ Tissue trauma ☐ ↑ ICP		
Critical error criteria in addition to starred items: Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Performs in a way that could cause harm to a pt or is inconsistent with competent care ☐ Exhibits unacceptable affect with patient or other personnel		

Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

☐ **Competent:** All key steps independently performed with correct technique, sequence and timing. All starred (*) items explained/performed correctly with no critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 1/24

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

REMOVAL of FOREIGN BODY by Direct LARYNGOSCOPY

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult is found unconscious, non-breathing with a pulse. Manual attempts to clear the airway have been unsuccessful. You are asked to assemble the equipment and perform direct laryngoscopy to remove the foreign body.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Continue manual attempts to relieve FB obstruction while preparing for direct laryngoscopy. Verbalize appropriate indications for performing this skill		
*Takes appropriate BSI precautions: gloves, goggles, facemask | HEPA filter for ventilating w/ BVM		
Prepare the patient ☐ **Position** patient for optimal view and airway access (head up to 45° unless contraindicated ☐ Open the airway manually; *insert BLS adjuncts: NPA or OPA unless contraindicated t		
Assess SpO_2 on room air if time allows		
*Attempt to ventilate patient/BVM (Unsuccessful)		
Prepare equipment ☐ Assemble Ling Vision per standard procedure; ensure it is operational ☐ ET tube ☐ DuCanto suction catheter ☐ Magill forceps ☐ Cricothyrotomy equipment		
Direct visualization & removal of FB ***** Insert King Vision blade per standard technique		
* Visualize glottic opening and surrounding structures		
* If F/B is seen, grasp and carefully remove with Magill forceps and/or suction		
* Observe for residual F/B & return of spontaneous ventilations for 5 seconds		
Airway management if spontaneous ventilations resume ☐ Remove laryngoscope blade ☐ O_2 at 12-15 L/NRM if hypoxia persists ☐ *Continue to monitor VS & SpO_2		
Airway management if airway cannot be cleared (verbalize) ☐ Attempt to ventilate with a BVM ☐ *Unable to ventilate: Intubate using standard procedure - attempt to push the FB into right mainstem bronchus, pull ETT back above carina and ventilate left lung ☐ *Unable to ventilate effectively: Cricothyrotomy		
Critical error criteria in addition to starred items: Check if occurred during an attempt ☐ Failure to take appropriate body substance isolation precautions ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Exhibits unacceptable affect with patient or other personnel ☐ Performs in a way that could cause harm to a pt or is inconsistent with competent care		

Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

☐ **Competent:** All key steps independently performed with correct technique, sequence and timing. All starred (*) items explained/performed correctly with no critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 1/24

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

VIDEO LARYNGOSCOPY (VL) INTUBATION w/ KING VISION

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An comatose adult (no gag) is found w/ gasping respirations. Pulse present; no trauma suspected. Prepare equipment and intubate.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
* Use appropriate PPE: gloves, goggles, medical grade face mask | HEPA filter for ventilating w/ BVM		
State indications: Unconscious adult with no protective airway reflexes experiencing an ☐ Actual or potential airway compromise or aspiration risk and/or ☐ Actual or impending hypoxic or hypercarbic resp. failure (apnea, ineffective ventilatory effort; $SpO_2 \leq 90$; $EtCO_2 \geq 60$) and BLS airways, NIPPV, BVM ventilations contraindicated or ineffective		
State contraindications: Airway trauma, edema, or obstruction that does not permit the safe placement of an ET tube		
Prepare (select, check, assemble) equipment before placing blade into the mouth		
☐ BLS airways; O_2 sources; size appropriate BVM bags and masks ☐ **Suction equipmen**t (DuCanto rigid and 12-14 Fr flexible catheters); turn on to ✓ unit ☐ King Vision Display and Video Adapter (reusable; inspect for S&S of damage) ☐ King Vision blade (aBlade) (curved channeled) | ETT 7.0/7.5 (must fit into channeled blade) ☐ Bougie; 10 mL syringe; water-soluble lubricant ☐ $EtCO_2$, SpO_2, ECG monitor; commercial tube holder, head blocks or tape, BP cuff; stethoscope ☐ Alternate airways prepped & in sight (i-gel; cricothyrotomy)		
Prepare patient ☐ **Position** patient for optimal view and airway access (head up to 45° unless contraindicated) ☐ Open the airway manually; *insert BLS adjuncts: NPA or OPA unless contraindicated		
Assess to the extent possible to determine **if pt may be difficult to ventilate:** MOANS": mask seal, obesity, age (elderly), no teeth, stiffness | "BONES": beard, obese, no teeth, elderly, sleep apnea/ snoring | See BVM procedure		
Assess for signs suggesting a difficult intubation (LEMON): Look, Evaluate the 3-3-2 rule, Mallampati score, Obstruction, and Neck mobility. The 3-3-2 rule measures the inter-incisor distance, hyoid-to-mental distance, and thyroid-to-hyoid distance.		
Assess SpO_2 on RA if time and personnel allow; auscultate breath sounds for baseline		
***Preoxygenate* 3 minutes:** O_2 wash in; nitrogen wash out ☐ **Apply O_2 at 15 L/$EtCO_2$ NC**; maintain before and during procedure ☐ RR ≥10 / AWAKE / good ventilatory effort: Consider CPAP at 5-10 PEEP if not contraindicated ☐ RR <10 or shallow: O_2 15 L/BVM squeeze bag over 1 sec providing just enough air to see visible chest rise (~400-600mL); avoid high airway pressure (≥25cm H_2O) & gastric distention. Ventilate at 10 BPM (1 every 6 sec) to SpO_2 94% | $EtCO_2$ 35-45 If Hx asthma/COPD: 6-8 BPM to SpO_2 92%. If SpO_2 does not meet this goal, contact OLMC. ☐ If in cardiac arrest & apneic preox (ApOx) indicated: Apply O_2 -DO NOT VENTILATE ☐ *If only 1 O_2 source: Sense $EtCO_2$ through NC (no O_2); deliver O_2 through BVM until procedure starts. Then switch O_2 source to NC and run throughout ETI insertion.		
* Check ETT cuff integrity while in package; fill syringe w/ 10 mL of air; leave attached to pilot tubing		
☐ ***Assemble King Vision**: With display OFF, connect video adapter to the display. Front and back of display and video adapter are color-coded. Fully insert **unlocke**d video adapter onto stem of display. Slide locking mechanism up until yellow stripe is no longer visible. Click/snap securely into place. **If display is on before attaching video adapter** the video image will become distorted. If this happens, turn Display OFF then back ON. ☐ aBlade: Slide onto video adapter | *Listen for a "click" to signify that blade is fully engaged. ☐ Power on and verify functional moving image and battery. If display indicator turns red, will turn off in ~15 min. ☐ *Place lubricant inside channel and the distal tip of the blade. Avoid covering imaging sensor/ camera window as it could distort the image.		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
☐ *Load ET tube into lubricated blade channel; may preload bougie inside ETT. Ensure that ETT & bougie do not extend past distal tip of channel in blade. ETT tip should not be evident on the screen when loaded properly.		
Intubate: *(Allow no more than 30 sec of apnea)		
☐ Maintain O_2 15 L/$EtCO_2$ NC during procedure ☐ When ready to insert blade: stop ventilating pt.; withdraw OPA (NPA remains) ☐ Monitor VS, level of consciousness, skin color, $EtCO_2$; SpO_2 during procedure; time elapsed		
START TIMING tube placement after last breath_____ ☐ Open mouth w/ cross finger (standard) technique ☐ *Insert King Vision blade midline over tongue (hold blade just above channeled portion, not on large handle below screen). Avoid pushing tongue into larynx. ☐ Watch for epiglottis; direct blade tip toward vallecula to visualize the glottis. Don't go too deep! Center the cords in the middle of the video screen. **DO NOT LIFT to LOOK**! Suction prn. ☐ If camera becomes obscured (e.g., blood/secretions) or cords cannot be visualized, remove the blade and clear the lens, suction prn. Note: Each blade insertion into mouth = 1 attempt | Limit 2 attempts		
Bougie insertion ☐ *Position bougie just anterior to the vocal cords. Insert through glottis under direct visualization. Gently twist to guide Coude tip between cords and upward through the cricoid ring. Avoid forceful insertion (tracheal trauma). A 'hold up' should occur at 30-40 cm depth. If resistance met prior to that depth: Withdraw slightly and redirect. Rotate tip to navigate around obstructions. Resistance may indicate contact with carina or a bronchus. ☐ ***Confirm bougie placement into trachea:** Tactile feedback (clicking/vibration sensation felt in 60-95% of cases) when bougie tip rubs against anterior tracheal rings (tip must be oriented anteriorly). If inserted into esophagus, no clicking/vibration is felt and tip easily advances well beyond 40 cm. ☐ If the trachea is completely occluded with a FB, it may be necessary to push the object into the right mainstem bronchus to allow ventilation and oxygenation.		
***Insert ET tube: Limit 1 attempt at ETT insertion** ☐ Maintain view and advance ETT over bougie through glottis. Rotate ETT to facilitate insertion into trachea if resistance met at glottic opening or cricoid ring. Watch for cuff to pass through cords. ☐ If trouble passing ETT: Blade may have advanced too far; good image of the cords prevents ETT from advancing. Withdraw blade slightly. Advance ETT to proper depth (3 X tube ID at teeth)		
☐ ***Remove blade**: Firmly hold ETT in place; remove from channel by taking tube to corner of mouth. Rotate handle toward patient's chest. As blade exits the mouth, the ETT should easily separate from the lateral opening of the channel. ☐ Turn off display (press and hold the POWER button | Carefully remove bougie from the ETT		
***Confirm tracheal placement:** ☐ Ensure adequate ventilations & oxygenation: 15 L O_2 /BVM; ventilate at 10 BPM (asthma/COPD 6-8 BPM); volume & pressure just to see chest rise ☐ 5-point auscultation: Confirm absent gastric sounds + bilateral breath sounds (midaxillary and anterior chest) ☐ **Definitive confirmation**: **monitor $EtCO_2$** number & waveform (most reliable) ☐ **Time of tube confirmation**: (Seconds of apnea)_____		
***Troubleshooting** ☐ If breath sounds only on right, withdraw ETT slightly and listen again. ☐ If in esophagus: remove ETT, reoxygenate 30 sec; insert an i-Gel ☐ **If ETT cannot be placed successfully** (2 attempts to visualize cords/1 attempt to pass tube) or nothing can be visualized; consider alternate airway (BIAD); ventilate & monitor as above		
If tube placed correctly ☐ *State cuff purpose & function:* Establish an airtight seal between ETT and the tracheal wall, minimize air leak and aspiration of secretions into the lungs; reduce risk of ventilator-associated pneumonia and other complications related to inadequate seal or excessive pressure on tracheal mucosa ☐ ***Inflate cuff** w/ 6–7 mL of air (8-10 mL likely too high) to proper pressure (minimal leak or 20-30 cm H_2O if cuff manometer is available) | Avoid overinflation that may lead to hoarseness, sore throat, cough, sputum production, hemoptysis, tracheal stenosis, ischemia, and pressure ulcers. Pt positioning and suction procedures can cause cuff pressures to deviate outside of therapeutic range (frequently monitor & adjust) | Remove syringe if not using a cuff manometer ☐ ***Note ETT depth**: Diamond marking on ETT level w/ teeth or gums (Target: 3 X ID ETT)		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
☐ *Insert OPA; align ETT with side of mouth; secure with commercial tube holder; apply lateral head immobilization ☐ Continue to ventilate at 10 BPM (asthma 6-8); $EtCO_2$ 35-45; O_2 to SpO_2 94% (92% COPD)		
If secretions in tube or gurgling sounds with exhalation: suction ETT prn per procedure ☐ Use a flexible suction catheter; mark maximum insertion length with thumb and forefinger ☐ *Preoxygenate patient; insert sterile catheter into the ET tube leaving catheter port open ☐ At proper insertion depth, cover catheter port and apply suction while withdrawing catheter ☐ *Limit suction application time to 10 sec (adult). Ventilate/oxygenate patient per SOP.		
* **Reassess**: Frequently monitor SpO_2, $EtCO_2$, tube depth, cuff pressure, VS, & lung sounds to detect displacement, complications (esp. after pt movement), or condition change. If pt deteriorates, consider**: D**isplacement of tube, **O**bstruction of tube, **P**neumothorax, **E**quipment failure (DOPE)		
***After 10 min:** Assess need for post invasive airway sedation and analgesia (PIASA) – Use RASS below If RASS (-1) or higher & SBP ≥ 90 (MAP ≥ 65) (in order of preference)**:** ☐ **KETAMINE** (pain dose**)** 0.3 mg/kg slow IVP (pain relief + sedation) unless contraindicated OLMC NOT needed for ketamine pain dose added to sedation dose that exceeds max total of 300 mg | OR ☐ **MIDAZOLAM** standard sedation dose + **FENTANYL** (standard dose) if restless/tachycardic (S&S pain)		
State complications of ETI: ☐ *Peri-intubation **Hypoxia** (<90% SpO_2), **bradycardia**, **hypotension** (SBP <90 mmHg/MAP <65) or cardiac arrest ☐ Trauma to teeth, vocal cords, larynx, trachea, mucosa, TMJ injuries, nerve injury ☐ *Post-intubation **hyperventilation**: Ventilate to achieve $EtCO_2$ 35-45 mmHg ☐ ***Barotrauma:** pneumothorax & tension pneumothorax; esophageal perforation ☐ ***Misplaced tube** (esophagus, hypopharynx, mainstem bronchus) ☐ Over sedation Peri-intubation period is time from sedative given or last PPV to up to 10 minutes post any invasive airway attempt		
Verbalize post-procedure cleaning & disinfection: After the procedure is complete, separate the display and video adapter from the blade. Dispose of blade per standard protocol and clean/disinfect display and video adapter/I-2 policy.		
***Critical error criteria in addition to starred items:** Check if occurred during an attempt ☐ Failure to ventilate w/in 30 sec if pt apneic or hypoventilating after applying PPE/interrupts ventilations for >30 sec at any time ☐ Failure to provide appropriate FiO_2 preox and during peri-intubation period ☐ Failure to ventilate patient at appropriate rate, volume or pressure: max 2 errors/min permissible ☐ Failure to successfully intubate within 2 attempts without immediately attempting alternate airway ☐ Suctions patient excessively or does not suction the patient when needed ☐ Exhibits unacceptable affect with patient or other personnel ☐ Performs in a way that could cause harm to a pt or is inconsistent with competent care		

Factually document below your rationale for checking any of the above critical criteria.

_____

Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

☐ **Competent:** All key steps independently performed with correct technique, sequence and timing. All starred (*) items explained/performed correctly with no critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 1/24

_____

Preceptor (PRINT NAME – signature)

The **Richmond Agitation Sedation Scale (RASS)**

Assesses level of alertness or agitation | Used after placement of ADV airway to avoid over/under-sedation

Combative	+4	Agitated	+2	Alert and calm	0	Light sedation	-2	Deep sedation	-4
Very agitated	+3	Restless	+1	Drowsy	-1	Moderate sedation	-3	Unarousable sedation	-5

Goal: RASS -2 to -3. If higher (not sedated enough) assess for pain, anxiety | Rx appropriately to achieve RASS of -2

NWC EMSS Skill Performance Record

IN-LINE INTUBATION

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An unconscious and unresponsive adult with a possible c-spine injury is found with severe hypoventilation. The patient has a palpable radial pulse. Prepare equipment and intubate using the in-line technique.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
* Take appropriate BSI precautions: gloves, goggles, mask | HEPA filter for ventilating w/ BVM		
State indications for procedure: Need for ETI in a person with actual or potential cervical trauma		
State contraindications to ETI: Severe airway trauma or obstruction that does not permit the safe placement of an ET tube		
Prepare patient ☐ **Position** patient for optimal view, airway access, and c-spine protection (supine in axial alignment) ☐ Open the airway manually; *insert BLS adjuncts: NPA or OPA unless contraindicated		
Assess patient to the extent possible to determine **if they may be difficult to ventilate:** MOANS": mask seal, obesity, age (elderly), no teeth, stiffness | "BONES": beard, obese, no teeth, elderly, sleep apnea/snoring | See BVM procedure		
Assess for signs suggesting a difficult intubation (LEMON): Look, Evaluate the 3-3-2 rule, Mallampati score, Obstruction, and Neck mobility. The 3-3-2 rule measures the inter-incisor distance, hyoid-to-mental distance, and thyroid-to-hyoid distance.		
Assess SpO_2 on RA if time and personnel allow; auscultate breath sounds for baseline		
***Preoxygenate 3 minutes:** O_2 wash in; nitrogen wash out ☐ **Apply O_2 at 15 L/$EtCO_2$ NC**; maintain before and during procedure ☐ RR ≥10 / AWAKE / good ventilatory effort: Consider CPAP at 5-10 PEEP if not contraindicated ☐ RR <10 or shallow: O_2 15 L/BVM squeeze bag over 1 sec providing just enough air to see visible chest rise (~400-600mL); avoid high airway pressure (≥25cm H_2O) & gastric distention. Ventilate at 10 BPM (1 every 6 sec) to SpO_2 94% | $EtCO_2$ 35-45 If Hx asthma/COPD: 6-8 BPM to SpO_2 92%. If SpO_2 does not meet this goal, contact OLMC. ☐ If only 1 O_2 source: Sense $EtCO_2$ via NC (no O_2); deliver O_2 through BVM until procedure starts. Then switch O_2 source to NC and run throughout ETI insertion.		
Prepare (select, check, assemble) equipment		
BLS airways; O_2 sources; size appropriate BVM + Have below ready before placing blade into mouth ☐ **Suction equipmen**t (DuCanto rigid and 12-14 Fr flexible catheters); turn on to ✓ unit ☐ King Vision device & blade (curved channeled) | ETT 7.0 & 7.5 (must fit into channeled blade) ☐ Bougie; 10 mL syringe, water-soluble lubricant ☐ $EtCO_2$, SpO_2, ECG monitor; commercial tube holder, head blocks or tape, BP cuff; stethoscope ☐ Alternate airways prepped, & in sight (i-gel; cricothyrotomy)		
* Check ETT cuff integrity while in package; fill syringe w/ 10 mL of air; leave attached to pilot tubing		
* Assemble King Vision per standard procedure; ensure it is operational. Load ET tube into lubricated channel; load bougie inside tube. Ensure tube does not extend past channel in blade.		
Intubate: *(Allow no more than 30 sec of apnea)		
☐ *Maintain O_2 15 L/$EtCO_2$ NC during procedure ☐ When ready to perform procedure: stop ventilating; withdraw OPA (NPA remains); open c-collar ☐ *Intubator: Positions self at pt's head and straddles head between rescuer's legs or knees ☐ *2nd person positions self to side of pt and provides neck motion restriction by placing their thumbs on pt maxillae & circling fingers around side of pt's head and neck ☐ Monitor VS, level of consciousness, skin color, $EtCO_2$; SpO_2 during procedure; time elapsed		
START TIMING tube placement after last breath_____ ☐ Intubator: Open mouth w/ standard technique ☐ *Insert King Vision blade midline over tongue per standard technique until epiglottis is visualized		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
☐ *The Blade tip can be placed in the vallecula like a Macintosh blade or can be used to lift the epiglottis like a Miller blade. For best results, center the vocal cords in the middle of the display's video screen. **DO NOT LIFT to LOOK**! Suction secretions prn for optimal visualization. ☐ If the distal window becomes obstructed or obscured (e.g., blood/secretions) or cords cannot be visualized, remove the blade from the patient's mouth and clear the lens, suction prn. Note: Each blade insertion into mouth = 1 attempt | Limit 2 attempts		
*** Insert bougie into trachea per standard technique:** If needed, twist bougie to left or right to guide between cords. Avoid forceful insertion (tracheal trauma). *****Confirm bougie placement into trachea per standard technique		
***Insert ET tube: Limit 1 attempt at ETT insertion** ☐ Maintain view with King Vision in place and advance ETT over bougie and through glottis ☐ Rotate ETT to facilitate insertion through cords into trachea if resistance met at glottic opening or cricoid ring. ☐ Advance ETT to proper depth (3 X tube ID at teeth)		
☐ ***Remove blade**: Firmly hold ETT in place; remove from channel per standard technique ☐ Turn off the display: Press and hold the POWER button | Carefully remove bougie from the ETT		
* **Confirm tracheal placement:** ☐ Ensure adequate ventilations & oxygenation: 15 L O_2 /BVM; ventilate at 10 BPM (asthma/COPD 6-8 BPM); volume & pressure just to see chest rise ☐ 5-point auscultation: Confirm absent gastric sounds + bilateral breath sounds (midaxillary and anterior chest) ☐ **Definitive confirmation**: **$ETCO_2$** number & waveform (most reliable) ☐ **Time of tube confirmation**: (Seconds of apnea)_____		
***Troubleshooting** ☐ If breath sounds only on right, withdraw ETT slightly and listen again. ☐ If in esophagus: remove ETT, reoxygenate 30 sec; insert an i-gel ☐ **If ETT cannot be placed successfully** (2 attempts to visualize cords/1 attempt to pass tube) or nothing can be visualized; consider alternate airway; ventilate & monitor as above		
If tube placed correctly ☐ *Inflate cuff w/ up to 10 mL air to proper pressure (minimal leak | avoid overinflation); remove syringe ☐ Note ETT depth: diamond level w/ teeth or gums (3 X ID ETT) ☐ *Insert OPA; align ETT with side of mouth; secure with commercial tube holder; re-secure c-collar & apply lateral head immobilization ☐ *Continue to ventilate at 10 BPM (asthma 6-8); $EtCO_2$ 35-45; O_2 to SpO_2 94% (92% COPD)		
If secretions in tube or gurgling sounds with exhalation: suction prn per procedure ☐ Select a flexible suction catheter; mark maximum insertion length with thumb and forefinger ☐ *Preoxygenate patient; insert sterile catheter into the ET tube leaving catheter port open ☐ At proper insertion depth, cover catheter port and apply suction while withdrawing catheter ☐ Limit suction application time to 10 sec (adult). Ventilate/oxygenate patient per SOP		
***Reassess**: Frequently monitor SpO_2, $EtCO_2$, tube depth, VS, & lung sounds to detect displacement, complications (esp. after pt movement), or condition change. If intubated & deteriorates, consider**:** **D**isplacement of tube, **O**bstruction of tube, **P**neumothorax, **E**quipment failure (DOPE)		
***After 10 min:** Assess need for post invasive airway sedation and analgesia (PIASA) – Use RASS below If RASS (-1) or higher & SBP ≥ 90 (MAP ≥ 65) (in order of preference)**:** ☐ **KETAMINE** (pain dose**)** 0.3 mg/kg slow IVP (pain relief + sedation) unless contraindicated OLMC NOT needed for ketamine pain dose added to sedation dose that exceeds max total of 300 mg | OR ☐ **MIDAZOLAM** standard sedation dose + **FENTANYL** (standard dose) if restless/tachycardic (S&S pain)		
State complications of the procedure: ☐ *Post-intubation **hyper or hypoventilation**: Titrate to $ETCO_2$ ☐ ***Barotrauma:** pneumothorax & tension pneumothorax; esophageal perforation ☐ Trauma to teeth, vocal cords, larynx, trachea, mucosal, TMJ injuries, nerve injury ☐ ***Misplaced tube** (esophagus, hypopharynx, mainstem bronchus) ☐ Over sedation ☐ *Peri-intubation **Hypoxia** (<90% SpO_2), **bradycardia** (per age), **hypotension** (SBP <90 mmHg or lowest age-appropriate SBP) or cardiac arrest Peri-intubation period is time from sedative given or last PPV to up to 10 minutes post any invasive airway attempt		
Verbalize post-procedure cleaning & disinfection: Separate display and video adapter from the blade. Dispose of blade per standard protocol and clean/disinfect display and video adapter/I-2 policy.		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
***Critical error criteria in addition to starred items:** Check if occurred during an attempt ☐ Failure to ventilate w/in 30 sec if pt apneic or hypoventilating after applying PPE/interrupts ventilations for >30 sec at any time ☐ Failure to provide appropriate FiO_2 preox and during peri-intubation period ☐ Failure to ventilate patient at appropriate rate, volume or pressure: max 2 errors/min permissible ☐ Failure to successfully intubate within 2 attempts without immediately attempting alternate airway ☐ Suctions patient excessively or does not suction the patient when needed ☐ Exhibits unacceptable affect with patient or other personnel ☐ Performs in a way that could cause harm to a pt or is inconsistent with competent care		

Factually document below your rationale for checking any of the above critical criteria.

_____

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Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

☐ **Competent:** All key steps independently performed with correct technique, sequence and timing. All starred (*) items explained/performed correctly with no critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 1/24

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Preceptor (PRINT NAME – signature)

The **Richmond Agitation Sedation Scale (RASS)**

Assesses level of alertness or agitation | Used after placement of ADV airway to avoid over/under-sedation

Combative	+4	Agitated	+2	Alert and calm	0	Light sedation	-2	Deep sedation	-4
Very agitated	+3	Restless	+1	Drowsy	-1	Moderate sedation	-3	Unarousable sedation	-5

Goal: RASS -2 to -3. If higher (not sedated enough) assess for pain, anxiety | Rx appropriately to achieve RASS of -2

NWC EMSS Skill Performance Record

DRUG-ASSISTED VIDEO LARYNGOSCOPY INTUBATION

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An awake adult has severe dyspnea and exhaustion from HF or asthma. Prepare equipment and intubate using DAI procedure.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
* Takes appropriate BSI precautions: gloves, goggles, mask | HEPA filter for ventilating w/ BVM		
State indications: ☐ Actual or potential airway impairment/compromise or aspiration risk that cannot be mitigated by BLS interventions ☐ Actual or impending hypoxic or hypercarbic resp. failure (apnea, ineffective ventilatory effort; $SpO_2 \leq 90$; $EtCO_2 \geq 60$) | BLS airways, NIPPV, BVM ventilations contraindicated or ineffective ☐ Increased work of breathing (WOB) (e.g., retractions, use of accessory muscles) resulting in severe fatigue ☐ Need for ↑ insp. pressure or PEEP to maintain gas exchange | NIPPV/BVM ventilations contraindicated or ineffective ☐ Need for sedation to control or effectively assist ventilations		
State contraindications/restrictions to use of sedatives: ☐ Coma with absent airway reflexes or known hypersensitivity/allergy ☐ Use in pregnancy could be potentially harmful to fetus; consider risk/benefit		
State contraindications to ETI: Severe airway trauma or obstruction that does not permit the safe placement of an ET tube		
Prepare patient ☐ **Position** for optimal view and airway access (head up to 45° unless contraindicated) (Prolongs safe apneic period; improves glottic visualization; improves intubation success; decreases post intubation aspiration) ☐ Open the airway manually; *insert BLS adjuncts: NPA or OPA unless contraindicated		
Assess to the extent possible for S&S suggesting they may be **difficult to ventilate:** (MOANS": mask seal, obesity, age (elderly), no teeth, stiffness | "BONES": beard, obese, no teeth, elderly, sleep apnea/snoring.)		
Assess for signs suggesting a difficult intubation (LEMON): Look, Evaluate the 3-3-2 rule, Mallampati score, Obstruction, and Neck mobility. The 3-3-2 rule measures the inter-incisor distance, hyoid-to-mental distance, and thyroid-to-hyoid distance.		
Assess GCS, VS; SpO_2 on RA; auscultate breath sounds for baseline		
***Preoxygenate 3 minutes:** O_2 wash in; nitrogen wash out ☐ **Apply O_2 at 15 L/$ETCO_2$ NC**; maintain before and during procedure ☐ RR ≥10 / AWAKE / good ventilatory effort: Consider CPAP at 5-10 PEEP if not contraindicated ☐ RR <10 or shallow: O_2 15 L/BVM squeeze bag over 1 sec providing just enough air to see visible chest rise (~400-600mL); avoid high airway pressure (≥25cm H_2O) & gastric distention. Ventilate at 10 BPM (1 every 6 sec) to SpO_2 94% | $EtCO_2$ 35-45 If Hx asthma/COPD: 6-8 BPM to SpO_2 92%. If SpO_2 does not meet this goal, contact OLMC. ☐ If only 1 O_2 source: Sense $EtCO_2$ via NC (no O_2); deliver O_2 through BVM until procedure starts. Then switch O_2 source to NC and run throughout ETI insertion		
Prepare (select, check, assemble) equipment – have ready before pacing blade into mouth		
☐ BLS airways; O_2 sources; size appropriate BVM bags and masks ☐ **Suction equipmen**t (DuCanto rigid and 12-14 Fr flexible catheters); turn on to ✓ unit ☐ King Vision device & blade (curved channeled) | ETT 7.0 & 7.5 (must fit into channeled blade) ☐ Bougie; 10 mL syringe, water-soluble lubricant ☐ BP, $EtCO_2$, SpO_2, ECG monitors; commercial tube holder, head blocks or tape, stethoscope ☐ Alternate airways prepped & in sight (i-gel; cricothyrotomy) ☐ **Medications**: Ketamine, etomidate, fentanyl, midazolam (depending on pt)		
*Check ETT cuff integrity while in package; fill syringe w/ 10 mL of air; leave attached to pilot tubing		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
*Assemble King Vision per standard procedure; ensure it is operational. Load ET tube into lubricated channel; load bougie inside tube. Ensure tube does not extend past channel in blade.		
Premedicate during pre-ox: Pain present + etomidate or midazolam being used to sedate: **FENTANYL** 1 mcg/kg (max single dose 100 mcg) IVP/IO/IN/IM; Elderly/debilitated: 0.5 mcg/kg (max 50 mcg)		
***SEDATE:** Optimum sedation evidenced by absent gag reflex (lack of eyelash reflex or response to a glabellar tap); easy up and down movement of jaw, no reaction to pressure applied to both angles of the mandible). Allow for clinical response before intubating | Estimate wt carefully **Order of preference** ☐ **KETAMINE 2 mg/kg** slow **IVP** (over one min) or **4 mg/kg IN** (NAS) **/ IM (max 300 mg) OR** ☐ Child ≥10: **ETOMIDATE 0.5 mg/kg IVP** (max 40 mg) if ketamine refused/contraindicated ☐ If no ketamine or etomidate due to drug shortage: MIDAZOLAM 5 mg IVP/IN + FENTANYL 100 mcg IVP/IN. If insufficient sedation: repeat Midazolam 5 mg IVP/IN | Additional doses require OLMC using dosing per the SOP		
Intubate:		
☐ Maintain O_2 15 L/EtCO_2 NC during procedure ☐ When ready to perform procedure: stop ventilating pt.; withdraw OPA (NPA remains) ☐ Monitor VS, level of consciousness, skin color, $ETCO_2$; SpO_2 during procedure; time elapsed		
START TIMING tube placement after last breath_____ ☐ Open mouth w/ standard technique ☐ *Insert King Vision blade midline over tongue per standard technique until epiglottis is visualized ☐ *Seat blade in vallecula; **DO NOT LIFT!** Visualize vocal cords. **Suction secretions** prn. ☐ If the distal window becomes obstructed or obscured (e.g., blood/secretions) or cords cannot be visualized, remove the blade from the patient's mouth and clear the lens, suction prn. Note: Each blade insertion into mouth = 1 attempt | Limit 2 attempts		
***Insert bougie into trachea per standard technique:** If needed, twist bougie to left or right to guide between cords. Avoid forceful insertion (tracheal trauma). *Confirm bougie placement into trachea per standard technique		
***Insert ET tube: Limit 1 attempt at ETT insertion** ☐ Maintain view with King Vision in place and advance ETT over bougie and through glottis ☐ Rotate ETT to facilitate insertion through cords into trachea if resistance met at glottic opening or cricoid ring. ☐ Advance ETT to proper depth (3 X tube ID at teeth)		
☐ ***Remove blade**: Firmly hold ETT in place; remove from channel per standard technique ☐ Turn off the display by pressing and holding the POWER button. ☐ Carefully remove bougie from the ETT.		
***Confirm tracheal placement:** Ensure adequate ventilations + oxygenation: ☐ 15 L O_2 /BVM at 10 BPM (asthma/COPD 6-8 BPM); volume & pressure just to see chest rise ☐ 5-point auscultation: Confirm absent gastric sounds + bilateral breath sounds (midaxillary and anterior chest) ☐ **Definitive confirmation**: **$ETCO_2$** number & waveform (most reliable) ☐ **Time of tube confirmation**: (Seconds of apnea)_____		
***Troubleshooting** ☐ If breath sounds only on right, withdraw ETT slightly and listen again. ☐ If in esophagus: remove ETT, reoxygenate 30 sec; insert an i-gel ☐ **If ETT cannot be placed successfully** (2 attempts to visualize cords/1 attempt to pass tube) or nothing can be visualized; consider alternate airway (BIAD); ventilate & monitor as above | Consider need for additional medication		
If tube placed correctly ☐ *Inflate cuff w/ up to 10 mL air to proper pressure (minimal leak | avoid overinflation); remove syringe ☐ Note ETT depth: diamond level w/ teeth or gums (3 X ID ETT) ☐ *Insert OPA; align ETT with side of mouth; secure with commercial tube holder; apply lateral head immobilization ☐ *Continue to ventilate at 10 BPM (asthma 6-8); $ETCO_2$ 35-45; O_2 to SpO_2 94% (92% COPD)		
If secretions in tube or gurgling sounds with exhalation: suction ETT prn per procedure ☐ Use a flexible suction catheter; mark maximum insertion length (only inserted to the tip of the ETT and never exceed 0.5 cm beyond ETT tip to prevent mucosal irritation and injury) with thumb and forefinger ☐ *Preoxygenate patient; insert sterile catheter into the ET tube leaving catheter port open ☐ At proper insertion depth, cover catheter port and apply suction while withdrawing catheter ☐ Limit suction application time to 10 sec (adult). Ventilate/oxygenate patient per SOP.		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
*__Reassess__: Frequently monitor SpO_2, $EtCO_2$, tube depth, VS, & lung sounds to detect displacement, complications (esp. after pt movement), or condition change. If intubated & deteriorates, consider**:** **D**isplacement of tube, **O**bstruction of tube, **P**neumothorax, **E**quipment failure (DOPE)		
***After 10 min:** Assess need for post invasive airway sedation and analgesia (PIASA) – **Use RASS** below If RASS (-1) or higher & SBP ≥ 90 (MAP ≥ 65) (in order of preference)**:** ☐ **KETAMINE** (pain dose**)** 0.3 mg/kg slow IVP (pain relief + sedation) unless contraindicated OLMC NOT needed for ketamine pain dose added to sedation dose that exceeds max total of 300 mg | OR ☐ **MIDAZOLAM** standard sedation dose + **FENTANYL** (standard dose) if restless/tachycardic (S&S pain)		
State complications of the procedure: ☐ *Post-intubation **hyper or hypoventilation**: Titrate to $ETCO_2$ ☐ ***Barotrauma:** pneumothorax & tension pneumothorax; esophageal perforation ☐ Trauma to teeth, vocal cords, larynx, trachea, mucosal, TMJ injuries, nerve injury ☐ ***Misplaced tube** (esophagus, hypopharynx, mainstem bronchus) ☐ ***Over sedation** ☐ *Peri-intubation **Hypoxia** (<90% SpO_2), **bradycardia** (per age), **hypotension** (SBP <90 mmHg or lowest age-appropriate SBP) or cardiac arrest Peri-intubation period is time from sedative given or last PPV to up to 10 minutes post any invasive airway attempt		
Verbalize post-procedure cleaning & disinfection: After the procedure is complete, separate the display and video adapter from the blade. Dispose of blade per standard protocol and clean/disinfect display and video adapter/I-2 policy.		
***Critical error criteria in addition to starred items:** Check if occurred during an attempt ☐ Failure to ventilate w/in 30 sec if pt apneic or hypoventilating after applying PPE/interrupts ventilations for >30 sec at any time ☐ Failure to provide appropriate FiO_2 preox and during peri-intubation period ☐ Failure to ventilate patient at appropriate rate, volume or pressure: max 2 errors/min permissible ☐ Failure to successfully intubate within 2 attempts without immediately attempting alternate airway ☐ Suctions patient excessively or does not suction the patient when needed ☐ Exhibits unacceptable affect with patient or other personnel ☐ Performs in a way that could cause harm to a pt or is inconsistent with competent care		

Factually document below your rationale for checking any of the above critical criteria.

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_____

Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

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CJM 1/24

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Preceptor (PRINT NAME – signature)

The **Richmond Agitation Sedation Scale (RASS)**

Assesses level of alertness or agitation | Used after placement of ADV airway to avoid over/under-sedation

Combative	+4	Agitated	+2	Alert and calm	0	Light sedation	-2	Deep sedation	-4
Very agitated	+3	Restless	+1	Drowsy	-1	Moderate sedation	-3	Unarousable sedation	-5

Goal: RASS -2 to -3. If higher (not sedated enough) assess for pain, anxiety | Rx appropriately to achieve RASS of -2

NWC EMSS Skill Performance Record

DIGITAL INTUBATION

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: A comatose adult is found entrapped and gasping behind the steering wheel in an MVC. The patient's position makes rapid extrication and traditional intubation impossible. A radial pulse is present. Prepare equipment and perform a digital intubation.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
State advantages of this approach: ☐ Fast (in experienced hands); no requirement for optimal positioning ☐ Allows intubation to be performed without a laryngoscope or a view of the larynx ☐ Minimal c-spine movement for trauma patients		
State indications: ☐ *Patient must be comatose or in cardiac arrest ☐ Standard ETI technique is contraindicated, has failed, or is not possible: cramped environment (e.g. patient trapped in vehicle; abnormal anatomy) ☐ Inability to visualize vocal cords with laryngoscope		
Contraindications ☐ Significant laryngotracheal deformity obscuring palpable anatomy ☐ Possibility of injury to provider due to patient biting or thrashing		
* Takes appropriate BSI precautions: gloves, goggles, mask | HEPA filter for ventilating w/ BVM		
Prepare patient Open the airway manually; *insert BLS adjuncts: NPA and OPA unless contraindicated		
Assess for signs suggesting a difficult intubation (LEMON): neck/mandible mobility, oral trauma, loose teeth; F/B; ability to open mouth, Mallampati view, thyromental distance; over or underbite		
Assess SpO_2 on RA if time and personnel allow; auscultate breath sounds for baseline		
***Preoxygenate 3 minutes:** ☐ **Apply O_2 at 15 L/$ETCO_2$ NC**; maintain before and during procedure ☐ RR ≥10 / AWAKE / good ventilatory effort: Consider CPAP at 5-10 PEEP if not contraindicated ☐ RR <10 or shallow: O_2 15 L/BVM squeeze bag over 1 sec providing just enough air to see visible chest rise (~400-600mL); avoid high airway pressure (≥25cm H_2O) & gastric distention. Ventilate at 10 BPM (1 every 6 sec) to SpO_2 94% | $EtCO_2$ 35-45 If Hx asthma/COPD: 6-8 BPM to SpO_2 92%. If SpO_2 does not meet this goal, contact OLMC. ☐ If only 1 O_2 source: Sense $EtCO_2$ via NC (no O_2); deliver O_2 through BVM until procedure starts. Then switch O_2 source to NC and run throughout ETI insertion.		
Prepare (select, check, assemble) equipment		
Have everything ready before placing fingers into the mouth ☐ Prepare **suction equipmen**t (DuCanto rigid and 12-14 Fr flexible catheters); turn on to ✓ unit ☐ Select ETT (size of 5th finger); prepare one size larger and one smaller than anticipated size ☐ Bougie; 10 mL syringe, water-soluble lubricant ☐ $EtCO_2$, SpO_2, ECG monitor; commercial tube holder, head blocks or tape, BP cuff; stethoscope ☐ Have alternate airway selected, prepped, & in sight (i-gel, cricothyrotomy)		
* Check ETT cuff integrity while in package; fill syringe w/ 10 mL of air; leave attached to pilot tubing		
Place lubricant on inside of the top of the ETT package		
Intubate/Pass tube: *(Allow no more than 30 sec of apnea)		
☐ Maintain O_2 15 L/$ETCO_2$ NC during procedure ☐ When ready to perform procedure: stop ventilating pt.; place **OPA on side between molars** ☐ Monitor VS, level of consciousness, skin color, $ETCO_2$; SpO_2 during procedure; time elapsed		
START TIMING tube placement after last breath_____ ☐ Intubator: Position self at pt's side		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
☐ **Suction secretions** prn for optimal attempt & reduce risk of aspiration		
☐ *Insert middle and index fingers of nondominant hand into pt's mouth. Walk fingers along back of tongue until epiglottis is palpated. May also palpate arytenoid cartilages posterior to glottis. ☐ *Thread bougie through glottis with the fingertips and advance into the trachea. Tactile vibrations confirm tracheal placement. Position bougie so the 25-cm mark is at the corner of the lip.		
☐ *Withdraw ET tube from package through lubricant; hold in dominant hand ☐ *Hold bougie in place, thread ETT over the bougie ☐ If resistance met at vocal cords or cricoid ring, turn ETT a quarter turn & advance to correct depth ☐ Hold ETT in place and withdraw bougie		
***If attempt takes > 30 sec:** Remove fingers, reoxygenate X 30 sec. If pt. remains good candidate for ETI, change position or PM and attempt again. Consider alternate airway if unable to feel anything.		
***Confirm tracheal placement:** ☐ Ensure adequate ventilations & oxygenation: 15 L O_2 /BVM; ventilate at 10 BPM (asthma/COPD 6-8 BPM); volume & pressure just to see chest rise ☐ 5-point auscultation: Confirm absent gastric sounds + bilateral breath sounds (midaxillary and anterior chest) ☐ **Definitive confirmation**: **monitor $ETCO_2$** number & waveform (most reliable) ☐ **Time of tube confirmation**: (Seconds of apnea)_____		
***Troubleshooting** ☐ If breath sounds only on right, withdraw ETT slightly and listen again. ☐ If in esophagus: remove ETT, reoxygenate 30 sec; insert an i-gel ☐ **If ETT cannot be placed successfully** (2 attempts) consider alternate airway		
If tube placed correctly ☐ *Inflate cuff w/ up to 10 mL air to proper pressure (minimal leak | avoid overinflation); remove syringe ☐ Note ETT depth: diamond level w/ teeth or gums (3 X ID ETT) ☐ *OPA (normal position); align ETT with side of mouth; secure with commercial tube holder; lateral head immobilization ☐ *Continue to ventilate at 10 BPM (asthma 6-8); $ETCO_2$ 35-45; O_2 to SpO_2 94% (92% COPD)		
If secretions in tube or gurgling sounds with exhalation: suction prn per procedure ☐ Select a flexible suction catheter; mark maximum insertion length with thumb and forefinger ☐ *Preoxygenate patient; insert sterile catheter into the ET tube leaving catheter port open ☐ At proper insertion depth, cover catheter port and apply suction while withdrawing catheter ☐ Limit suction application time to 10 sec (adult). Ventilate/oxygenate patient per SOP.		
***Reassess**: Frequently monitor SpO_2, $EtCO_2$, tube depth, VS, & lung sounds to detect displacement, complications (esp. after pt movement), or condition change. If intubated & deteriorates, consider**:** **D**isplacement of tube, **O**bstruction of tube, **P**neumothorax, **E**quipment failure (DOPE)		
****After 10 min:** Assess need for post invasive airway sedation and analgesia (PIASA) – **Use RASS** below If RASS (-1) or higher & SBP ≥ 90 (MAP ≥ 65) (in order of preference)**:** ☐ **KETAMINE** (pain dose**)** 0.3 mg/kg slow IVP (pain relief + sedation) unless contraindicated OLMC NOT needed for ketamine pain dose added to sedation dose that exceeds max total of 300 mg | OR ☐ **MIDAZOLAM** standard sedation dose + **FENTANYL** (standard dose) if restless/tachycardic (S&S pain)		
State complications of the procedure: ☐ *Post-intubation **hyper or hypoventilation**: Titrate to $ETCO_2$ ☐ ***Barotrauma:** pneumothorax & tension pneumothorax; esophageal perforation ☐ Trauma to teeth, vocal cords, larynx, trachea, mucosal, TMJ injuries, nerve injury ☐ ***Misplaced tube** (esophagus, hypopharynx, mainstem bronchus) ☐ Over sedation ☐ *Peri-intubation **Hypoxia** (<90% SpO_2), **bradycardia** (per age), **hypotension** (SBP <90 mmHg or lowest age-appropriate SBP) or cardiac arrest Peri-intubation period is time from sedative given or last PPV to up to 10 minutes post any invasive airway attempt		
***Critical error criteria in addition to starred items:** Check if occurred during an attempt ☐ Failure to ventilate w/in 30 sec if pt apneic or hypoventilating after applying PPE/interrupts ventilations for >30 sec at any time ☐ Failure to provide appropriate FiO_2 preox and during peri-intubation period ☐ Failure to ventilate patient at appropriate rate, volume or pressure: max 2 errors/min permissible ☐ Failure to successfully intubate within 2 attempts without immediately attempting alternate airway ☐ Suctions patient excessively or does not suction the patient when needed ☐ Exhibits unacceptable affect with patient or other personnel ☐ Performs in a way that could cause harm to a pt or is inconsistent with competent care		

Factually document below your rationale for checking any of the above critical criteria.

_____

_____

Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

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CJM 1/24

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Preceptor (PRINT NAME – signature)

The **Richmond Agitation Sedation Scale (RASS)**

Assesses level of alertness or agitation | Used after placement of ADV airway to avoid over/under-sedation

Combative	+4	Agitated	+2	Alert and calm	0	Light sedation	-2	Deep sedation	-4
Very agitated	+3	Restless	+1	Drowsy	-1	Moderate sedation	-3	Unarousable sedation	-5

Goal: RASS -2 to -3. If higher (not sedated enough) assess for pain, anxiety | Rx appropriately to achieve RASS of -2

References:

- https://litfl.com/blind-digital-intubation/#:~:text=After%20the%20epiglottis%20is%20identified,tracheal%20placement%20of%20the%20bougie.
- https://www.ncbi.nlm.nih.gov/pmc/articles/PMC2566913/
- https://www.jem-journal.com/article/0736-4679(84)90159-8/pdf

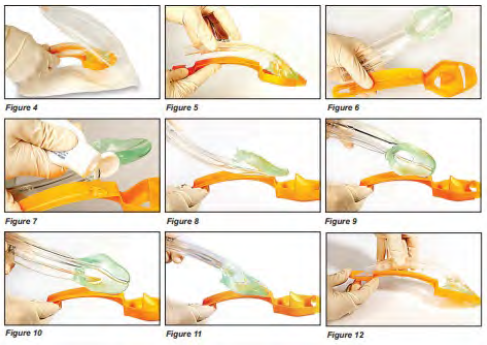
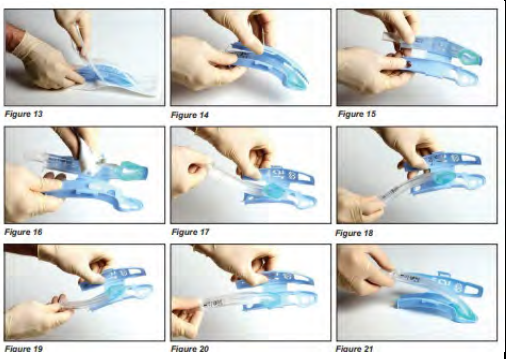
NWC EMSS Skill Performance Record

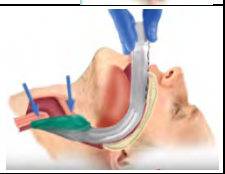
i-gel^{O2}™ Supraglottic Airway

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An unconscious adult is apneic with a pulse and two attempts at intubation have been unsuccessful, contraindicated, or not advised. Prepare equipment and provide an alternate advanced airway using an i-gel.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
* BSI: Gloves, goggles, facemask		
State intended purpose and advantages of using an i-gel airway: ☐ **Purpose**: To create a rapid non-inflatable anatomical seal of the pharyngeal, laryngeal and perilaryngeal structures in providing a supraglottic advanced airway. ☐ **Advantages**: Ease and speed of insertion, non-inflating cuff; superior seal; less cuff air leak or over pressurization; multiple sizes; minimal risk of tissue compression and displacement		
State indications: Adult or child with ☐ Actual or potential airway compromise, aspiration risk, and/or hypoxic or hypercarbic respiratory failure: Apnea, RR <10 (adults); <12 or >40 (peds), shallow/labored effort; increased WOB (retractions, nasal flaring, grunting) leading to fatigue; SpO_2 ≤ 90% (adults) | 94% (peds); $EtCO_2$ ≥50-60 not mitigated by non-invasive interventions and/or ETI contraindicated or unsuccessful ☐ Need for PPV/PEEP to maintain gas exchange or sedation to control ventilations ☐ Need for CPR where ETI placement cannot be done without interrupting compressions		
*__State at least 4 contraindications__ ☐ +Gag reflex ☐ Caustic ingestion ☐ Trismus ☐ Limited mouth opening ☐ Severe airway trauma or obstruction that does not permit the safe placement of an SGA		
Precautions ☐ Do not use excessive force to insert the device or suction catheters ☐ Inadequate sedation with retained gag reflex may lead to coughing, bucking, excessive salivation, retching, laryngospasm or breath holding. ☐ Do not reuse or attempt to reprocess the i-gel ☐ Conditions that may increase the risk of a full stomach & aspiration during procedure: hiatal hernia, extreme obesity, pregnancy or a history of upper GI surgery etc. Have suction ready.		
Prepare patient: Explain each step as it is performed even though pt appears unconscious ☐ Sniffing position unless head/neck movement is inadvisable or contraindicated. ☐ Remove dentures or removable plates from the mouth before attempting insertion.		
***Preoxygenate/denitrogenation 3 minutes:** ☐ **Apply O_2 at 15 L/$ETCO_2$ NC**; maintain during procedure – PLUS (need 2nd O_2 source): ☐ IF RR ≥10; AWAKE / good ventilatory effort: Consider CPAP at 5-10 PEEP if not contraindicated ☐ IF RR <10 or shallow: O_2 15 L/BVM; squeeze bag over 1 sec providing just enough air to see visible chest rise (~400-600mL); avoid high airway pressure (≥25cm H_2O) & gastric distention. Ventilate at 10 BPM (1 every 6 sec) to $EtCO_2$ (35-45) and SpO_2 94% | $EtCO_2$ 35-45 (Hx asthma/COPD: 6-8 BPM to SpO_2 92%). If oximetry does not meet this goal, contact OLMC. ☐ If apneic and in cardiac arrest: Consider if apneic preox is indicated and DO NOT VENTILATE ☐ If only 1 O_2 source; sense $EtCO_2$ through NC (no O_2); deliver O_2 through BVM until procedure starts. Then switch O_2 source to NC and run throughout ETI insertion.		
Prepare (select, check, assemble) equipment before beginning procedure ☐ Prepare suction equipment (connect DuCanto); turn on to ✓ unit; suction prn ☐ Clear secretions – suction as needed prior to insertion.		
i-gel device: ☐ *Choose correct **size** based on patient's ideal weight (see chart end of procedure) ☐ **Inspect packaging**; ensure no damage prior to opening; within expiration date ☐ **Open package** with aseptic technique: Inspect bowl to ensure surfaces are smooth and intact ☐ Discard if device tube or body appears abnormal or deformed. ☐ Ensure the 15 mm connector is secure		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
***Prep adult sizes (last minute of preox)** Open package; remove device from protective cradle and transfer to same hand holding the cradle. Support device between thumb and index finger (figure 6). **Place a small amount of a water-based lubricant onto middle of cradle's smooth surface** (figure 7). Grasp i-gel at integral bite block area with the opposite (free) hand and lubricate back, sides and front of the cuff by pulling through lubricant. Repeat if lubrication is inadequate. After completed, ensure that no bolus of lubricant remains in the cuff bowl or elsewhere on the device.  Avoid touching cuff with your hands (figures 8, 9, 10 and 11); see notes below*. **Place i-gel back into cradle** in preparation for insertion (figure 12). **Warning**: Separate **i-gel from cradle prior to insertion. Never insert cradle into pt's mouth.**		
***Prep child sizes (last minute of preox)** Open cage package and remove the device (fig. 13). Transfer device into cage lid. **Place a small bolus of a water-based lubricant onto the smooth inner surface of cage** (fig. 14, 15 and 16). Grasp i-gel at integral bite block area with the opposite (free) hand and lubricate back, sides and front of the cuff by pulling through lubricant. Repeat if lubrication is inadequate. After completed, ensure that no bolus of lubricant remains in cuff bowl or elsewhere on the device.  Avoid touching the cuff with your hands (figures 17, 18, 19, and 20); see notes below* Place i-gel back into cage pack in prep for insertion (fig 21).		
***Notes:** ▪ Do not place device directly onto pt's chest or surface near patient's head; always place in protective cradle/cage pack after lubrication, pending insertion. ▪ Do not use unsterile gauze or your finger to help lubricate the device. ▪ Do not apply lubricant too long before insertion (need to maintain moisture).		
Prep confirming & securing equipment: In-line $ETCO_2$ sensor attached to BVM, tube strap, head immobilizer, stethoscope (put around neck)		
Premedicate if applicable: Fentanyl per SOP for pain (not necessary if ketamine used for sedative)		
***Sedate:** Achieve optimum sedation prior to insertion (absence of gag reflex suggested by lack of eyelash reflex or response to a glabellar tap; easy up and down movement of the lower jaw, no reaction to pressure applied to both angles of the mandible). ☐ **Ketamine** (preferred) 2 mg/kg slow IVP (over one min) or 4 mg/kg IM or IN ☐ Child ≥10: **Etomidate** 0.5 mg/kg IVP (max 40 mg) if ketamine contraindicated or unavailable ☐ **If no ketamine or etomidate due to drug shortage:** **ADULT**: **Midazolam** 5 mg IVP/IN + **Fentanyl** 100 mcg IVP/IN. If insufficient sedation: repeat Midazolam 5 mg IVP/IN | Additional doses require OLMC and per the SOP **PEDS**: **Midazolam** 0.1 mg/kg slow IVP (0.2 mg/kg IN/IM) (Max single dose 2 mg). May repeat q. 2 min to a max total dose < 6 yrs: 6 mg | 6-12 yrs: 10 mg titrated to size and age-appropriate VS + **Fentanyl**: peds ≥ 2 years: 1 mcg/kg (round to nearest 5 mcg) up to 100 mcg		
***INSERTION TECHNIQUE (Proficient users can insert in < 5 sec)**  ☐ Remove i-get from protective cradle or pack. ☐ Grasp lubricated i-gel firmly along the integral bite block. Position device so cuff outlet is facing towards patient's chin. ☐ Gently press down on chin to open mouth (no fingers or thumbs in mouth) ☐ Introduce leading soft tip into pt's mouth in a direction towards hard palate ☐ Glide device downwards and backwards along the hard palate with continuous but gentle pressure until definitive resistance is felt. May feel a 'give-way' before end point resistance is met due to the i-gel bowl passing through the Faucial pillars. Continue to insert device until definitive resistance is felt.		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Do not push i-gel up and down or apply excessive force during insertion. If resistance occurs during insertion, do jaw thrust maneuver or rotate device For pt in spine motion restriction, prevent head movement by placing thumbs on maxilla & hands around head (in-line maneuver) 		
Once definitive resistance met, airway tip should be in the upper esophageal opening and cuff should be against laryngeal framework. Teeth incisors should be resting on integral bite-block*. **Limit:** 2 attempts per patient. WARNING: HOLD tube in correct position until device is secured in place 		
*A horizontal line (adult sizes 3, 4, 5) at the middle of the bite-block represents **correct teeth position**. If not correctly aligned, remove i-gel and reinsert with a gentle jaw thrust applied by an assistant. If still not resolved, use one size smaller. **Peds sizes** (1 to 2.5) do not have a horizontal line on the integral bite block due to the greater variability in the length of the oropharyngeal-laryngeal arch in children. Insert until definitive resistance is met. Teeth may rest anywhere on the bite block. 		
☐ ***Ventilate** at 10 BPM (asthma 6-8); monitor $ETCO_2$ 35-45; give O_2 to SpO_2 94% (92% COPD); volume and pressure just to see visible chest rise ***CONFIRM proper tube position** (listed in order) ☐ Auscultation stomach; bilateral breath sounds over midaxillary lines & anterior chest ☐ $ETCO_2$ by quantitative waveform capnography ☐ Little gastric air channel leak: excessive leak means device is incompletely inserted. *If tube NOT positioned accurately, remove; ventilate with NPA/OPA & BVM. May reattempt X 1.		
☐ **SECURE**: When good ventilations and appropriate positioning established, tape in place from 'maxilla to maxilla' (tube midline in mouth) or secure with head strap included in kit. ☐ Apply lateral head immobilization		
If required, pass an adequately lubricated, appropriate size NG or **suction catheter** down the gastric channel (see last page of procedure). Place small bolus of lubricant over proximal end of gastric channel prior to inserting suction catheter. Move catheter in and out slightly while inserting to distribute lubricant. ***Do not insert catheter through gastric channel if there is:** ▪ An excessive air leak through the gastric channel ▪ Esophageal varices or evidence of upper GI bleed; esophageal trauma ▪ Hx of upper GI surgery | Hx of bleeding/clotting abnormalities NG insertion in the presence of inadequate levels of sedation can lead to coughing, bucking, excessive salivation, retching, laryngospasm or breath holding		
***REASSESS**: Frequently to detect displacement and complications (especially after pt. movement or pt. status/condition changes) ☐ $EtCO_2$ ☐ Lung sounds ☐ SpO_2 ☐ HR ☐ BP (MAP)		
***After 10 min:** Assess need for pos tinvasive airway sedation and analgesia (PIASA) – **Use RASS** below If RASS (-1) or higher & SBP ≥ 90 (MAP ≥ 65) (in order of preference)**:** ☐ **KETAMINE** (pain dose**)** 0.3 mg/kg slow IVP (pain relief + sedation) unless contraindicated OLMC NOT needed for ketamine pain dose added to sedation dose that exceeds max total of 300 mg | OR ☐ **MIDAZOLAM** standard sedation dose + **FENTANYL** (standard dose) if restless/tachycardic (S&S pain) If patient wakes: Remove tube in an area where suction equipment and ability to rapidly replace is present		
Troubleshooting: If all of the below fail - change to one size larger i-gel Peak airway pressure of ventilation must not exceed 40 cm H_2O to prevent barotrauma. If an excessive air leak is detected during PPV, use one or all of the following: ▪ Hand ventilate pt. with gentle and slow squeezing of the BVM ▪ Limit tidal volume to no more than 5mL/kg | Limit peak airway pressure to 15-20 cm of H_2O ▪ Assess the depth of sedation to ensure that pt is not bucking the tube		
Risks and Complications of inserting an i-gel ☐ Laryngospasm ☐ Sore throat ☐ Tongue numbness ☐ Cyanosis ☐ Trauma to the pharyngo-laryngeal framework ☐ Down-folding of epiglottis (more common in children) ☐ Gastric insufflation, regurgitation and inhalation of the gastric contents ☐ Nerve injuries, vocal cord paralysis, lingual or hypoglossal nerve injuries		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
☐ If placed too high in the pharynx, may result in a poor seal and cause excessive leakage ☐ If tip of i-gel enters glottic opening, will have an excessive air leak through gastric channel and obstruction to airflow. If NG or suction catheter is inserted through i-gel gastric channel, it will enter the trachea and lungs. If suspected, remove and reinsert with gentle jaw thrust. ☐ *Peri-placement **Hypoxia** (<90% SpO_2), **bradycardia** (per age), **hypotension** (SBP <90 mmHg or lowest age-appropriate SBP) or cardiac arrest Peri-placement period is time from sedative given or last PPV to up to 10 minutes post any invasive airway attempt		
Critical Criteria - Check if occurred during an attempt ☐ Failure to initiate ventilations within 30 sec after taking BSI precautions or interrupts ventilations for >30 sec at any time ☐ Failure to provide high oxygen concentration [at least 85%] ☐ Failure to ventilate at an appropriate rate & volumes [maximum 2 errors/min permissible] ☐ Failure to insert the SGA at a proper depth or location within 2 attempts ☐ Failure to confirm that pt is being ventilated properly (correct lumen and proper insertion depth) by auscultation bilaterally over lungs and over epigastrium & $EtCO_2$ ☐ Insertion or use of any adjunct in a manner dangerous to the patient ☐ Exhibits unacceptable affect with patient or other personnel ☐ Uses or orders a dangerous or inappropriate intervention		

Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

☐ **Competent:** All key steps independently performed with correct technique, sequence and timing. All starred (*) items explained/performed correctly with no critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 1/24

Preceptor (PRINT NAME – signature)

i-gel size	Patient Size	Pt wt (kg)	(LBS)	Broselow color	NG or Suction size
1.5	Infant	5-12 kg	11-25	Pink, red, purple	10 Fr.
2	Small child	10-25 kg	22-55	Yellow, white, blue	10 Fr.
2.5	Large child	25-35 kg	55-77	Orange	10 Fr.
3	Small adult	30-60 kg	65-130	Green (2.5-3)	12 Fr.
4	Medium adult	50-90 kg	110-200		12 Fr.
5	Large adult	90+ kg	200+		14 Fr.

Sizing by weight: While size selection based on weight is applicable to most patients, individual anatomical variations mean the weight guidance should always be considered with a clinical assessment of the pt's anatomy. Those with cylindrical necks or wide thyroid/cricoid cartilages may require a larger size than would normally be recommended on a wt basis. Patients with a broad or stocky neck or smaller thyroid/cricoid cartilage, may require a smaller size. Patients with central obesity, where the main weight distribution is around the abdomen and hips, might require an i-gel of a size commensurate with the ideal body weight for their height rather than their actual body weight.

The **Richmond Agitation Sedation Scale (RASS)** assesses level of alertness or agitation

Used after placement of advanced airway to avoid over and under-sedation

Combative	+4	Agitated	+2	Alert and calm	0	Light sedation	-2	Deep sedation	-4
Very agitated	+3	Restless	+1	Drowsy	-1	Moderate sedation	-3	Unarousable sedation	-5

Goal: RASS -2 to -3. If higher (not sedated enough) assess for pain, anxiety. Treat appropriately to achieve RASS of -2.

Features of an ideal Second-Generation SGA

Built-in bite block to reduce airway occlusion | Improved pharyngeal occlusion seal pressures
Improved cricopharyngeal/esophageal seal to lower risk for regurgitated material entering the airway
Portal access to GI tract for catheter advancement to remove contents | Portal to passively allow liquid GI contents to exit
Optimal centered position and angle of cuff bowl to optimize visualization. Widened and shortened airway tube to optimize SGA-assisted intubation

NWC EMSS Skill Performance Record

SURGICAL CRICOTHYROTOMY

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: An unconscious adult trauma patient has extensive facial injuries. Prepare the equipment and perform a surgical cricothyrotomy.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
* BSI: Gloves, goggles, facemask		
***Verbalize the indications for the procedure:** ☐ Cannot intubate ☐ Cannot insert a King or alternate airway ☐ Cannot ventilate w/ BVM or other means to maintain SpO_2 > 90%		
* **Verbalize contraindications for procedure:** ☐ Children < 8; need OLMC order for ages 8-12 ☐ Pts with known bleeding disorders and/or anticoagulant therapy ☐ Inability to identify landmarks; laryngeal Fx or trauma causing distortion or obliteration of landmarks		
Prepare the patient Position supine; head in neutral position with padding under shoulders to extend neck slightly unless contraindicated		
Assess VS, ECG, SpO_2 as soon as time & personnel permit		
* Attempt to **preoxygenate** for **3 min** per ETI procedure		
Attempt manual maneuvers for opening upper airway; direct visualization with laryngoscope; may or may not attempt advanced airways based on patient situation		
***Concurrently: Prepare equipment – Have everything ready before beginning procedure** ☐ #11 scalpel ☐ CHG/IPA prep ☐ Clamp/spreader ☐ Stethoscope ☐ Tracheal hook (opt) ☐ ETT 5.0-7.0 ☐ Gauze pads 4X4 ☐ Full BSI ☐ Tube holder ☐ 10 mL syringe ☐ Bougie ☐ Water-soluble lubricant ☐ Capnography ☐ BVM; O_2 source ☐ SpO_2 and ECG monitors ☐ Suction equipment; turn on to ✓ unit ☐ Sharps container		
* Choose correct size cuffed ETT (5.0 to 7.0) (one size smaller than OTI approach)		
*Check cuff integrity while in package; fill syringe w/ 10 mL of air; leave attached to pilot tubing		
Lubricate ETT with water-soluble jelly as it is withdrawn from package (verbalize)		
Perform procedure *** Identify anatomical landmarks**: Palpate thyroid cartilage superiorly & cricoid cartilage inferiorly w/ thumb & middle finger. Locate cricothyroid membrane with index finger. If Rt handed, work from Rt side. If Lt handed, work from pt's left side.		
Consider need for **Fentanyl or Ketamine**; surgical procedures are painful, even if unresponsive		
Prep skin with Chlorhexidine/IPA		
*While stabilizing trachea with non-dominant hand, make a ½ to 1" mid-line vertical incision just through skin over membrane. Partner to control bleeding with gauze pads. Suction site prn.		
* Remove scalpel; feel through incision with index finger; locate cricothyroid membrane		
* Make a horizontal stabbing incision through the membrane; width of the space. Never direct blade upward; cords just above membrane & easily damaged. Expect secretions/blood to spray out if patient breathes. Suction prn.		
* Before removing scalpel, insert forceps or spreader on either side of blade. Withdraw scalpel; open & close forceps to separate cartilages & dilate opening. Place scalpel into sharps container.		
☐ With forceps in place, insert 5th finger through incision ☐ Confirm tracheal penetration with finger ☐ ***Insert Bougie** into incision next to forceps; advance caudally until you meet resistance ☐ Apply tracheal hook to anterior ring of cricoid cartilage (opt) to stabilize distal segment		
* Insert ETT over Bougie; advance until cuff is fully in trachea; advance about 1". Once catheter is advanced, remove tracheal hook and/or Bougie.		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
* **Confirm tracheal placement:** ☐ Ensure adequate ventilations & oxygenation: 15 L O_2 assist ventilations as needed at 10 BPM unless asthma/COPD (6-8 BPM)–observe chest rise; Auscultate over epigastrium, both midaxillary lines and anterior chest X 2 ☐ Definitive confirmation: **monitor $ETCO_2$** number & waveform. Continue to monitor continuously.		
Troubleshooting ☐ *If breath sounds only on right, withdraw ETT slightly and listen again. ☐ *If incorrectly placed: remove ETT, attempt to reoxygenate 30 sec; assess to determine error and take corrective action.		
* **If tube placed correctly** ☐ *If no gastric sounds & breath sounds present and equal bilaterally**, inflate cuff** w/ up to 10 mL air to proper pressure (minimal leak) & remove syringe ☐ Secure ETT with commercial tube holder; immobilize head. May place 4X4 around tube to help absorb bleeding; do NOT cut gauze; fibers may enter trachea		
* **Reassess**: Frequently monitor SpO_2, $EtCO_2$, tube depth, VS, & lung sounds enroute to detect displacement, complications (esp. after pt movement), or condition change Monitor insertion site for complications		
Verbalize at least 2 early complications of the procedure: ☐ Prolonged execution ☐ Aspiration ☐ **Hemorrhage** ☐ **False placement** ☐ **SUBQ emphysema** ☐ Injury to neck structures ☐ Tube obstruction ☐ Asphyxia ☐ Dysrhythmias/arrest		
Document: Indication for procedure, size ETT placed, how correct placement was confirmed; ongoing assessment findings; any complications, your interventions, and the patient's response.		
Critical Criteria - Check if occurred during an attempt ☐ Failure to attempt ventilations within 30 sec after taking BSI precautions or interrupts ventilations for >30 sec any time ☐ Failure to take or verbalize body substance isolation precautions ☐ Failure to voice and ultimately provide high oxygen concentration [at least 85%] ☐ Failure to attempt to pre-oxygenate patient prior to beginning procedure ☐ Contaminates equipment or site without appropriately correcting situation ☐ Failure to insert airway device into trachea at a proper depth or location within 2 attempts ☐ Performs any improper technique resulting in potential for uncontrolled hemorrhage or in a manner dangerous to pt ☐ Failure to dispose blood-contaminated sharps immediately in proper container at point of use ☐ Failure to inflate ETT cuff properly and immediately remove the syringe ☐ Failure to secure the airway adequately ☐ Failure to confirm that patient is being ventilated properly (rate & volume) by auscultation bilaterally over lungs, over epigastrium, and confirming with capnography ☐ Failure to manage the patient as a competent practitioner ☐ Exhibits unacceptable affect with patient or other personnel ☐ Uses or orders a dangerous or inappropriate intervention		

Factually document below your rationale for checking any of the above critical criteria.

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Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

☐ **Competent:** All key steps independently performed with correct technique, sequence and timing. All starred (*) items explained/performed correctly with no critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 9/23

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Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

NEEDLE CRICOTHYROTOMY

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: An unconscious adult has massive facial trauma & extreme hypoxia. Prepare equipment and perform a needle cricothyrotomy.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
* BSI: Gloves, goggles, facemask		
Verbalize indications for the procedure: ☐ Cannot intubate ☐ Cannot insert a King or alternate airway ☐ Cannot ventilate w/ BVM or other means to maintain SpO2 > 90%		
* **List two disadvantages of the procedure – least effective lower airway** ☐ Does not allow for good elimination of CO_2 ☐ It is invasive ☐ Requires constant monitoring ☐ Does not protect airway from aspiration ☐ Does not allow for elimination of CO_2; so accumulates rapidly ☐ Ineffective tidal volume; especially if upper airways open at all ☐ Provides temporary relief (30-40 minutes) ☐ No suctioning of secretions		
Contraindications ☐ Inability to identify the anatomical landmarks necessary to perform the procedure. ☐ Controversy in very small children; false placement easy, excessive bleeding real risk		
Prepare the patient Position supine w/ padding under shoulders to extend neck unless contraindicated		
Assess VS, ECG, SpO_2 as soon as time & personnel permit		
*Attempt to **preoxygenate** for 3 min per ETI procedure		
Attempt manual maneuvers for opening upper airway; direct visualization with laryngoscope; may or may not attempt advanced airways based on patient situation		
***Concurrently: Prepare equipment – Have everything ready before beginning procedure** ☐ 10 g needle ☐ 20 mL syringe ☐ Stethoscope ☐ BSI ☐ 3 mL syringe barrel + 7.0 -7.5 ETT adaptor ☐ Peds BVM; O_2 source ☐ CHG/IPA skin prep ☐ Tape ☐ 4X4 ☐ Capnography; SpO_2, ECG monitors ☐ Suction ☐ Sharps container		
☐ Prepare equipment by inserting ETT adapter into barrel of 3 mL syringe (remove plunger) ☐ Remove hub from needle; attach 20 mL syringe to needle (acts like an EDD)		
Perform the procedure Palpate thyroid & cricoid cartilages; locate membrane; prep skin with CHG/IPA prep		
***Identify anatomical landmarks**: Palpate thyroid cartilage superiorly & cricoid cartilage inferiorly w/ thumb & middle finger. Locate cricothyroid membrane with index finger. If Rt handed, work from Rt side. If Lt handed, work from pt's left side.		
Prep skin with CHG/IPA as per an IV or IO		
*Insert needle through the membrane at a 90° angle to the skin through the midline of the membrane using firm downward pressure until a "popping" sensation is felt		
* When resistance abruptly ceases, stop advancing needle; aspirate air into syringe like an EDD to confirm tracheal placement. Should aspirate easily without resistance.		
* Angle needle tip downward (towards chest) and posteriorly at a 20-45° angle		
☐ *Hold needle stationary, advance ONLY catheter over the needle to its hub (like starting an IV in the trachea; needle acts like a guidewire preventing catheter kinking) ☐ *When catheter fully advanced, withdraw needle and place into a sharps container		
☐ *Attach 3 mL syringe barrel (with ETT adaptor attached) to hub of catheter. Apply capnography sensor to ETT adapter. Ventilate slowly /peds BVM at 10/BPM. Allow 4 sec exhalation for each 1 sec inhalation. Confirm exhaled CO_2.		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
▪ If upper airways are open: For each 1 second of inspiration allow 4 seconds for exhalation to prevent barotrauma. ▪ If the upper airways are entirely obstructed: Allow 8 seconds of exhalation for each 1 second of inhalation. ▪ May need to compress chest to assist exhalation		
☐ *Auscultate epigastrium, both midaxillary lines & anterior chest X 2 ☐ *Assess quantitative waveform capnography to confirm exhaled CO_2. ☐ If incorrectly placed: assess to determine error and take corrective action ☐ *If correctly placed, control bleeding prn & secure catheter in place using tape		
* **Reassess**: Frequently monitor SpO_2, $EtCO_2$, VS, & lung sounds enroute to detect displacement, complications or condition change; monitor insertion site for complications. **CO_2 accumulation can be dangerous in head injured patient.** Patients can be adequately oxygenated for 30 to 40 minutes using this technique. Because of inadequate exhalation, CO2 accumulates and limits the long-term use of this approach, especially in head-injured patients (ATLS). High flow O_2 (>15 L/min) may actually dislodge a foreign body in the airway, however, significant barotrauma may occur including pulmonary rupture with tension pneumothorax if exhalation is poor. Low flow rates (5 to 7 L/min) should be used when total glottic obstruction is present (ATLS).		
Complications ☐ High pressure during ventilation and air entrapment may produce pneumothorax ☐ Hemorrhage at the insertion site. ☐ Thyroid gland & esophagus can be perforated if needle is inserted inappropriately and/or advanced too far ☐ Subcutaneous emphysema		
Critical Criteria - Check if occurred during an attempt ☐ Failure to attempt ventilations within 30 seconds after taking BSI precautions or interrupts ventilations for >30 seconds at any time ☐ Failure to take or verbalize body substance isolation precautions ☐ Failure to voice and ultimately provide high oxygen concentration [at least 85%] ☐ Failure to attempt to pre-oxygenate patient prior to beginning procedure ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Failure to insert the airway device into the trachea at a proper depth or location within 2 attempts ☐ Performs any improper technique resulting in potential for uncontrolled hemorrhage or in a manner dangerous to the patient ☐ Failure to dispose/verbalize disposal of blood-contaminated sharps immediately in proper container at the point of use ☐ Failure to secure the airway adequately ☐ Failure to confirm that patient is being ventilated properly (proper insertion depth, rate and volume) by auscultation bilaterally over lungs and over epigastrium ☐ Failure to manage the patient as a competent practitioner ☐ Exhibits unacceptable affect with patient or other personnel ☐ Uses or orders a dangerous or inappropriate intervention		

Factually document below your rationale for checking any of the above critical criteria.

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Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

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☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 9/23

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Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

ADMINISTERING OXYGEN from a PORTABLE DELIVERY SYSTEM

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult is hypoxic. You are asked to assemble the equipment and prepare an oxygen tank for use.
Equipment needed: Portable oxygen tank, pressure regulator, and wrench (if needed)

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
☐ Maintain oxygen tank stable away from heat ☐ *Place cylinder in an upright position if using a ball gauge		
Position self to face gauge when the regulator is attached		
Remove the protective cover from the cylinder valve		
Attach cylinder wrench to the valve		
* With spout pointing away from you, "crack" the tank by turning the wrench counterclockwise to open the valve slightly until the escape of O_2 is heard		
* When oxygen escape is heard, turn the wrench clockwise to rapidly shut off the O_2. This cleans valve of any debris.		
* Inspect regulator to assure that it is the right type and the washer is present and intact (intact gasket/any damage)		
* Apply pressure regulator to O_2 cylinder; secure tightly		
* Open valve on top of cylinder until the pressure gauge stops moving to check O_2 pressure in tank. Should be above 500 psi.		
* Open regulator valve to the desired flow rate in liters/minute		
* To D/C O_2: turn flow regulator until the flowmeter needle falls to zero		
Shut off main cylinder valve		
Bleed valves by opening the regulator valve and leaving it open until needle or ball indicator returns to zero flow		
Shut off the control valve		

Comments: _____

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Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

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☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 12/16

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Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

NASAL CANNULA

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult is in mild respiratory distress. You are asked to assemble the equipment and administer oxygen using a nasal cannula.

Equipment needed: Airway manikin; nasal cannula, portable oxygen tank; BSI

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Verbalize two indications for a NC ☐ Patent nasal airway with adequate RR, depth, and effort; mild hypoxia who needs min. FiO_2 ☐ Patient claustrophobic when using an O_2 face mask ☐ To provide extra FiO_2 during albuterol/ipratropium neb Rx by HHN ☐ To provide continuous oxygenation during advanced (ADV) airway attempts ☐ Facial anomaly prevents adequate seal with an O_2 mask ☐ Patients who are vomiting		
* Apply BSI (gloves)		
*** Prepare equipment:** Open appropriate size NC (adult or peds); unwind tubing; connect to O_2 source		
* Adjust O_2 flow rate based on pt. need & SpO_2 (1-6 L; 15 L/$EtCO_2$ NC during ADV airway placement)		
Prepare patient: ☐ Explain procedure to patient; instruct them to breathe through the nose ☐ Observe RR, ventilatory depth & effort; obtain SpO_2 on room air to confirm indication for NC vs. another O_2 delivery device		
Procedure: * Insert nasal prongs into patient's nostrils, oriented upward and posteriorly toward nasopharynx		
* Adjust catheter so each side loops over the ears comfortably. Slide plastic ring up under the chin to secure tubing | may need to secure tubing to face with paper tape (small children)		
* Assess patient for discomfort and response to O_2 therapy; adjust liter flow prn		
Verbalize 1 precaution if cannula is used > 2 hours (drying of mucosa)		

Comments: _____

_____

Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

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☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 12/23

_____

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

NON-REBREATHER MASK

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult with spontaneous ventilations is c/o dyspnea with a room air pulse ox reading of 90%. You are asked to assemble the equipment and administer oxygen via a non-rebreather mask.

Equipment needed: Airway manikin; adult & peds non-rebreather masks, portable oxygen tank; BSI

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
☐ Determine the need for supplemental oxygen. **Verbalize two examples of patients who require a NRM** ☐ Spontaneously breathing pt. with moderate to severe hypoxia (SpO_2 < 92%); good ventilatory effort ☐ Prior to DAI in spontaneously breathing patient with good ventilatory effort ☐ Apneic oxygenation during early phases of cardiac arrest management ☐ Carbon monoxide or other toxic inhalation injuries ☐ May be used to deliver nebulized medication by removing reservoir bag and inserting nebulizer acorn		
***Prepare patient** ☐ Position patient for maximum ventilatory capacity ☐ Obtain room air SpO_2		
Assemble and prepare equipment * Apply BSI: gloves		
* Select proper size mask (Prepare adult size) and O_2 source Open mask and fully uncoil the bag and tubing.		
* Connect the female adaptor of the mask to the flow meter of the O_2 source		
* Open tank or turn on O_2 and set liter flow at 12 -15 L/min		
* Check that one-way exhaust valve is in place on at least one side of mask and is undamaged		
* Fully inflate non-rebreather bag by pressing down on one-way inlet diaphragm inside of mask between mask and reservoir.		
Perform procedure * Apply mask apex over bridge of nose and base just below the lower lip to minimize air leaks.		
* Adjust elastic strap around head above ears.		
If metal strip across the mask nose, squeeze slightly to form the mask		
* Adjust O_2 at 12-15 L/minute so bag remains partially inflated during peak inspiration (never < 2/3rd full. and completely refills prior to next inspiration)		
Verbalize steps if reservoir bag collapses on inhalation. (Increase L flow)		
Verbalize complication if O_2 source is removed (pt. receives inadequate O_2)		

Rating: (Select 1)

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CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

Ventilation with a BAG and MASK (BVM) Device

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult or child appears unconscious with inadequate breathing. You are asked to assemble the equipment and provide positive pressure ventilations (PPV) with a bag and mask.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
* Apply PPE: gloves, medical grade face mask, eye protection		
***State indications** To provide PPV to pts with inadequate breathing; actual or impending hypoxic and/or hypercarbic resp. failure: Apnea, ineffective RR, depth, or effort for age/size; SpO_2 ≤90%; $EtCO_2$ ≥50		
State contraindications ☐ Do not use a resuscitator in a toxic or hazardous atmosphere ☐ Oil or grease should not be used in close proximity to oxygen equipment ☐ O_2 use contraindicated if patient is smoking or near an open flame; fire may result		
Precautions: Never store the resuscitator in a deformed state other than as folded by the manufacturer; permanent distortion of the bag will occur that may reduce the ventilation efficiency		
Prepare needed equipment/supplies ☐ Single pt use volume limited (450-650mL for an adult) self-inflating bag connected to a non-breather expiratory valve, face mask, pop-off pressure limiting valve (generally set to open at 40 cm H_2O), reservoir tubing or bag, and O_2 inlet and tubing (appropriate for pt size) ☐ Ability to measure RR (timing device), tidal volume and peak pressures optional but preferred A pressure gauge can be connected to the manometer port. Cap if pressure is not monitored. ☐ Positive end expiratory pressure (PEEP) valve preferred if needed to achieve desired SpO_2 ☐ High efficiency particulate air filter (HEPA) device incorporated into BVM or add on ☐ OPA and NPA | tongue blade | water-soluble lubricant | Tegaderm dressing (beard) ☐ Monitors: BP; SpO_2; $EtCO_2$ (incorporated into BVM or NC sensor) | Oxygen source ☐ Suction device + flexible and rigid (Ducanto) suction catheters (appropriate for pt size)		
Select correct size **Mask:** A contoured mask should fit completely over the pt's nose and mouth (not eyes) and conform to the face creating a good seal without air leaks. Size mask so apex seats over the bridge of the nose, covers the 2 malar eminences (most prominent portion of cheekbone), and the base extends below the lower lip and seats in the cleft of the chin (mandibular alveolar ridge). (Volumes delivered are manufacturer specific – these reflect AMBU Spur II)) **Bag:** **Adult:** Adults and children — body wt > 30 kg (66 lbs +) — 600 mL (one hand squeeze) **Pediatric:** Infants & children — body wt up to 30 kg (66 lbs) — 450 mL **Infant:** Neonates and infant — body wt up to 10 kg (22 lbs) — 150 mL		
☐ *Remove bag from packaging; inspect to ensure that no parts are damaged/contaminated; fit desired face mask; ensure tight connections and perform a rapid functional test prior to use (squeeze bag several times) ☐ *Connect bag to oxygen source | Fully extend O_2 reservoir tube per manufacturer's directions | Do not pull on reservoir bag | Supply a gas flow of 15 L/min to the bag. Check that the reservoir fills. If not, check the integrity of the two valve shutters or for a torn reservoir.		
Assess patient to the extent possible given constraints of time and cooperation to determine **if they may be difficult to ventilate:** MOANS": mask seal, obesity, age (elderly), no teeth, stiffness | "BONES": beard, obese, no teeth, elderly, sleep apnea/snoring		
* **Prepare patient** | **Establish a patent airway:** Clear oropharynx of obstructions: tongue, secretions, FB ☐ Place supine or head elevated up to 45°per local protocol and in sniffing position unless contraindicated | may need to pad under shoulders/torso in small children ☐ Open airway w/ appropriate manual maneuvers: head tilt/chin lift, jaw thrust ☐ Suction as needed | Perform foreign body airway obstruction maneuvers prn ☐ Check for gag reflex by performing glabellar tap or lash reflex No gag: Insert OPA Gag present: Insert NPA unless contraindicated		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Troubleshooting steps to create an adequate mask seal ☐ Cover beards with Tegaderm IV dressing or soluble gel to enhance mask seal ☐ Leave dentures in mouth if applicable and not contraindicated ☐ Verbalize 2 additional causes of inadequate mask seal: large tongue & jaw; protruding teeth; facial burns; trauma; facial dressings		
One-person technique: NOT preferred ☐ *Position rescuer at the patient's head. Apply mask apex over bridge of the nose then seat base in cleft of chin. Do not cover eyes or occlude nostrils. ☐ **"E-C" hold**: Place thumb over mask apex. Place index finger over lower mask cushion ("C") ☐ Use the 3rd, 4th, and 5th fingers to **lift the jaw up into the mask** ("E"). This may vary slightly based on the size of rescuer's hands and mandible mobility. Do not press mask downward onto the face. If a good seal cannot be achieved with an open airway – go to two-person technique		
2-person technique (preferred): One person holds mask in place; 2nd person squeezes bag 1st rescuer places the thenar eminences of both palms (base of the thumbs) along each lateral edge of the mask. Seat the mask onto the face as above and place the other 4 fingers under the mandible on each side. Hold the mask to the face with the thenar eminences while pulling the mandible upward into the mask with the fingers.		
Ventilate effectively ☐ **Squeeze bag**: Slide hand under the support strap if present; use thumb + 1st & 2nd fingers to deliver V_T 6 to 8 mL/kg / just enough volume to **see chest rise** (adult: 400-600 mL) ☐ Ventilate over 1 sec **Adults**: 10 BPM (every 6 seconds); asthma/COPD: 6-8 BPM **Peds**: 1 breath q. 3 -5 sec (20-30 BPM) **Peak inspiratory pressures**: 15–20 cmH_2O ☐ Feel for lung compliance (resistance to distension) w/ each squeeze of the bag; ☐ Adequate breath sounds should be heard over all lung fields; particular midaxillary ☐ **MonitorSpO_2**: If < target for pt age/condition despite 100% O_2, attach a PEEP valve set at 5 and increase prn not to exceed 10 cm H_2O. Benefit: increases alveolar recruitment due to atelectasis Do not use if hypotensive (MAP <60) or pre-load dependent. ☐ Monitor adequacy of ventilations: Waveform capnography ($EtCO_2$) range 35-45		
* Between breaths: Release pressure on bag abruptly; let pt passively exhale and bag refill from O_2 source & reservoir (listen for the expiratory flow from the patient valve and observe chest lowering)		
In spontaneously breathing patients: coordinate 'assist' positive pressure ventilations with patient's spontaneous efforts to ensure that inspiratory valve is opening to provide O_2 instead of room air		
Troubleshooting ☐ **Persistent resistance/can't ventilate:** Reposition head & jaw, suspect & Rx obstruction; consider other causes (tension pneumothorax) ☐ **Ventilates but no chest rise**: ✓ mask seal, open pneumo (?), ✓ airway misplacement (esophagus) ☐ If patient vomits: immediately suction/clear the airway; freely compress the bag a few times with mask off pt's face before resuming ventilation. Clean mask and splash guard with water prn.		
State complications of the procedure: ☐ Hyper or hypoventilation (improper tidal volumes/RR for age); hyper/hypoxia | hyper/hypocarbia ☐ Impaired airway/poor mask seal especially with one-person technique | Aspiration ☐ Gastric distension | volutrauma/barotrauma to lungs (pneumothorax, tension pneumothorax) ☐ Exhaled secretions/moisture can cause exhalation valve dysfunction and resistance to expiration ☐ Equipment failure due to incorrect assembly ☐ Performed in a way that could cause harm to a pt or is inconsistent with competent care ☐ Exhibited unacceptable affect with patient or other personnel		

Rating: (Select 1)

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CJM 9/23

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

CONTINOUS-POSITIVE AIRWAY PRESSURE (CPAP-FlowSafe II EZ)

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: An adult presents with severe dyspnea & ↑ work of breathing. Assess for indications & contraindications; apply C-PAP if indicated.
Equipment needed: Airway manikin or simulated patient; C-PAP mask, O_2 tank; BSI, drug bag

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
☐ **Assess for general indications**: ≥18 yrs; alert, can consent, understand & cooperate | intact airway, can clear secretions, good ventilatory effort | MAP ≥ 60 | Significant distress / Needs non-invasive positive pressure ventilation (NIPPV) but NO immediate ADV airway ☐ DNR/POLST order (advanced disease/terminal illnesses) declining advanced airway ☐ Elderly if O_2 via NC or NRM is ineffective | ☐ Severely obese w/ hypoxia/hypercarbia ☐ Preoxygenation prior to DAI | ☐ Post-extubation rescue/ ☐ COPD, asthma | ☐ Acute bronchitis or pneumonia ☐ HF/pulmonary edema | ☐ Post-submersion congestion / ↑ WOB ☐ Inhalation injury/burn (good mask seal) | ☐ Toxic inhalation (chlorine) ☐ High SCI with diaphragmatic weakness | ☐ Blunt chest wall trauma (flail chest w/o pneumo)		
Absolute Contraindications: ☐ <18 yrs | ☐ Actual/imminent Cardiac/resp. arrest, coma ☐ MAP < 60 | ☐ Unstable respiratory drive; **ventilatory failure** ☐ **AMS**; aspiration risk; inability to clear secretions; questionable ability to protect airway ☐ **Need for immediate ADV airway** **|** ☐ Need PPV with a **BVM** ☐ Gastric distention; impaired swallowing, persistent vomiting, active upper GI bleeding; possible esophageal rupture ☐ Recent upper airway or esophageal surgery ☐ Possible increased ICP: Evidenced by decreased LOC; HTN; abnormal pupils ☐ Facial abnormalities/trauma that would complicate mask seal (facial burns) and result in a significant air leak, epistaxis ☐ Compromise of thoracic organs (penetrating chest trauma, pneumothorax)		
Relative contraindications (consider on case by case basis –start CPAP and carefully monitor) ☐ Anaphylaxis meeting MAP criteria ☐ Uncooperative pt or those unable to tolerate mask (extreme anxiety, claustrophobia, or pain)		
IMC ☐ *Assess SpO_2 on RA & ETCO2 number & waveform | ☐ Place on ECG monitor		
If possible ACS: Obtain rapid 12 L ECG within 5 minutes of pt contact (✓ for dysrhythmia & ischemia)		
Prepare patient *Position stretcher at 45° or higher unless contraindicated		
*Inform pt what you are doing; explain purpose/benefits of CPAP and what it will feel like		
Begin Rx of underlying condition per SOP (IV access and appropriate meds (unless contraindicated)		
Prepare ADV airway equipment **if severe distress**		
Prepare C-PAP equipment Open FlowSafe I EZ disposable CPAP system with integrated nebulizer | Select appropriate mask size using sizing chart – large adult, small adult | Connect oxygen tubing to flowmeter or regulator		
Nebulizer in OFF position. CPAP pressure will decrease when nebulizer is activated and increase when neb is deactivated. Verify CPAP pressure with manometer and adjust flow as needed. Manometer will not register until placed on pt. **Flow (LPM) / CPAP if neb OFF / CPAP if neb ON** 6-8 / 2.0 - 3.0 / 1.0 - 2.0 10 / 6.0 - 7.0 / 2.0 - 3.0 12 / 8.0 - 9.0 / 3.0 - 4.0 15 / 11.0 - 12.00 / 4.0 - 5.0		
Mask application: ☐ Hold mask firmly on pt's face w/ O_2 running or allow them to hold mask to face without straps. ☐ Allow pt time to adjust to mask | Reassure, coach & explain the process		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
☐ Slowly increase O_2 to 6-8 L ☐ Check face mask fit and connections for leak: focus on maintaining a continuous mask seal to maximizing positive impact of PEEP | Avoid breaking the circuit or removing the mask whenever possible | Significant atelectasis will occur which will take time to revers ☐ Adjust flowmeter until desired pressure is obtained. Flow of 12-14 LPM is required to reach CPAP pressures of 8.5-10 cm H_2O. Do not exceed this level unless instructed to do so by OLMC.		
Adjust 4 head straps using Velcro tabs; squeeze forehead adjustment tabs to seat mask on bridge of nose		
***Reassess after three minutes** ☐ Patient tolerance, comfort, mental status; feeling of distress, use of accessory muscles, ability to talk ☐ Respiratory rate/depth; effort & lung sounds ☐ SpO_2; capnography ☐ BP (✓ for hypotension); P; ECG rhythm ☐ Gastric distention or vomiting ☐ Continuously monitor patient for signs indicating need to D/C C-PAP &/or intubate. If DAI needed, explain why and note time of intubation.		
***** If SBP drops to hypotensive levels for pt: Titrate PEEP down to 5 cm; remove if MAP <60 persists		
Attempt mask application for 10 min before conceding C-PAP failure ☐ If SBP ≥ 90 (MAP ≥ 65) and pt. very anxious**:** Consider midazolam in **2 mg increments** q. 2 min **IVP** (0.2 mg/kg IN) **up to a total dose of 10 mg IVP/IN/IM** ☐ If pt. needs frequent coaching, consider need for 3rd rescuer enroute		
***CPAP with NEB**: Only 1 source of O_2 is needed – neb built into unit ☐ Place medication in nebulizer cup/bowl ☐ Turn nebulizer switch to on (green) (OFF is RED) ☐ Adjust O_2 flow to maintain desired pressure to maintain needed PEEP Turning switch to green will reduce pressure requiring an increase in gas flow (up to 25 LPM) to maintain original pressure | Manometer accuracy ± 3 cm H_2O up to 15 LPM; and ± 5 cm H_2O @ 25 LPM		
CPAP Complications: ☐ *High pulmonary pressures can decrease preload to Rt heart → decrease cardiac output (↓**MAP**) ☐ *High airway pressures can over distend alveoli resulting in barotrauma and **pneumothorax** ☐ Positive pressure may ↑ secretions or dry upper airways; difficulty clearing respiratory secretions ☐ Gastric distension/vomiting rare with PEEP < 15 cm H_2O. Use caution in aerophagia sensitive patients (following gastric stapling or upper GI surgery) | Aspiration with v. high L flow & gastric distention ☐ If a possible cause of ↑ ICP is present; may need to watch pt. carefully ☐ Eye irritation ☐ Sinus congestion/pain ☐ Facial skin necrosis at mask contact site (long-term)		
Criteria to DC CPAP in field ☐ Inability to tolerate mask due to discomfort, pain, or claustrophobia ☐ Need for ADV airway to manage secretions, protect the airway, or ventilate patient ☐ Hemodynamic instability: MAP <60 at lowest levels of PEEP ☐ ECG instability with evidence of clinically significant ventricular dysrhythmias		
Document: indications for CPAP, SpO_2, $ETCO_2$ number & waveform, VS, lung sounds before & after CPAP; PEEP levels, FiO_2, pt response/adverse reactions, tolerance		
Critical error criteria - Check if occurred during an attempt ☐ Failure to take appropriate body substance isolation precautions ☐ Failure to provide appropriate oxygen therapy and/or adequate ventilations ☐ Performs in a way that could cause harm to a pt or is inconsistent with competent care ☐ Exhibits unacceptable affect with patient or other personnel		

Rating: (Select 1)

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CJM 12/22

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

PULSE OXIMETRY

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult presents with shortness of breath. Prepare the equipment and apply a pulse oximeter monitor.
Equipment needed: ECG monitor or free standing SpO_2 monitor; peripheral and central sensors

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Verbalize indications for the procedure: *To non-invasively monitor O_2 saturation in pts who are at risk for hypoxemia		
Prepare the patient Explain procedure to patient and what it is meant to measure.		
Prepare equipment *Select appropriate sensor for pt size, age, & condition (peripheral vs. central)		
Perform procedure *Choose appropriate sensor site: clean, well perfused, comfortable, age-appropriate ☐ Newborn - right upper extremity (wrist or medial aspect of palm) ☐ Infants - toe or lateral aspect mid foot ☐ Pediatrics - toe or finger ☐ Adults - fingers, toes, ear lobes, or bridge of nose		
*Remove metallic/black nail polish or turn sensor to lateral to lateral aspect of finger. Clean site if contaminated w/ blood/dirt.		
*Apply sensor so optical components are aligned. Attach sensor cable to monitor.		
*Turn unit on		
*Observe for pulse bar to begin sensing and fluctuating up and down or waveform/ number to appear.		
*Correlate palpated to sensed pulse. HR on ECG monitor should correlate to HR on the oximeter & palpable peripheral pulse. If there is a discrepancy or pulse deficit check the monitor and the patient.		
*Interpret reading in light of pt's age; complaint & PMH. State expected readings.		
Explain why an SpO2 < 90% is dangerous to pt.: (RBCs have impaired ability to carry oxygen)		
If hypoxic: Apply appropriate O_2 delivery device and FiO_2		
*Trend pulse ox reading after oxygen delivery		
***Give one example when a pulse ox reading may be unreliable** ☐ Cold/hypoperfused extremities ☐ Motion ☐ Edema ☐ Light ☐ Nail polish ☐ Venous pulsations ☐ Dyshemoglobins like CO, anemia ☐ ↓ BP		
Set/check the appropriate alarms		
Critical Criteria: Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Performs any improper technique resulting in the potential for patient harm ☐ Exhibits unacceptable affect with patient or other personnel		

Rating: (Select 1)

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CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

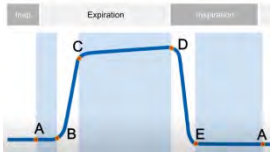
CAPNOGRAPHY

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

A pt presents with AMS (GCS 13) and spontaneous ventilations. Prepare equipment and monitor their $EtCO_2$.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
* **State uses for digital waveform capnography** ☐ Trend adequacy of ventilation/perfusion/metabolism ☐ Confirm tracheal position of ETT ☐ Detect tracheal placement of NG tube ☐ Recognize actual/potential acidosis ☐ Guide careful elimination of CO2 in TBI ☐ Assess effectiveness of CPR ☐ Predict successful defibrillation/detect ROSC ☐ Differentiate between asthma/COPD and HF; detect breath stacking with air trapping ☐ Recognition of respiratory depression / hypoventilation & hyperventilation ☐ Detect; changes in pulmonary dead space (pulmonary embolism) ☐ Detect bronchoconstriction /delayed alveolar emptying)		
Assemble and Prepare equipment for EMS use ☐ ECG monitor ☐ Oxygen source ☐ Oridion Microstream Smart CapnoLine Plus O_2 - Adult / Intermediate or pediatric Oral/nasal sampling set or Oridion Microstream FilterLine $ETCO_2$ Sampling Line (assisted ventilations) ☐ Before attaching the CapnoLine to the monitor, verify that the line is clean, dry and undamaged ☐ *Attach CapnoLine to monitor; turn fitting clockwise to tighten | Attach O_2 to line at 5 L | Turn on monitor		
Prepare patient and perform procedure ☐ Explain procedure to pt; instruct them to breathe normally if awake; ask if they have any questions ☐ *Place NC on pt; adjust tubing comfortably around ears; or place inline sensor on ETT or i-Gel		
☐ Press quick access key (monitor-specific) to view numeric reading & waveform ☐ *Correctly identify the 4 phases of a normal waveform | ☐ *State normal reading: 35-45 mmHg ☐ Set upper and/or lower/non-breathe alarms and sweep speed per monitor instructions		
☐ State expected reading if patient in shock w/ poor perfusion (< 31) ☐ State expected reading if patient is hyper or hypoventilating (<35 | >45) ☐ State expected change in waveform if intubated pt is attempting to breathe (curare cleft) ☐ State expected change in waveform if pt has bronchoconstriction (sharkfin) ☐ State expected reading with ROSC after cardiac arrest (spike in reading) ☐ State expected reading in pulmonary embolism-related shock: (<25, square waveform)		
*Document capnography numeric value & waveform shape in ePCR Attach printed EtCO2 tracing to original printed copy of PCR (left at hospital) if print copies used		
Critical Criteria: Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Performs any improper technique resulting in the potential for patient harm ☐ Exhibits unacceptable affect with patient or other personnel		

Rating: (Select 1)



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CJM 2/24

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

APPLICATION OF ECG ELECTRODES

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult is complaining of chest pain. You are asked to assemble the equipment, apply electrodes to the patient's chest and monitor the ECG.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Needed equipment: ☐ ECG monitor with limb lead cable ☐ ECG electrodes ☐ Dry washcloth or towel ☐ Alcohol wipes ☐ Hair clippers		
Prepare patient Explain procedure to patient. Ask if they have any questions.		
Remove clothing from the patient's chest. Maintain pt. modesty whenever possible.		
*__Prep skin__ where electrodes are to be placed: Application sites must be clean, dry, and free of any body lotions, oil, dirt, sweat, blood, or old skin cells to minimize artifact. Rub skin briskly with a dry towel or gauze. Clean with alcohol wipe if electrode adhesion is an issue. Allow skin to dry prior to skin abrasion. Remove excess hair by clipping. Option: "part & spread" hair to allow for skin prep and electrode placement.		
Assemble and Prepare equipment ☐ Inspect electrodes for acceptable use. They should be fresh and stored in an airtight package to preserve gel moisture and minimize artifact. They remain fresh for 45 days out of the bag. ☐ Untangle lead wires; Connect snap style leadwire to electrode prior to placing on patient.		
Perform procedure * Remove the electrode protective liner, exposing the adhesive outer circle and the gel core. **Make sure gel is moist** and in the middle of the electrode.		
Apply electrodes: * Apply each limb lead electrode to patient's skin without gaps, wrinkles, or folds to appropriate locations (limbs, NOT chest) for RA, LA, RL and LL. Avoid placing electrodes over sites in fatty areas or over major muscles, large breasts, or bony prominences. Avoid pressing on electrode stud when placing on the patient. Firmly rub your finger around the outside of the front label to activate the pressure sensitive adhesive to improve electrode adhesion.		
* Turn ECG monitor on and assess tracing quality. Select appropriate monitoring lead; adjust gain prn.		
Appropriately trouble shoot abnormalities in ECG signal ☐ Loose lead ☐ 60 cycle interference ☐ Patient movement ☐ Low amplitude tracing ☐ Artifact ☐ Dry electrodes		
Critical Criteria - Check if occurred during an attempt ☐ Failure to differentiate pt's need for immediate transport vs assessment and Rx at the scene ☐ Performs any improper technique resulting in potential for patient harm ☐ Exhibits unacceptable affect with patient or other personnel ☐ Uses or orders a dangerous or inappropriate intervention		

Factually document below your rationale for checking any of the above critical criteria.

_____

Rating: (Select 1)

☐ **Proficient**: Skillful and efficient; performed all steps independently in full conformity with practice standards for competency, could rapidly problem solve and integrate history, exam findings, and perform multiple tasks concurrently with contextual and adaptive competence while forming appropriate EMS impressions without assistance or instruction.

☐ **Competent:** All key steps independently performed with correct technique, sequence and timing. All starred (*) items explained/performed correctly with no critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform with correct technique, sequence, or timing; required frequent coaching or reference to procedure manual | made critical errors | recommend additional practice

CJM 2/24

_____

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

12- LEAD ECG

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: An adult is complaining of chest pain. You are asked to assemble the equipment, apply electrodes to the patient and obtain a 12 L ECG.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
*__Identify indications for 12-L ECG adult:__ ☐ Chest pain or discomfort nose to navel (including abdominal pain); front and back ☐ SOB: resp. distress (esp. exertional dyspnea) ☐ Dizziness/syncope or near syncope ☐ Palpitations ☐ Unexplained nausea/indigestion/vomiting ☐ Feeling of impending doom ☐ HF ☐ Diaphoresis unexplained by ambient temperature ☐ AMS ☐ Weak/tired/fatigued ☐ Suspected DKA ☐ Risk factors: MI/HF, age, cholesterol high, diabetes, HTN, smoking ☐ ECG rhythm: dysrhythmia, ectopy, identify pacer, QT; QRS width determination (VT vs. SVT) ☐ Impressions: ACS, dysrhythmia, pericarditis, myocarditis, PE, COPD, stroke **Indications in a child:** ☐ Diagnosis and management of congenital heart disease and/or dysrhythmia ☐ Diagnosis and mgt of rheumatic fever, Kawasaki's disease, pericarditis, myocarditis ☐ Syncope, seizures ☐ Cyanotic episodes ☐ BRUE ☐ Chest pain or other symptoms related to exertion ☐ Electrolyte abnormalities ☐ Family Hx of sudden death or life-threatening event ☐ Drug ingestion		
***Timing of 12 L - Verbalize**: Acquire within 5 min of pt contact - where found & prior to NTG (can change tracing)		
Equipment needed ☐ ECG monitor ☐ Limb lead and precordial lead cables ☐ Electrodes ☐ Skin prep		
Assemble and Prepare equipment ☐ Inspect electrodes for acceptable use. Store in an airtight package to preserve gel moisture and minimize artifact. They remain fresh for 45 days out of the bag. ☐ Untangle lead wires ☐ Connect snap style leadwire to electrodes prior to placing on patient.		
Prepare the patient ☐ Explain procedure to patient; ask if they have any questions ☐ Position pt. with pillow under head for comfort. If pt. unable to lay supine (acute dyspnea), elevate head to degree that minimizes S&S. Document on 12-L tracing "pt sitting up" as position can affect interpretation		
Preserve patient modesty as much as possible by clearing area of unnecessary people, remove only that clothing needed to expose chest and limb areas where electrodes are to be placed, and cover chest with towel/blanket		
Perform procedure		
*Prep skin where electrodes are to be placed per application of ECG electrode procedure. Application sites must be clean, dry, and free of any body lotions, oil, dirt, sweat, blood, or old skin cells for good interface and to minimize artifact.		
Correct electrode placement and interface: Avoid pressing on electrode stud when placing on the patient. ☐ Place limb leads (white - RA, black - LA, green - RL, red - LL) on limbs (not torso).		
Identify landmarks for chest leads ☐ Apply V1 in 4th ICS just to right of sternum ☐ Apply V2 in 4th ICS just to left of sternum		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
In women, ask pt. to hold left breast up with left hand while applying chest electrodes. (Preserves pt modesty while allowing EMT/PM to use both hands to remove electrode backing and apply electrode. If pt. unable to do this, use back of hand to lift breast tissue out of way.		
* Apply V4 electrode 5th ICS, midclavicular line (avoid common error of too low placement) In women, this electrode should be placed on chest wall, immediately under breast tissue		
* Apply V3 electrode half-way between V2 and V4 electrodes		
* Apply V5 electrode in 5th ICS, horizontal with V4 electrode, in anterior axillary line		
* Apply V6 electrode in 5th ICS, horizontal with V4 & V5 electrodes in mid-axillary line (avoid common error of too anterior placement of this electrode)		
* Attach 12-L cable to main electrode cable (attaching cable prior to this may cause device to beep signaling "leads off")		
☐ Turn on ECG monitor; observe rhythm from Lead II (not 12-L interpretation)		
* **Set age & gender of patient** on 12-L device (age/gender will affect interpretation)		
* Ensure that pt's arms and legs are fully supported & relaxed		
* Ask pt to remain still while device acquires ECG, takes ~10-15 sec (generally NOT recommended to instruct pt to hold breath as this often causes pt. to take a deep breath tensing chest muscles causing artifact)		
* Push "acquire" button on device ⎪ Once device states "acquisition complete," "analyzing data" can instruct pt that it is OK to move		
* Print 12-L, ensure at least 1 clear, without artifact, P-QRS-T in each lead. Write pt's name on tracing		
* If artifact: remove/discard bad electrode, re-prep skin, apply new electrode, acquire new tracing		
* **If 12-L interpretation states "Acute MI Suspected,"** notify OLMC of a "*Cardiac Alert - STEMI patient*" ASAP (while on-scene, prior to transport) so cardiac cath lab can be alerted prior to arrival		
Identifies ECG criteria for STEMI (MILIS) – any of these in the presence of CP or anginal equivalent ☐ New of presumably new Q waves (at least 30 ms wide & 0.20 mV deep) in at least two leads from any of the following (a) leads II, III, aVF; (b) leads V1 through V6; or (c) leads I and aVL; ☐ New or presumably new ST-T segment elevation or depression (~0.10 mV MEASURED 0.02 s after the J point in two contiguous leads of the previously mentioned lead combination); or ☐ A complete left BBB in the appropriate clinical setting (Hurst's, The Heart 11th Ed, p. 1283)		
* Ask if 12 L ECG can be used to rule out an MI? Answer NO: "*⅓ of pts with AMI have a "normal ECG" initially; it takes time for changes to occur; not all heart locations are seen on 12-L*" **Repeat 12L ECG** every 10 min if ongoing pain/symptoms.		
* What does "*Age-undetermined infarction" generally mean? An old, not acute, MI*		
*When contacting OLMC, read 12-L interpretative statement verbatim; do not summarize.		
Transmit 12 L per monitor-specific guidelines to receiving hospital.		
* **Upon arrival at hospital,** especially if abnormal 12-L - hand tracing directly to MD (preferably), or RN while giving report; do not leave 12-L on a counter		
* **Document 12-L interpretative statement** in comments section of PCR by printing 2 copies of the 12-L or making a copy upon ED arrival. Do not keep only copy of 12-L with you while charting PCR.		
* Document time 12-L acquired in PCR where ECG rhythm is documented. Chose most applicable of 3 categories: "Normal ECG," "Abnormal ECG," or "Acute MI suspected"		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

NWC EMSS Skill Performance Record

TRANSCUTANEOUS PACING

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

An adult presents with chest pain following a syncopal episode. The patient weak and is c/o lightheadedness and feels like they may faint again.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Prepare/assess patient * Confirm the need for pacing: If drugs ineffective or contraindicated; no IV/IO, or impending hemodynamic collapse while prepping meds Contraindicated in severe hypothermia		
Initiate Initial Medical Care		
* Explain procedure to patient if conscious and oriented. Warn that procedure may be uncomfortable, muscles will twitch, and medication is available.		
* Remove all clothing from patient's chest; preserve modesty whenever possible		
* Skin prep: Remove all nitro patches, briskly wipe skin with a dry towel or gauze		
Prepare equipment ☐ Do NOT use electrodes if they have been removed from the foil package for more than 24 hours. ✓ electrodes for expiration date. ☐ Connect pace/defib cable to pace/defib electrodes by aligning arrows on connectors and pressing firmly. ☐ Slowly peel back protective liner on electrodes beginning with cable connection end. ☐ Inspect electrodes to make sure gel is moist, undamaged, and in the middle of the electrode. Do not use pads that are dried out or damaged as this may cause electrical arcing and patient skin burns. ☐ Avoid spilling any fluids on the adapters, cables, connectors, or electrodes. ☐ Do not clean the electrodes or their permanently attached electrode cable with alcohol Note: One electrode set can be used for up to 50 shocks at any energy setting. They can withstand a continuous pacing current for 12 hrs and can remain on pt for 24 hours.		
* **Apply pacing pads** either anterior-posterior (preferred) or anterior-lateral ☐ **Anterior-posterior**: Place negative electrode on left anterior chest halfway between xiphoid process and left nipple line (See drawing next page). ☐ Place positive electrode on left posterior chest below scapula, lateral to spine. ☐ **Anterior-lateral**: Place the anterior electrode (black electrode) without wrinkles or gaps on the patient's right upper torso, lateral to the sternum and below the clavicle. ☐ Place the lateral (♥) red electrode without wrinkles or gaps under and lateral to the patient's left nipple in the midaxillary line, with the center of the electrode in the midaxillary line. ☐ Avoid placing pads over bony prominences (sternum/scapula) or breasts. ☐ Smooth electrode center and edges onto patient's chest to eliminate air pockets between gel surface and skin. Firmly press all adhesive edges to skin.		
* Select leads I, II, or III. Cannot pace if lead select switch is on paddles.		
* Connect limb lead ECG electrodes to the patient cable and apply to patient. Allow at least 2-3 cm between monitoring and pacing electrodes to prevent current arcing.		
Prepare fentanyl and midazolam for use if needed		
Perform procedure: Varies by monitor manufacturer * Turn the monitor on		
* Confirm the native rhythm; adjust gain so R waves can be sensed. Should see a "•" on each R wave. If no dot markers appear, adjust ECG size or select another lead.		
* Turn pacing button on. Set rate at 60 BPM. May adjust rate to 70 BPM based on clinical response. (Some monitors preset at rate of 70)		
* Confirm presence of pacing spikes at set rate		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
* Push start/stop button		
☐ Device turns on at 0 mA. * If pt is awake w/ pulse: Slowly increase in 5 mA increments until evidence of electrical capture (pacer spike followed by a wide QRS). Troubleshoot failure to capture. ☐ Assess femoral pulse for mechanical capture. Halt at lowest mA at which 1:1 mechanical capture takes place. ☐ If pt unconscious: Rapidly turn up in 20 mA increments until evidence of mechanical capture is present.		
* Continue upward adjustment of mA until mechanical capture or 200 mA		
* Assess for response to the procedure (VS in right arm, femoral pulse; mental status, SpO_2, pain).		
If no mechanical capture at 200 mA, push stop button and reposition electrodes, check for good skin contact. Push start and slowly increases mA again.		
Evaluate patient - If successful: If SBP ≥ 90 (MAP≥ 65): Assess indications/contraindications for sedation and pain mgt: ☐ **Sedation:** Midazolam standard dose for anxiety/sedation. If deteriorating & critical, omit sedation ☐ **Pain**: FENTANYL or KETAMINE standard dose per PAIN Mgt SOP ☐ If considerable muscle twitching: readjust lateral pad away from pectoral muscle ☐ Complete IMC and prepare for transport.		
If no mechanical capture and pulse present: *Continue norepinephrine per SOP		
Continue to reassess patient for pulses & hemodynamic response		
Critical Criteria - Check if occurred during an attempt ☐ Failure to differentiate patient's need for immediate transportation versus continued assessment and treatment at the scene ☐ Failure to rapidly initiate pacing rather than drugs in unstable patients w/o vascular access ☐ Performs any improper technique resulting in potential for patient harm ☐ Exhibits unacceptable affect with patient or other personnel ☐ Uses or orders a dangerous or inappropriate intervention		

Factually document below your rationale for checking any of the above critical criteria.

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Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

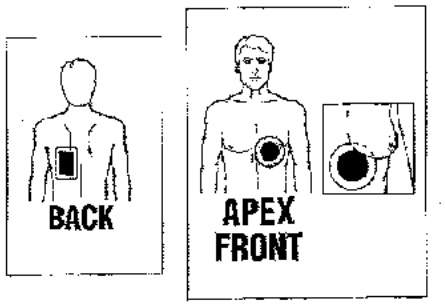
☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.
☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.
☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 5/19

_____
Preceptor (PRINT NAME – signature)

Notes:

Muscle twitching does not mean that the pacemaker is producing good cardiac output. Effective capture should improve hemodynamic status.
Troubleshooting failure to capture: ✓ pads for good skin contact; correct placement; correct lead selection; snug wire connections



NWC EMSS Skill Performance Record

VAGAL (modified Valsalva) MANEUVER

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Prepare/assess patient * Confirm the need for a Vagal maneuver: Lower acuity to emergent: Stable Mild to Moderate cardiorespiratory or perfusion compromise | HR >150; alert, SBP ≥ 90 (MAP ≥ 65) with chest pain or SOB but no evidence of decreased cardiac output		
State the purpose of a modified Valsalva maneuver: Provide + intrathoracic pressure and increase parasympathetic tone to slow the HR. Explain procedure to pt and confirm understanding; answer questions/concerns they may have.		
Initiate Initial Medical Care per Narrow QRS Complex Tachycardia with pulse & HR > 100 SOP ☐ Full telemetry monitoring including ECG (have defib pads available), SpO_2, and BP ☐ Proximal IV line placed with NS TKO or saline lock		
Prepare medications and equipment: ☐ Empty 10 mL syringe; no needle ☐ Prepare antiarrhythmic meds should procedure fail ☐ Prepare procedural sedation meds in case cardioversion or ETI needed due to worsening dysrhythmia or if pt becomes unstable		
Perform procedure https://rebelem.com/the-modified-valsalva-maneuver-head-down-legs-up/ ☐ *Position patient semi-sitting or sitting up ☐ *Ask pt to take a deep breath and blow into the end of the syringe until the plunger moves backwards for 15 sec (expiratory pressure of ~30–40 mmHg) ☐ *Immediately lower head to supine & passively lift legs at a 45-90 degree angle to the torso for 45 -60 seconds. (This increases venous return and maximizes vagal tone | decreases HR by baroreflex and suppresses the AV node – key to procedure's success) 		
Monitor for adverse events: ECG-captured events (asystolic pause and ventricular escape activity), hypotension, nausea, dyspnea, and dizziness that are likely tolerated well and will spontaneously resolve after the cessation of the maneuver.		
Critical Criteria - Check if occurred during an attempt ☐ Failure to differentiate pt's need for Vagal maneuver vs. immediate cardioversion ☐ Performs any improper technique resulting in potential for patient harm ☐ Exhibits unacceptable affect with patient or other personnel ☐ Uses or orders a dangerous or inappropriate intervention		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 4/23

Preceptor (PRINT NAME – signature)

Huang, E.P., Chen, C.H., Fan, C.Y., et al. (2022). Comparison of various vagal maneuvers for supraventricular tachycardia by network meta-analysis. Front Med (Lausanne). Published online doi: 10.3389/fmed.2021.769437. PMID: 35186966; PMCID: PMC8850969.

NWC EMSS Skill Performance Record

SYNCHRONIZED CARDIOVERSION

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Performance standard 3 Step omitted (or leave blank) 4 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 5 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Prepare/assess patient * Confirm the need for cardioversion, i.e., unstable SVT or unstable VT with pulse		
Initiate Initial Medical Care; apply SpO_2 monitor		
Explain procedure to pt if conscious. Warn that procedure may be uncomfortable and medication is available.		
* Remove all clothing and NTG patches from chest; briskly wipe skin w/ dry towel or gauze		
Prepare equipment ✓ electrodes for expiration date; connect pace/defib cable to pace/defib electrodes		
* Peel back the protective liner on the electrodes slowly, beginning with the cable connection end. Make sure gel is moist and in the middle of the electrode.		
* Place the anterior electrode (black electrode) without gaps or wrinkles on the patient's right upper torso, lateral to the sternum and below the clavicle		
* Place the lateral (♥) red electrode under and lateral to the patient's left nipple in the midaxillary line, with the center of the electrode in the midaxillary line if possible		
* Smooth electrode center and edges onto the patient's chest to eliminate air pockets between the gel surface and the skin. Firmly press all adhesive edges to the skin		
* Select paddles mode		
* If responsive & SBP ≥ 90 (MAP≥ 65): **MIDAZOLAM 5 mg IVP/**IN. May repeat X 1 up to **10 mg** if needed **and** SBP ≥ 90 (MAP≥ 65). If condition deteriorating, omit sedation.		
Perform procedure * Confirm rhythm. Turn synchronizer on |adjust gain so R waves are sensed | note consistent marker on R wave If not, switch to another lead. Caution in rhythms with very tall T waves.		
* Charge to monitor-specific joules - (SVT, A-flutter 50 J)		
* Clear patient: Look around 360°; assure no contact with pt and announce all clear		
* Depress discharge button and keep depressed until the discharge occurs		
* Assess patient for response to the procedure (ECG, pulse, mental status, pain)		
If successful: If pt in pain: fentanyl prn; complete IMC; treat post-cardioversion rhythm per SOP; transport		
If unsuccessful and pulse present: *Repeat at monitor-specific joules. Attempt appropriate drug therapy; transport.		
If unsuccessful and pulse absent: CPR - treat per VF SOP		
Critical Criteria - Check if occurred during an attempt ☐ Failure to differentiate pt's need for immediate transport vs assessment & Rx at the scene ☐ Failure to determine the patient's primary problem ☐ Performs any improper technique resulting in potential for patient harm ☐ Exhibits unacceptable affect with patient or other personnel ☐ Uses or orders a dangerous or inappropriate intervention		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 3/22

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

DEFIBRILLATION: Skill alone

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
As quickly as possible: Attach cardiac monitor and check rhythm Remove all clothing, nitro patches from chest, briskly wipe skin with a dry towel or gauze ✓ electrodes for expiration date; connect defib cable to pace/defib electrodes. Peel back the protective liner on the electrodes slowly, beginning with the cable connection end. ✓ to ensure gel is moist and in the middle of the electrode.		
* **Apply pads**: With compressions continuing: * Place anterior electrode (black) without gaps or wrinkles on the patient's right upper torso, lateral to the sternum and below the clavicle.		
* Place the lateral (♥) red electrode under and lateral to patient's left nipple in the midaxillary line, with center of the electrode in the midaxillary line if possible. *May use anterior posterior placement if possible and does not interrupt compressions.*		
* Smooth electrode center and edges onto the patient's chest to eliminate air pockets between the gel surface and the skin. Firmly press all adhesive edges to the skin.		
* Select paddles mode		
*** ✓ rhythm:** No CPR device or monitor does not sense ECG: Palpate femoral pulse for 5 sec while compressions in progress; **pause compressions ≤ 5 sec**. Resume compressions immediately. If can't ID rhythm during pause; print strip during pause; resume compressions. Read ECG from printed strip.		
SHOCKABLE Rhythm?* DEFIB immediately** ***As resuscitation continues: *Consider need for improved compressions if $ETCO_2$ < 20*		
PERI-SHOCK PAUSE WITH CPR device: None **NO CPR device**: Listen to ramping tone. Compressor verbally counts down 5-4-3-2-1; briefly pause CPR (< 5 sec); scan 360°; clear patient		
Discharge current: *Depress current discharge button(after last compression - not a ventilation) **Adult/child ≥50 kg:** Zoll: 120-150-200; LifePak 200-300-360 joules **Child < 50 kg**: 2 J/kg then 4 J/kg; May consider higher energy levels, do not exceed 10 J/kg/ adult max. See SOP chart in Appendix.		
***No CPR device:** Change compressors; immediately resume chest compressions: NO rhythm/pulse check until after 2 min of CPR unless pt wakes or begins to move extremities		
***If persistent/refractory VF**: Change pad location if possible		
Critical Criteria - Failure to defibrillate in correct timing, sequence, or technique		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items explained/performed correctly to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment.

Rating: (Select 1)

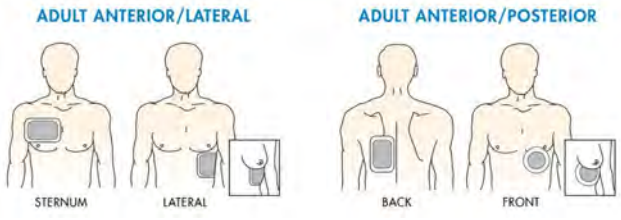
☐ **Proficient**: Can sequence, perform and complete key performance standards independently w correct timing and w/o critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 10/22

Preceptor (PRINT NAME – signature)



NWC EMSS Skill Performance Record

CARDIAC ARREST MANAGEMENT – Adult & Peds

Name #1: (Leader)	Date:		
Name #2: (Compressor)	1st attempt:	☐ Pass	☐ Team repeat
Name #3: (Airway/oxygen)	2nd attempt:	#1: ☐ Pass	☐ Repeat
Name #4: (Monitor)		#2: ☐ Pass	☐ Repeat
Name #5 (IO & drugs)		#3: ☐ Pass	☐ Repeat
Name #6 (Rotator)		#4: ☐ Pass	☐ Repeat
		#5: ☐ Pass	☐ Repeat
		#6: ☐ Pass	☐ Repeat

General expectations:

- Use "Team" approach and bundles of care (multiple simultaneous steps) per SOP
- Organize steps around 2 min cycles in C-A-B priority order unless hypoxic event, pregnant, or a child - **multiple steps may be done simultaneously** if personnel/resources allow
- **Continue resuscitation at point of contact for at least 30 min**. **Exceptions**: Unsafe environment/adverse climate; pt needs intervention not immediately available on scene (PTCA, REBOA, ECMO); penetrating trauma; pregnant; ROSC

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Verbalizes **equipment needed** at point of care: ☐ PPE ☐ Airways (BLS/ALS) ☐ O_2 source ☐ Suction ☐ BVM ☐ ResQPod ☐ Cardiac monitor ☐ Real-time CPR feedback ☐ SpO_2 ☐ $ETCO_2$ (NC & inline sensors) ☐ Pace/defib pads ☐ 12 L electrodes ☐ CPR device (optional) ☐ Cloth/alcohol wipe to prep skin ☐ Vascular access supplies ☐ Drugs: epinephrine; amiodarone; naloxone, sodium bicarb; norepinephrine		
STEP 1: PRIMARY ASSESSMENT ☐ Verify scene safety | **determine UNRESPONSIVENESS** ☐ **Open airway (head tilt/chin lift if no SCI or jaw thrust)** ☐ Assess **BREATHING/**gasping **| SUCTION** prn | Simultaneously **check PULSE** ☐ If apneic/gasping & no pulse (in 10 sec): Assume cardiac arrest. ☐ Determine if **CPR is indicated or contraindicated** (see below) ☐ Attempt to **determine down time:** Electrical (0–5 min); Circulatory (6–10 min); Metabolic (> 10 min) phases		
CPR		
Step 2: If CPR indicated: ☐ Start **high quality,** minimally interrupted **MANUAL CPR** w/in 10 seconds of arrest recognition or take over compressions from bystanders while a second responder sets up the AED or defibrillator. Use audible prompt for correct rate + **real-time CPR feedback** device until a mechanical CPR device is deployed ☐ **13+ yrs/no contraindications after manual CPR started:** Deploy **MECHANICAL CPR device** ASAP (If available and meets protocol) to maintain uninterrupted chest compressions **Pause compressions < 5 sec to place device.** **State approved CPR pauses and contraindications for mechanical devices below.** ☐ **If no CPR device available** or contraindicated: Continue 2 person CPR (adult, child, infant)		
CPR caveats: "What are the contraindications or modifications to CPR and actions to take?" ☐ Valid DNR order | Triple Zero | Blunt trauma found in asystole: Do not begin CPR ☐ If DNR status unclear: Start CPR; stop if valid order is presented or per OLMC order ☐ **LifeVest**® on: Disconnect batteries | Remove vest | Resuscitate per SOP ☐ If pulseless & **VAD placed**: See VAD SOP | Call VAD Coordinator for instructions ✓ SpO_2 (if registers, perfusion is present), mental status, skin signs | DO NOT disconnect batteries If perfusing: NO CPR and NO DEFIBRILLATION (even if VF) Chest compressions are allowed if pt is unconscious and nonbreathing ☐ **Pregnant** & fundus at navel or higher: CPR + **manual left lateral uterine displacement**; stop magnesium if running		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary		Attempt 1 rating	Attempt 2 rating
Verbalize CONTRAINDICATIONS to deploying a MECHANICAL CPR Device: ☐ Impossible to position the device safely or correctly on patient's chest ☐ **Adult patient too small | Patient is a child ≤ 12 years** ☐ **Adult too large:** Cannot lock Upper Part to back plate without compressing pt's chest			
Step 3: GIVE OXYGEN & monitor $EtCO_2$ in all patients ☐ **BLS airways:** Maintain manual airway positioning + NPA/OPA ☐ **O_2 15 L/ NC $EtCO_2$** sensor | Hold BV mask over $EtCO_2$ NC w/ tight mask seal to reduce O_2 leak Persistently low $EtCO_2$ (<10 mmHg) after adequate CPR for 10 min w/ invasive airway in place is likely an indication of poor prognosis. ☐ **13+ yrs: Add RQP** above mask to maintain negative intrathoracic pressure unless contraindicated **Contraindications to RQP**: Flail chest, pulse present; children ≤12 years ☐ Place SpO_2 central sensor; observe (trend) reading and pleth waveform			
Determine need for immediate vs. delayed Positive Pressure VENTILATIONS (PPV)			
☐ **Ventilate immediately:** Cardiac arrest caused by hypoxic event (asthma, anaphylaxis, submersion, drug OD etc.), unwitnessed arrest; pregnant, peds ≤12 years **Adult** 10 BPM (asthma 6-8 BPM) | **child** (1 breath q. 6 sec) each over 1 second; see subtle chest rise (adult: 400-600 mL) + bilateral breath sounds midaxillary lines | Avoid hyperventilation, high airway pressure (≥25 cm H_2O) & gastric distention.	☐ **O_2 w/o ventilations (ApOx):** EMS witnessed arrest and/or found in a shockable rhythm: Manual BLS airways + O_2 as above | **No** ventilations for first 3 minutes.		
Step 4: EARLY DEFIBRILLATION (VF & Pulseless VT)			
APPLY DEFIB PADS/Connect CARDIAC MONITOR without interrupting compressions ☐ Expose chest | Remove NTG paste/patches | Briskly wipe skin with dry towel or gauze ☐ ✓ Defib pads for expiration date | Connect defib cable to pads | Select paddles mode ☐ Carefully peel back electrode liner beginning with cable connection end; ensure gel is moist ☐ **Place defib pads with no gaps or wrinkles:** Anterior-lateral or anterior-posterior placement. Consider need for rapid removal of excessive chest hair before applying pads, but maintain emphasis on minimizing delay in shock delivery. **Adult Ant-lat.**: Anterior electrode on RT upper chest lateral to sternum, above Rt nipple and just below clavicle. Lateral electrode under and lateral to Lt nipple with electrode center in anterior axillary line. If large breasts: place Lt pad lateral to or underneath Lt breast, avoiding breast tissue. **Adult A-P:** Place posterior pad to the Lt of the spine just below scapula at the heart level. Place anterior pad over the cardiac apex between midline chest and nipple on a male or under a larger breast on a female. **Peds:** Use peds pads to defibrillate any child < 8 yrs or weighing < 25 kg (55 lb.) (AHA). Peds pads should be as large as possible while still providing 3 cm (1.18") of space between pad edges. Electrodes must not overlap or make contact during defibrillation. Best pad location may be A-P to avoid overlap. Place one electrode on the anterior chest over the cardiac apex between chest midline and nipple. Place posterior pad on the center of the child's back. ☐ Smooth electrode center and edges onto pt's chest to eliminate folds and air pockets between gel surface and skin. Firmly press all adhesive edges to skin. ☐ **If ICD firing**, wait 30-60 sec. for cycle to complete; place pads at least 1" from implanted device.			
*** ✓ RHYTHM: Know your monitor –** Does it sense native rhythm with CPR in progress? ☐ **CPR DEVICE + monitor senses native ECG w/ compressions:** No pause to ID rhythm ☐ **NO CPR DEVICE / monitor does not sense ECG with compressions:** Palpate femoral pulse for 5 sec (w/ compressions) | Pause ≤ 5 sec to ✓ rhythm. (Pulse will likely disappear during pause) Resume compressions immediately ☐ **Can't ID rhythm**: Print strip during pause; resume compressions | ID ECG from printed strip			
☐ **Not shockable: Continue** compressions	☐ **Shockable** DEFIBRILLATE **immediately**		
JOULES (rapidly measure child with length-based tape) ☐ **Adult & peds > 50 kg**: Zoll: 120-150-200 | LifePak 200-300-360 | Philips: 150-170-200 ☐ **Peds** < 50 kg: 2 J/kg then 4 J/kg | Subsequent shocks ≥ 4 J/kg not to exceed 10 J/kg or adult max			
PERI-SHOCK PAUSE ☐ **WITH CPR DEVICE:** None	☐ **NO CPR DEVICE**: ≤ 5 sec | Precharge with while compressing. Verbally count down 5-4-3-2-1 prior to shock		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
Defibrillation caveats ☐ Discharge current after a compression - not a ventilation | resume compressions (≤ 5 sec) ☐ NO CPR DEVICE: ***Change compressors** q. 2 min (immediately after defib or sooner if fatigued ☐ NO rhythm/pulse check until after 2 min of CPR unless evidence of ROSC ☐ Continue to defib shockable rhythms per above in 2-minute cycles ☐ If very **fine VF / $EtCO_2$ low/decreasing:** ✓CPR quality; attempt to improve perfusion/ventilation ☐ Persistent/refractory VF: Change defib pad location if possible (AP preferred)		
Step 5: ALS interventions: Priority order – IV/IO access | EPINEPHRINE | ADV/invasive airway		
☐ **1. VASCULAR ACCESS:** Preferred venous access site during CPR: Largest, most accessible vein that does not require interruption of resuscitation. May consider IO (approved site) if attempts at IV access are unsuccessful or not feasible. **NS TKO** unless IVF indicated per condition When placed, give meds w/o CPR interruption ☐ ***2.* Early EPINEPHRINE** (Non-shockable rhythm: as soon as feasible | Shockable: after initial defib) **EPINEPHRINE** (1 mg/10 mL) IVP / IO Repeat every **6 min** as long as CPR cont. ▪ **Adult:** 1 mg (each dose) ▪ **Peds:** 0.01 mg/kg (0.1 mL/kg) (max 1 mg/dose) Use dosing chart in Appendix	☐ **3.** Consider ADV/Invasive Airway 3 min after preox **ETI** (preferred in adults) limit 2 attempts per DAI SOP / **BIAD** (adults & peds) Place w/o pausing CPR | Cont. O_2 15 L/$EtCO_2$ NC until placed | Keep head flat if using CPR device **Confirm correct placement & secure** per ADV/invasive airway SOP | maintain axial alignment **Tower of Power:** Airway | $EtCO_2$ | HEPA filter (product-dependent) | ITD (RQP) | Zoll Accu-vent (opt) | BVM (D/C NC $EtCO_2$) ☐ **VENTILATE:** PPV w/ O_2 15 L/BVM at 10 BPM w/ uninterrupted chest compressions (ventilate during upstroke between compressions). Volume only to see subtle chest rise and hear bilateral breath sounds at midaxillary lines / BVM procedure. Peds: May v*entilate q. 3-5 seconds (12-20* BPM) based on SpO_2 / $EtCO_2$. Don't over ventilate.		

NASEMSO Good practice statements

"BVM ventilation is the starting point of positive pressure ventilation (PPV) for **adults** with OHCA. Progression to invasive modalities may be necessary but should not compromise chest compressions. All decisions for progression in airway management should be guided by the patent's clinical status based on ongoing assessment, monitoring, transport, and environmental considerations. SGA should be considered as the primary invasive modality. In systems with appropriate resources and established programs continually assessing intubation performance and **demonstrating high ETI success,** ETI may be considered."

"**Pediatric patients** are a heterogeneous group, and airway management strategies must optimize ventilation and oxygenation while minimizing complications. BVM is the starting point of PPV and may progress to SGA, however, progression to ETI should be done rarely in the face of lower ETI success rates, higher complication rates, and lower patient volumes leading to decreased experience in this population. All decisions should be guided by the clinical status of the patient based on ongoing assessment, monitoring, etiology, and expected clinical course."

Antidysrhythmic agent given only if patient is in a SHOCKABLE RHYTHM				
AMIODARONE IVP/IO	☐ Adult: 300 mg	☐ Peds**:** 5 mg/kg (Max 300 mg)		
Rhythm persists after 5 min:	☐ Adult: 150 mg	☐ Peds: 5 mg/kg (May repeat up to 3 doses)		
Step 6: **Consider & Rx Reversible Causes: Hs & Ts** (May use ultrasound to ID reversible causes or ROSC)				
☐ Hypoxia (ventilate/O_2) ☐ Hypothermia (core rewarm ☐ Hypovolemia (IVF boluses) ☐ Hypo/**hyper**kalemia (bicarb-responsive acidosis (DKA/TCA/ASA OD, cocaine, diphenhydramine): **SODIUM BICARB** 1 mEq/kg (max 50 mEq) IVP/IO (routine use of sodium bicarb in an undifferentiated cardiac arrest is not recommended)	☐ Tamponade, cardiac (early transport) ☐ Thrombosis (coronary/pulmonary) ☐ Tension pneumothorax (pleural decompression) ☐ Toxins **Opioid OD**: **NALOXONE** **Adult:** 1 mg IVP/IO; repeat q. 2 min up to 4 mg from EMS | **Peds** 0.1 mg/kg IVP/IO (max 1 mg); repeat as above | Additional orders: OLMC			
Return of spontaneous circulation (ROSC): Rapid, sustained rise in $EtCO_2$ (at least 10 & often **≥40** mmHg); pt moves; wakes up **FOCUS:** Oxygenation, circulatory support, lung-protective ventilation, adequate sedation; 12 L ECG				
☐ **Remove RQP |** Assess VS + SpO_2 & $EtCO_2$: Pause compressions & ID ECG rhythm | If organized rhythm, palpate **pulse & watch SpO_2 pleth for 5 min** to detect PEA				

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
☐ **Support ABCs:** Target normal oxygenation (avoid hyper or hypoxia) - **SpO_2 (92-98%) $EtCO_2$ 35-45** | **PPV prn** 10 BPM w/ visible chest rise; do not hyperventilate even if ↑ $EtCO_2$ **Adult** SBP > 90 (MAP > 65) | **Child** SBP >70 + (2 X age) If ETI/BIAD placed and pt remains unconscious: Assess need for pain mgt/sedation (RASS score) per DAI SOP ☐ **Obtain12 L ECG** (as soon as feasible - target within 8 min) after ROSC (call alert if STEMI) **Emergent Rx if hypotensive | Cardiogenic shock | Circulatory support needed** ☐ **If lungs clear:** IV NS 20 mL/kg up to 1 L. The post-arrest pt is not usually hypovolemic and does not need more IVF. Avoid volume overloading pt into pulmonary edema. Stunned heart needs inotropic support and may need assistance with peripheral vasoconstriction.		
☐ **NOREPINEPHRINE** drip (IV/IO) | 4 mg in 1,000 mL NS (4 mcg/mL) | Use of IV pump preferred **Adult**: Initial dose: 8 mcg/min (2 mL/min) titrated to reach SBP ≥ 90 (MAP ≥ 65) **Peds:** Initial dose: 0.1 mcg/kg/min (max 1 mcg/kg/min up to 8 mcg/min) titrated to SBP >70 + (2 X age in yrs); Do not exceed adult doses listed above. Higher doses (10 mcg/min) RARELY needed – contact OLMC. Assess BP (MAP) q. 2 min until target BP reached (don't overshoot) | Reduce drip rate incrementally to maintain at BP targets. Maintenance: 2 to 4 mcg/min (0.5 mL to 1 mL/min) or less | Continue to reassess BP q. 5 min. ☐ Monitor for **SEIZURES:** Rx per SOP | ☐ ✓ **GLUCOSE** level: Rx per SOP; avoid hyperglycemia		
Determination of Death | TERMINATION OF RESUSCITATION (TOR) | Must be approved by OLMC physician		
BLS TOR Rule: Arrest Unwitnessed by EMS/1st responders | No ROSC before transport | no AED shocks delivered **ALS TOR Rule**: Arrest unwitnessed by anyone | No bystander CPR | No ROSC after full ALS | No defib before transport **Addtl. Considerations:** Normothermic pt. remains in persistent monitored asystole for ≥ 30 min despite resuscitation | $EtCO_2$ remains ≤ 10 mmHg for 20 min in pts with advanced airways & no reversible causes of arrest identified **If TOR denied**: Transport with CPR in progress after 30 min of resuscitation on scene **If TOR granted**: Note time resuscitation was terminated | Follow System policy for patient disposition		
Verbalize acceptable CPR pauses/discontinuation of compressions: ☐ Optional: Lift patient for posterior defib pad placement (<5 sec) (attempt to combine pause with step below) ☐ Lift patient for CPR device back plate placement (< 5 sec) ☐ Activation of CPR device (autosensing piston placement) (<5 sec) ☐ Every 2 min: Rhythm check if cannot ID rhythm with compressions in progress (< 5 sec) ☐ Every 2 min if shockable rhythm: Manual defibrillation (< 5 sec) if no CPR device deployed ☐ Organized rhythm appears w/ spike in $ETCO_2$; pause to check for pulse (ROSC). If present: cease compressions. ☐ TOR: Meeting criteria above		
Critical Error Criteria - Check if occurred ☐ Failure to perform quality, high perfusion, uninterrupted CPR unless justified pause ☐ Failure to appropriately initiate BLS airway/oxygenation; $EtCO_2$ monitoring; and PPV ☐ Failure to appropriately attach ECG monitor, check/ID rhythm, and defib if shockable rhythm ☐ Failure to initiate/sequence ALS care appropriately ☐ Failure to consider Hs & Ts and provide appropriate interventions ☐ Failure to support perfusion after ROSC or detect re-arrest ☐ Performs any improper technique resulting in potential harm ☐ Exhibits unacceptable affect with patient, bystanders, or other healthcare personnel		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items explained/performed correctly to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment.

Rating: (Select 1) for team

☐ **Proficient**: Can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, made critical error(s); recommend additional practice

CJM 1/24

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

ResQPOD® Impedance Threshold Device (ITD)

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
* State purpose of ResQPOD® (RQP) Impedance Threshold Device (ITD): The ResQPOD lowers intrathoracic pressure during the recoil phase of CPR by selectively restricting unnecessary airflow into the chest. This vacuum increases preload, lowers intracranial pressure (ICP), and improves blood flow to the brain and vital organs.		
* Verify indication for ITD: Cardiac arrest w/ CPR in progress; age 13 and older		
*Confirm absence of contraindications ☐ Flail chest ☐ Pulse present ☐ Children ≤ 12: The RQP should be effective in patients of all ages, however it has only been tested clinically in adults ages 18 years and above. Animal studies in a pediatric model of cardiac arrest, have demonstrated that the RQP effectively enhances circulation in 10 kg piglets in cardiac arrest. It is the ultimate decision of the prescribing physician to determine in what ages of patients the RQP should be used.		
Verbalize: Must be used with quality high perfusion CPR (good compression rate & depth, release completely, minimize interruptions, no hyperventilation) for improved pt outcomes		
Remove RQP ITD from sealed package (single-use device)		
Remove adhesive tab from timing light switch (tab prevents inadvertent activation)		
Slide timing light switch slightly counterclockwise, to activate ventilation timing lights Timing lights flash 10 times/min for 1 sec indicating adult rate of ventilations with ADV airway		
Put adhesive tab on other side of switch, to prevent accidentally turning switch off		
Place RQP ITD directly on BVM face mask if using BLS airways		
Assure continuous tight face-mask seal both during ApOx and using 2-person BVM technique w/ positive pressure ventilations prior to advanced airway placement		
After ADV airway: **Tower of Power:** Airway | $EtCO_2$ | HEPA filter (product-dependent) | ITD (RQP) | Zoll Accu-vent | BVM - Microstream $EtCO_2$ sensor will not fit into ITD without use of an adapter		
* When return of spontaneous circulation (ROSC) occurs, remove ITD		
Retain device as timing device for ventilations, or for use if cardiac arrest recurs		
If device fills with secretions, shake and ventilate secretions out of device		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 11/22

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

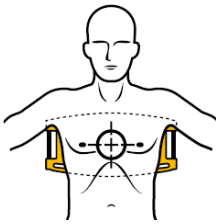
LUCAS® CPR DEVICE

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

The NWC EMSS requires that LUCAS® External Cardiac Compressor only be used by EMS personnel who have received appropriate training and have been competencied in how to use LUCAS®.
Providing high perfusion manual chest compressions takes precedence over initiating use of the LUCAS.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***States indication**: Intended for use as an adjunct to manual CPR on adults who have cardiac arrest in cases when high perfusion manual CPR is not possible (e.g., during patient transport or need for extended CPR when fatigue may prohibit the delivery of effective/ consistent compressions, or when insufficient EMS personnel are available to provide prolonged high perfusion CPR). Always follow local guidelines for CPR and cardiac arrest resuscitation when using the LUCAS System.		
***States CONTRAINDICATIONS**: Do NOT use LUCAS® device in the following cases: ☐ Impossible to position the LUCAS® device safely or correctly on patient's chest. ☐ **Adult patient too small**: If LUCAS® alerts with 3 fast signals when lowering Suction Cup and you cannot enter the PAUSE or ACTIVE modes. ☐ **Adult too large:** Cannot lock Upper Part to back plate without compressing pt's chest. ☐ Patient is a child ≤ 12 years ☐ No indication that chest compressions are likely to help patient (Triple zero) ☐ Valid POLST form with DNR marked		
States possible SIDE EFFECTS of using the device ☐ Rib fractures and other injuries are common but acceptable consequences of CPR. Assess patients after resuscitation for resuscitation-related injuries. ☐ Skin abrasions, bruising and chest soreness common after Lucas use		
***Explains meaning of all User Control Panel keys** **ON/OFF**: Device will power up/ power down when this key is pushed for 1 second. When device powers up, an audible signal sequence is heard and device automatically does a self-test. When self-test is complete, the audible signal stops and a green LED light beside the ADJUST key illuminates. This takes ~3 seconds. 		
ADJUST: Used to adjust position of the Suction Cup. When pushed, you can manually move Suction Cup up or down. • To set Start Position, manually push Suction Cup down onto chest. To lift the Suction Cup, manually pull it up. • Device can be set for manual or automatic movement of Suction Cup. 		
PAUSE: When PAUSE is pushed after adjusting Suction Cup to chest, the height position is fine-tuned and locked into Start Position. When pushed during compressions, the LUCAS® will stop compressions and lock the Suction Cup in its Start Position. *Setup options*: Device can be set up for different automatic height adjustments of Suction Cup. 		
ACTIVE (continuous): When this key is pushed, LUCAS® performs continuous chest compressions. The green LED signal will blink 10 times/min to alert for ventilation during ongoing compressions. ***Setup options**:* Device can be setup for different numbers of ventilation alerts, audible alert signal on/off, ventilation pause duration, and automatic adjustment of Suction Cup. Rate and depth can be configured to different fixed values. Device can be configured to alter between rates by pushing the ACTIVE key (continuous or 30:2) during ongoing compressions. 		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
ACTIVE (30:2): When this key is pushed, the LUCAS® performs 30 chest compressions and then temporarily stops. During the stop, perform 2 ventilations. After the stop the cycle starts again. An intermittent LED in combination with an audible signal sequence alerts operator before each ventilation pause. 		
BATTERY indicator: 3 green LEDs show Battery charge status: • 3 green LEDs: Fully charged; 2 green LEDs: 2/3 charged; 1 green LED: 1/3 charged • One intermittent yellow LED and alarm during operation: low battery, ~10 minutes of operating capacity remaining • One intermittent red LED and alarm signal: Battery is empty and must be recharged, or Battery is too hot Note: When LED to the far right is yellow and not green, Battery has reached end of service life. Replace this Battery with a new one. 		
MUTE: If this key is pushed when LUCAS® operates, alarm is muted for 60 seconds. If pushed when LUCAS is powered off, the Battery indicator shows Battery charge status. 		
High priority alarms: One intermittent red LED and an alarm signal sequence indicate malfunction. A high priority alarm will take precedence over lower priority or information alarms. 		
Transmit data: Push this key to send device data and receive new setup options. The device has to be in Power OFF mode to send and receive data. 		
Application and use		
Follows manufacturer's recommendations regarding preparation of device, applications of straps to unit and charging battery		
Arrival at patient: ☐ ***Confirm cardiac arrest and need for resuscitation. Start high quality, high perfusion, MANUAL CPR per guidelines within 10 sec of arrest confirmation if indicated** BEFORE CPR device deployment per procedure: Use audible prompt to ensure correct rate. ☐ ***$ETCO_2$ reading within 15 sec of first cardiac compression** and again every 2 minutes ☐ *Place ECG defib pads and use real-time CPR feedback technology per cardiac arrest procedure ☐ Once resuscitation started, use same monitor UNLESS resuscitation started using a unit w/out feedback capability ☐ *Zoll CPR feedback device stays in place throughout resuscitation regardless of CPR method ☐ *Use Physio Control CODE-STAT® sensor up to point of LUCAS® application. ☐ **As soon as possible (13 and older)**, transition to an approved **automated CPR device** (if available and meets protocol) to maintain uninterrupted chest compressions. ☐ After placement, ideally - pause/DC CPR device only for rhythm check, TOR or ROSC (precipitous/persistent rise in $ETCO_2$); see approved pauses below		
Prepare patient & equipment for device application ☐ Mark chest with Sharpie to assess for migration of device		
Deploy device ☐ ***DO NOT interrupt CPR for longer than 5 seconds** from last manual compression to first mechanical compression. Application time will be monitored and documented. ☐ *Unpack device and **Push ON/OFF** on the User Control Panel for 1 sec to power up and start self-test. Green LED adjacent to **ADJUST** key illuminates when device is ready for use. ☐ If LUCAS left in ADJUST mode, it will power off automatically after 5 minutes.		
***Option #1 placing back plate – must do one correctly**		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
☐ With manual CPR continuing - Position LUCAS back plate at head of pt. ☐ Temporarily stop CPR. One member supports head and shoulders while another steps in front of pt, holds arms and both lift pt's upper body enough for a 3rd member to slide back plate into position. Return pt to supine position, immediately resume manual CPR. ***Option #2 placing back plate** ☐ With manual CPR continuing - Position back plate perpendicular to side of pt. ☐ Temporarily stop CPR. One member supports head while another positions self at patient's side and coordinates a log roll maneuver while a 3rd member slides back plate into position. Return pt to supine position, immediately resume manual CPR. ☐ *For both options; ensure back plate is below armpits in line with the nipple line and pt's arms are outside back plate. 		
***Attach upper part (Hood)** ☐ **During ongoing manual CPR**, attach support leg nearest to compressor to the back plate. ☐ Slide other support leg through arms of manual compressor and attach to Back Plate so both support legs are securely locked into the Back Plate		
Adjust Suction Cup ☐ *Set device to **ADJUST** mode ☐ ***Correctly position suction cup on patient's chest**. Compression point should be at same spot as for manual CPR and according to guidelines. ☐ *Stop manual compressions - **Lower suction cup** until pressure pad inside suction cup touches pt's chest without compressing chest. When pressure pad is in correct position, the lower edge of the Suction Cup is immediately above end of sternum. ☐ *If not correctly positioned in relation to pt, **adjust position** by pulling on the support legs. Person assembling device ensures correct position. ☐ If the Suction Cup is pushed down too hard or too loose to the chest, LUCAS® will adjust Suction Cup to correct Start Position. ☐ *Push **PAUSE to lock the Start** Position.		
***Initiating mechanical compressions** ☐ Push **ACTIVE** (continuous) OR ACTIVE (30:2) to start compressions ☐ Do not leave the patient or device unattended while LUCAS® is active ☐ Check that device is working as it should – compression frequency and depth ☐ To stop chest compressions, push PAUSE		
***Apply stabilization strap while LUCAS® is active** ☐ Remove neck strap (part of Stabilization Strap) from Carrying Case (support legs straps should already be attached to support legs) ☐ Extend neck strap fully at the buckles. ☐ Lift head and put cushion behind neck as near to shoulders as possible. ☐ Connect buckles on support leg straps with buckles on neck strap. Ensure straps not twisted. ☐ Hold LUCAS® support legs stable and tighten neck strap. ☐ Make sure Suction Cup position remains correct on patient's chest.		
***Defibrillation** ☐ Pause compression for < 5 sec to check rhythm. Resume compressions. ☐ If shockable: Perform defibrillation per usual procedure while LUCAS® is operational. ☐ Ensure that no defib pads or wires are under Suction Cup. ☐ After defibrillation, ensure correct position of Suction Cup. Readjust prn.		
Advanced airways ☐ Intubation using King Vision® is possible while LUCAS® is operating. Attempt ETI first. ☐ If unsuccessful after 2 attempts – insert extraglottic airway		
Moving patient: Secure arms to device ☐ *When ready to move pt, secure arms at the wrist with Patient Straps to LUCAS® hood. ☐ *Do not use straps for lifting. They are only to fixate patient to device. ☐ Caution - skin burns: Temps of hood and battery may rise above 118 °F / 48 °C. If hot, avoid prolonged contact to prevent skin burns. Remove patient hands from patient straps.		
Lifting patient while device operates: Follow manufacturer's instructions regarding use of handholds below claw locks and moving patient to stretcher.		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary			**Attempt 1 rating**	**Attempt 2 rating**
Transporting patient The LUCAS® can deliver compressions while patient is moved and/or transported if: ☐ The device and patient are safely positioned on the transportation device ☐ The device stays in the correct position and angle on the patient's chest				
Changing battery ☐ Must always have a charged spare LUCAS Battery in the Carrying Case. ☐ Follow manufacturer's instructions for battery change. ☐ If battery changed in <60 seconds, device remembers Suction Cup Start Position. Quickly resume compressions by pushing ACTIVE (continuous or 30:2) key. If it takes >60 seconds, device performs a self-test and you must set the Start Position again.				
*Can verbalize major manufacturer's cautions and warnings relative to device operation.				
Documentation ☐ Standard cardiac arrest documentation plus ☐ *Time of device application ☐ *Any evidence of patient adverse effects (skin breakdown, suggested fracture or chest deformity must be reported to the EMS MD as soon as patient safety and welfare has been addressed.				
Competency Check:				
*Actual time in minutes from last manual compression to first mechanical compression (must be <5 sec)	1st attempt	2nd attempt		
Critical Criteria - Check if occurred during an attempt – must automatically redo station ☐ Exhibited unacceptable affect with patient, family, bystanders, or other personnel ☐ Failed to perform high perfusion manual CPR prior to deploying device ☐ Failed to activate CPR feedback device prior to deploying automated CPR device ☐ Failed to obtain $ETCO_2$ within 15 sec of first compression ☐ Applied device in a dangerous or inappropriate manner ☐ Interrupted compressions for longer than 5 seconds at any time. ☐ Could not appropriately change out a battery ☐ Could not appropriately troubleshoot alarms				

Factually document below your rationale for checking any of the above critical criteria.

_____

_____

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

_____

Preceptor (Printed Name & Signature)

CJM 1/24

3.5 Symbols on the device

Symbol	Meaning
	Caution – keep your fingers away Do not put your hands on or below the Suction Cup when the LUCAS device operates. Keep your fingers away from the claw locks when attaching the Upper Part or lifting the patient.
	Caution - do not lift by the straps Do not use the straps for lifting. The straps are only to fasten the patient to the LUCAS device.
	Place the lower edge of the Suction Cup immediately above the end of the sternum, as indicated in the figure. The Suction Cup should be centered over the chest.
	Pull the release rings to remove the Upper Part from the Back Plate.
	Do not reuse - Single use only.
	DC Input.

Symbols on type labels

Symbol	Meaning
	Follow instructions for use All operators must read the complete instructions for Use before operating the LUCAS Chest Compression System.
	Year of manufacture and manufacturer.
	Battery and/or electronics may not be disposed in the normal waste stream.
IPXX	Enclosure ingress protection*
⎓	DC voltage
	Defibrillation protected type BF patient connection.
SN	Serial number
TYPE	Variant
LOT	Batch code/lot number
	Non-ionizing electromagnetic radiation
	Class II equipment
FC	Complies with (USA) Federal Communications Commission regulations
	Indicates device is certified to applicable Japanese wireless requirements

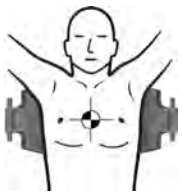
NWC EMSS Skill Performance Record

Defibtech Lifeline ARM® Automated CPR DEVICE

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

The NWC EMSS requires that Defibtech Lifeline ARM® automated chest compressions (ACC) device only be used by: EMS personnel who have received appropriate training and have been competencied in how to use the device.
Providing high perfusion manual chest compressions takes precedence over initiating the ARM® device.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***States indication**: Intended for use as an adjunct to manual CPR on adults who have cardiac arrest in cases when high perfusion manual CPR is not possible (e.g., during patient transport or need for extended CPR when fatigue may prohibit the delivery of effective/consistent compressions, or when insufficient EMS personnel are available to provide prolonged high perfusion CPR). Always follow local guidelines for CPR and cardiac arrest resuscitation when using the ARM® CPR Device.		
***States CONTRAINDICATIONS**: Do NOT use the ARM® in the following cases: ☐ Impossible to position the device safely or correctly on patient's chest. Patient size is the determining factor when deploying the Lifeline ARM; there is no limitation regarding pt weight. ☐ **Adult patient too small** for the starting piston height to reach the patient's chest. ☐ **Adult too large** for the Frame to attach to the Backboard or if the Compression Module/Piston cannot be mounted without compressing the patient's chest. ☐ Patient is a child ≤ 12 years ☐ Pregnant woman after 20 wks. ☐ No indication that chest compressions are likely to help patient (Triple zero) ☐ Valid POLST form with DNR marked		
States possible SIDE EFFECTS of using the device ☐ Rib fractures and other injuries are common but acceptable consequences of CPR. Assess patients after resuscitation for resuscitation-related injuries. ☐ Skin abrasions, bruising and chest soreness common after device use		
Prepares all equipment needed: Backboard, frame, carrying case, compression module, fully charged battery pack, patient interface pad (PIP), stabilization strap, wrist straps, AC adapter.		
***Explain meaning and use of all Control Panel keys** **ON/OFF**: Device will power up/down when key is pushed for 1 second. **ADJUST:** **1.** Press the Up/Down button to adjust the height of the Compression Piston relative to the patient's chest 		
2. Press one of two softkeys to select a rescue protocol for compressions: - Press the top button to perform continuous compressions only - Press the bottom button to perform compressions with pauses for rescue breaths Can toggle between the two protocols. Compressions can be stopped (paused) or resumed.		
PAUSE: When pushed, stops compressions when running or resumes compressions when stopped		
Battery Pack Indicator: Indicates the approximate remaining Battery Pack capacity ARM is powered by a replaceable Battery Pack (slides into either side of the Compression Module) that **must always be installed to operate the device, even when powered by the AC Adapter**. ▪ The Compression Module should be turned off, or paused if in use, whenever batteries are swapped out. ▪ To remove the Battery Pack, squeeze the eject release latches on either side of the Battery Pack opening. ▪ To insert Battery Pack: Be sure contacts are facing the device and push in until the latch clicks. ▪ When device is turned on, the Battery Pack Status indicator will display throughout its use. ▪ When fully charged, the Battery Pack will provide about 60 minutes of compressions. ▪ With the Battery in the Compression Module at room temperature and in the off state, the external AC Adapter can charge the battery in <3 hours.		
Warning Indicator: Illuminates to notify the user that there is a problem with the compression module and immediate attention is needed		
Warning Mute Button: Silences the audible sound associated with a warning for one minute		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
Service Indicator: Will flash to indicate when the Lifeline ARM requires periodic maintenance		
Application and use		
Follows manufacturer's recommendations regarding preparation of device, applications of straps to unit and charging battery		
Arrival at patient: ☐ ***Confirm cardiac arrest and need for resuscitation. **Start high quality, high perfusion, MANUAL CPR per guidelines within 10 sec of arrest confirmation if indicated** BEFORE CPR device deployment per procedure: Use audible prompt to ensure correct compression rate. ☐ ***$ETCO_2$ reading within 15 sec of first cardiac compression** and again every 2 minutes ☐ *Place ECG defib pads and use real-time CPR feedback technology per cardiac arrest procedure. Avoid getting gel on the patient's chest (from defibrillation pads) in the piston target area. ☐ Once resuscitation started, use same monitor UNLESS resuscitation started using a unit w/out CPR feedback capabilities ☐ *Zoll CPR feedback device stays in place throughout resuscitation regardless of CPR method ☐ *Use Physio Control CODE-STAT® sensor up to point of ARM® application. ☐ **As soon as possible (13 and older)**, transition to an approved **automated CPR device** (if available and meets protocol) to maintain uninterrupted chest compressions. ☐ After placement, ideally pause/DC CPR device only for rhythm check, TOR or ROSC (precipitous/persistent rise in $ETCO_2$); see approved pauses below		
Prepare patient & equipment for device application ☐ Mark chest with Sharpie to assess for migration of device		
Deploy device ☐ ***DO NOT interrupt CPR for longer than 5 seconds** from last manual compression to first mechanical compression. Application time will be monitored and documented. ☐ Open the Carrying Case and remove the back plate.		
***Option #1 placing backboard** (base for the ARM® system - placed under the patient as shown and has attachment points on either side to which the Frame latches) **Must do one correctly** ☐ With manual CPR continuing - Position ARM® backboard at head of patient. ☐ Temporarily stop CPR. One member supports head and shoulders while another steps in front of patient, holds arms and both lift pt's upper body enough for a 3rd member to slide backboard into position. Return pt to supine position, immediately resume manual CPR. ***Option #2 placing back plate** ☐ Position ARM® backboard perpendicular to side of pt. ☐ Temporarily stop CPR. One member supports head while another positions self at patient's side and coordinates a log roll maneuver while a 3rd member slides backboard into position. Return pt to supine position, immediately resume CPR. ☐ *Ensure back plate is below armpits and in line with the nipple line. Accurately placing Backboard now makes it easier to correctly align Compression Module. 		
***Attach upper part (Frame)** ☐ **Without interrupting manual CPR**, position the Frame over the patient. ☐ Attach Frame to the Backboard by aligning Frame latches over the Backboard pins and pushing down until the latches snap into place. Latches may be secured one at a time or simultaneously. ☐ Pull up on the Frame to make sure it is securely attached to the Backboard.		
Insert **Compression Module:** User Control Panel is on the top, Battery Pack slides into the side, and Compression Piston (with Patient Interface Pad) is located at the bottom, facing the patient. Ensure a Patient Interface Pad and Battery Pack is installed, and insert module into Frame, rotating in either direction until in line with frame to lock into place. 		
To attach a Patient Interface Pad: Press pad onto the end of the Piston until it snaps into place, rotating the pad if necessary. **To remove the Patient Interface Pad**: Grasp pad by the edges and gently pull down one edge. Each Pad is for one-time use only. 		
***Initiating mechanical compressions**		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
☐ Adjust the Frame and Backboard to position the Compression Piston over the patient's chest and directly in line with the nipples. (This is the same target point used for manual CPR.) ☐ **Press the On/Off button** for at least one sec to turn on. If Battery Pack indicator shows red for low battery or the device does not turn on, replace the Battery Pack or connect the AC Adapter. ☐ **Adjust the height of the Compression Piston** relative to the patient's chest. Interrupt manual CPR to adjust the height of the Compression Piston. Press the "Adjust Down" and "Adjust Up" buttons on the Control Panel as needed while guiding the Piston with the other hand to j**ust touch the patient's chest.** If the Piston cannot be adjusted to reach the patient's chest, the patient is too small. Remove Frame and continue manual CPR.		
☐ Once the Piston is properly adjusted, push the "Run Continuous" button per SOP. ☐ Do not leave the patient or device unattended while AMR® is active ☐ Check that device is working as it should – compression frequency and depth ☐ To stop chest compressions, push PAUSE		
***Apply stabilization strap while ARM® is active** ☐ Lift patient's head and slide Stabilization Strap under the patient's neck. If head, neck, spine, or other bone-structure injuries possible, use accepted handling techniques. ☐ Connect Strap to the Frame on both sides by pushing strap clips into the connectors until they click into place. ☐ Tighten Strap to maintain Piston's correct position over chest by adjusting the Velcro® that holds both clips to the Stabilization Strap.		
***Defibrillation** ☐ Pause compression for < 5 sec to check rhythm if needed. Resume compressions. ☐ If shockable: Perform defibrillation per usual procedure while ARM is operational. ☐ Ensure that no defib pads or wires are under the piston. ☐ After defibrillation, ensure correct position of piston. Readjust prn.		
Advanced airways ☐ Intubation using King Vision® is possible while the ARM® is operating. Attempt ETI first. ☐ If unsuccessful after 2 attempts or ETI not advised – insert extraglottic airway		
Lifting patient while device operates: Follow manufacturer's instructions for moving patient to stretcher.		
Transporting patient The ARM® can deliver compressions while patient is moved and/or transported if: ☐ The device and patient are safely positioned on the transportation device ☐ The device stays in the correct position and angle on the patient's chest		
Changing battery while in use (must always have one spare charged battery in case) ☐ Push Pause on the User Control Panel to temporarily stop compressions. ☐ Press the Battery Pack Release to quickly eject the depleted Battery Pack and remove it. ☐ Insert the charged spare Battery Pack. ☐ Wait for the Pause LED indicator to illuminate. ☐ Restart compressions by pushing the Pause button again or one of the Run buttons. ☐ If the Battery Pack change takes over 15 seconds, the Piston will automatically retract when the spare Battery Pack is inserted and the start position will have to be set again.		
*Can verbalize major manufacturer's cautions and warnings relative to device operation.		
Documentation ☐ Standard cardiac arrest documentation plus ☐ *Time of device application ☐ *Any evidence of adverse effects (skin breakdown, suggested fracture or chest deformity must be reported to the EMS MD as soon as patient safety and welfare has been addressed.		
Competency Check:		
*Actual time in minutes from last manual compression to first mechanical compression (must be <5 sec) — 1st attempt — 2nd attempt		
Critical Criteria - Check if occurred during an attempt – must automatically redo station ☐ Exhibited unacceptable affect with patient, family, bystanders, or other personnel		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
☐ Failed to perform high perfusion manual CPR prior to deploying device ☐ Failed to activate CPR feedback device prior to deploying automated CPR device ☐ Failed to obtain $ETCO_2$ within 15 sec of first compression ☐ Applied device in a dangerous or inappropriate manner ☐ Interrupted compressions for longer than 5 seconds at any time. ☐ Could not appropriately change out a battery ☐ Could not appropriately troubleshoot alarms		

Factually document below your rationale for checking any of the above critical criteria.

_____

_____

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

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☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

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_____

Preceptor (Printed Name & Signature)

CJM: 6/19

NWC EMSS Skill Performance Record

Mechanical Circulatory Support (MCS) using a Ventricular Assist Device

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Notes: Unit runs on electricity provided by a Power Base Unit (PBU) during stationary use or by rechargeable batteries worn during mobile use.
Because blood bypasses aortic valve, there may be no pulse, especially with continuous flow pumps.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
*__State purpose of MCS__: Assist a failing heart by taking blood out of LV, through the pump, & back into ascending aorta – reduces need for native heart to pump blood through aortic valve, reducing cardiac workload & O_2 demand.		
Response to a pt. with a VAD ☐ **Call VAD Coordinator immediately** if known – phone number from pt or caregiver or one of the listed centers below if specific Coordinator unknown ☐ Get history/instructions, VAD parameters from family/caregiver. Patients will be on anticoagulation medications – get list of all meds Patients will often have pacemakers and/or Internal Cardioverter Devices (ICDs). ☐ Ask if pt is looking, feeling, or acting differently than their baseline		
Decision tree responsive patient ☐ Assess ABCs: SpO_2 waveforms may be flat; without amplitude despite accurate readings ☐ If breathing labored; O_2 per SOP ☐ Assess circulation: May NOT have a pulse (NORMAL); check cap refill, color, temp, mental status ☐ Listen for VAD sounds LUQ (when working device makes a quiet whiling sound) ☐ Look and listen for alarms; pt & caregivers can help troubleshoot alarms		
Decision tree unresponsive patients ☐ Airway, breathing assessment/Rx per SOP ☐ Quick check for driveline or wire exiting abdomen, batteries, cable, system controller ☐ Caution removing clothes, especially using trauma scissors – DON'T CUT CABLES OR WIRES ☐ Assess circulation: May NOT have a pulse (NORMAL); check cap refill, color, temp, mental status ☐ Listen for VAD sounds LUQ (when working device makes a quiet whiling sound) ☐ Look and listen for alarms; pt & caregivers can help troubleshoot alarms – see below ☐ Consider other causes of AMS: stroke, cardiogenic shock, respiratory arrest, hyper or hypoglycemia – Rx per SOP		
State common causes of VAD alarms **Pt not connected to power properly** ☐ Check all connections; fix loose connections ☐ ✓ Driveline connection to System Controller ☐ ✓ System Controller to battery clip ☐ ✓ Batteries "engaged" in battery clips – NEVER DISCONNECT BOTH BATTERIES AT THE SAME TIME or pump will stop ☐ ✓ System controller in cable connected to wall unit ☐ Have pt/caregiver show how to silence alarms, use a hand pump if applicable		
Patient condition exists where low or no flow (cardiac output) is present ☐ Do they appear to be in cardiogenic shock? Can be from electrical disruption to pump or pump malfunction (rare) ☐ If yes, start SOPs; contact VAD Coordinator – provide assessments and VAD parameters if able ☐ Transport to nearest VAD Center if possible; if no airway – transport to nearest hospital ☐ Avoid external chest compressions if possible: Pose a risk due to location of outflow graft on aorta & inflow conduit in the LV apex. Dislodgement could lead to fatal hemorrhage. Contact VAD Coordinator for instructions re: CPR. Get instructions for hand pumping if applicable. CHEST COMPRESSIONS ARE ALLOWED if patient is unconscious and non-breathing.		
ECG findings: ☐ VADs fix the plumbing - electrical conduction system should be intact; Do NOT expect asystole; pt may be conscious w/ V-fib ☐ ECG waveforms may have a lot of artifact due to the device. ☐ Can have dysrhythmias but are better tolerated because pump continues to function despite irregular rhythm – Rx dysrhythmias with drugs per SOP		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
Caveats on DEFIBRILLATION Majority of VAD pts can be shocked without disconnecting the percutaneous lead from the System Controller or stopping the pump prior to delivering the shock; but older units may need to be disconnected first and hand pumped before defib ☐ Contact VAD Coordinator BEFORE defibrillating ☐ Only shock if pt. is unresponsive with poor perfusion/decreased circulation per cap refill (remember, no pulse is normal) and if you cannot contact VAD coordinator ☐ Do not defibrillate over the pump; defibrillate at nipple line or above. Anterior-posterior pad placement preferred. ☐ Warning: If VAD stops operating & blood is stagnant in pump & conduits for > a few min (depending on pt's anticoagulated state) there is risk of stroke and/or thromboembolism if device is restarted. Retrograde flow may occur during pump stoppage.		
Transport to nearest VAD center if possible		
Bring all VAD equipment if possible: batteries, battery clips, power base, plugs, battery charger (pt cannot be out of power)		
Allow family member/caregiver to ride in ambulance if possible		
Notes: NO MRIs - CT Scans are ok; avoid water submersion; avoid contact with strong magnets or magnetic fields		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.
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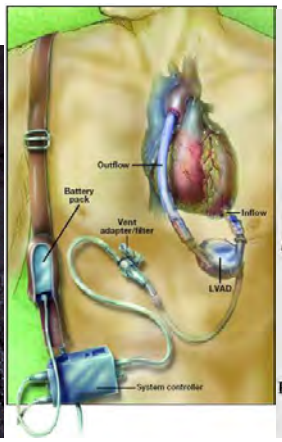
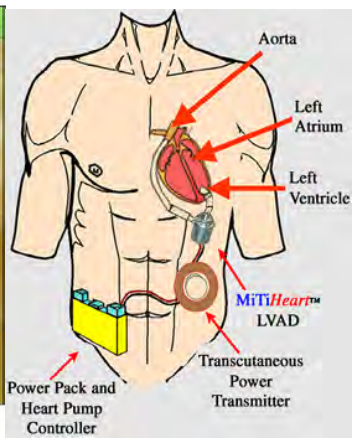
CJM 6/19

Preceptor (PRINT NAME – signature)

Heartmate XVE & Heartmate II

Illinois Mechanical Circulatory Support Implant Centers	
Advocate Christ Medical Center - Oak Lawn	1-877-684-4327
Amita Health Alexian Brothers Medical Center	847-437-5500 ask operator to page LVAD Coordinator
Loyola University Medical Center - Maywood	1-708-216-8000
Northwestern Memorial Hospital - Chicago	1-312-695-9611
Rush University Medical Center - Chicago	1-312-656-6813
OSF Saint Francis Medical Center - Peoria	1-309-655-4101
University of Chicago Medical Center - Chicago	1-773-753-1880 id# 4823





NWC EMSS Skill Performance Record

INTRAVENOUS CATHETER INSERTION

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Objective: Obtain and maintain peripheral vascular access for medication administration, fluid resuscitation, proactive patient care, and collaborative care with the hospital.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Prepare equipment: ☐ Gloves (plus other appropriate PPE as indicated) ☐ IV Start Kit: chlorhexidine skin prep, tourniquet, gauze, Tegaderm, and tape ☐ 10 mL Normal Saline Syringe (Flush); IV NS; infusion set or saline lock Verify and examine for sterility, seal, leak, cloudiness, contamination, other damage, and expiration date ☐ BD Nexiva or appropriate size catheter and extension tubing (J Loop): If using J loop, prime tubing and leave flush attached. BD Nexiva does not require priming as blood will fill tubing prior to flush. ☐ Select appropriate IV catheter: Depends on the purpose of the IV; rate of fluid flow needed; suitability of peripheral veins/site selection; age and pt size (adult vs. pediatric) General guidelines: - 22-24 gauge: Peds/older adults: most infusions - 20 gauge: Adult/larger child: Most infusions - 18 gauge: Adult; rapid fluid replacement; suspected stroke prior to CT - 14 to16 gauge: Adult in shock needing rapid fluid replacement or blood transfusion		
Prepare the patient: ☐ Explain procedure to patient ☐ Gain consent from decisional adult		
State the purpose of IV access: Allow fluids, medications and other therapies such as blood products to be introduced directly into a peripheral vein		
Aseptic Procedure: ☐ Observe strict universal precautions & aseptic technique throughout catheter insertion procedure		
Site selection/preparation: ☐ Expose extremity, inspect, and palpate for best veins. Preferred veins are straight, distal (unless AC site specifically recommended) and non-branched (venous valves are commonly near branching points). Consider asking patient where their best veins are located. Antecubital site is preferred for high volume rapid fluid resuscitation, pts who require adenosine, or suspected stroke needing IV for CT infusion. Site selection may be more difficult in children and pts who are obese, pregnant, have dark-toned skin, those in shock or whose veins have been compromised by previous chemotherapy or by IV drug abuse. Avoid limbs with suspected local infection, compartment syndrome, musculoskeletal trauma, burns, or compromised skin at the intended site; previous impairment of lymph node fluid clearance (post radical mastectomy), arteriovenous fistula or dialysis shunt, or deep vein thrombosis. ☐ Apply venous tourniquet 4”-6" proximal to the selected IV site to engorge the vein. It should feel spongy and non-pulsatile on palpation. Veins that feel hard are more likely to be thrombosed and pulsatile flow indicates an artery rather than a vein. Never leave in place for more than 2 minutes. Distal pulses should remain palpable. ☐ Lightly palpate veins with index finger and identify best option. If it rolls or feels hard and rope-like, select another vein. Avoid points of flexion if possible. If vein is easily palpable but not sufficiently dilated: - Place extremity in a dependent position - Have patient open and close fist several times - Tap gently over vein with your finger. **Do not slap,** it will collapse the vein. ☐ Prep site with CHG/IPA skin prep. Use sufficient friction to ensure the solution reaches into the cracks and fissures of the skin. Allow site to dry. ~20-30 seconds ☐ Do not contaminate by touching site after cleaned		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
Catheter insertion: ☐ Remove protective cap from needle in a straight outward manner keeping catheter sterile ☐ Loosen catheter from needle. Pull for Nexiva; twist for others. Failure to do so may affect needle retraction. ☐ Inspect needle tip for defects ☐ Anchor vein with thumb distal to insertion site, stretching the skin near the vein Do not place thumb directly over the vein or blood flow will be occluded and the vein will flatten If using a hand vein, slightly flex patient's wrist. ☐ Hold catheter with thumb and index finger of dominant hand ☐ With the bevel up, smoothly insert needle through skin and vein at a 15°-30° angle. Take care not to enter too fast or too deeply as the needle can pass through the back-side of the vein ☐ Observe for blood return. Nexiva flash is observed in the clear catheter; others have a flashback chamber. ☐ If vein is successfully cannulated, lower catheter angle, advance needle and catheter 1/8th inch to ensure proper tip positioning in vein ☐ If no flash observed, withdraw needle and catheter slightly and re-attempt insertion into vein. Use caution not to withdraw needle tip completely out of skin. If this does occur, discontinue this site. ☐ If vein is missed or blows, retract needle, apply direct pressure/dressing, and try again with a new catheter at an alternate site proximal to original insertion if same limb. Limit to 2 attempts, unless authorized by OLMC for additional attempts. Use proximal humerus IO if critical need for IV fluid replacement or IV drug route unless pt in cardiac arrest; then use tibial IO approach.		
If flash observed: Catheter advancement: ☐ Hold needle stationary and advance catheter off the needle into the vein up to its hub ☐ **Release tourniquet** - Failure to release before needle retraction may result in blood exposure with open catheters.		
Needle retraction: **BD Nexiva Closed Catheter:** ☐ Slightly retract needle. Allow tubing to fill completely with blood. Placement confirmed. (tubing will not fill if missed) ☐ Retract needle completely and remove from hub by pulling white end ☐ Clamp tubing; remove air valve and attach flush with provided luer lock tip **Open Catheters**: ☐ Put gauze pad under catheter hub; apply digital pressure directly proximal to catheter tip w/ one fingertip and stabilize colored hub with another fingertip without contaminating needle insertion site. If not done properly will result in bleeding from catheter. ☐ Glide the protective guard over the needle (listen for "click" that confirms safety lock) or push button to retract needle into clear safety shield. ☐ Remove encased, locked needle from the catheter hub ☐ If unable to engage needle safety lock, withdraw needle & place into sharps container ☐ Remove protective cap on extension tubing, connect luer lock end onto catheter hub, and release digital pressure; twist luer lock onto catheter hub to secure ☐ *Immediately discard shielded needle into sharps container if possible or place in a safe place. Maintain sharps accountability, and discard into sharps container as soon as possible.		
Flush and establish IV flow: ☐ While continuing to hold the IV catheter administer 10 mL NS flush ☐ Observe for infiltration. If present, discontinue IV and apply direct pressure/bandage ☐ If no infiltration observed, flush until line is clear and engage extension tubing clamp		
Dressing/Stabilization: ☐ Clean up blood at site with a gauze/chlorhexidine pad. ☐ Apply Tegaderm/transparent dressing: Peel lining from transparent dressing exposing adhesive surface, center dressing over catheter site, apply over dry skin without stretch or skin tension and leave IV tubing connector to colored hub free. Slowly remove the frame while smoothing dressing from center to edges using firm pressure to enhance adhesion. ☐ Secure IV extension tubing w/ tape. Do not tape over IV connection or conceal hub connection. ☐ Clean up and discard wrappers and disposable components after procedure completion		
Document insertion site, # of attempts as successful or unsuccessful, catheter gauge, time started, IV fluid, flow rate and amount infused if applicable. Label IV bag.		
Drug administration and Maintenance: ☐ Nexiva provides 2 ports without tubing and is very effective for rapid IVP. ☐ To administer a drug, unclamp tubing, push drug per SOP, follow with a NS flush, and re-clamp First 1 mL of flush contains drug leftover in extension tubing. Continue proper push rate for initial 1 mL of flush.		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
☐ If necessary, select appropriate size IV bag and solution, spike & prime tubing o Remove infusion set from package; uncoil tubing; close clamp, remove spike protector without contaminating spike or the needle adaptor. o Turn IV bag upside down with IV & medication ports facing up; remove cover from IV port, maintain sterility of port o Insert tubing spike into IV port with a pushing and twisting motion until it punctures seal. o Invert bag. Grasp IV set at drip chamber and squeeze. Fill chamber ⅓ to ½ full or to fill line. o Open clamps and/or flow regulator to flush (prime) line with NS. Remove all large air bubbles from tubing. Empty IV tubing contains ~30 mL of air. This could cause a lethal air embolus if all infused into the patient. o Clamp tubing shut. Recap end if removed to flush tubing. o Hang IV or have someone hold bag. o Wipe end of extension set with CHG/IPA prep and attach tubing to saline lock ☐ If blood is observed in extension tubing, flush until clear and ensure clamp is engaged Do not allow stagnant blood to sit in tubing set ☐ Communicate location, size, and type of peripheral access to ED staff during handover report		
Competency Check: ☐ State 2 signs of infiltration: ☐ IV does not flow ☐ Local swelling ☐ Site pain/burning ☐ State methods to determine patency or check retrograde flow: ☐ Aspirate; observe blood return with no resistance ☐ Drop bag & tubing below IV site ☐ State methods to troubleshoot poorly running line (see options below) ☐ State 3 complications of an IV (see below)		
Actual time for each attempt from start to finish:		
Critical Criteria - Check if occurred during an attempt ☐ Failed to establish a patent and properly adjusted IV within 2-minute time limit ☐ Failed to maintain aseptic technique; contaminated equipment or site w/o correcting the situation ☐ Performed an improper technique resulting in potential for uncontrolled bleeding, catheter shear, or air embolism ☐ Exhibited unacceptable affect with patient or other personnel ☐ Used or ordered a dangerous or inappropriate intervention		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 2/24

Preceptor (Print Name & Signature)

If IV does not flow, consider the following causes:

☐ Tourniquet still on and in place
☐ Patient's extremity is flexed
☐ Flow clamp closed
☐ Height of IV bag too low
☐ Needle not patent (clot formation)
☐ Tip of catheter is abutted against a valve or vein wall
☐ Tubing kinked or pinched
☐ Completely filled drip chamber
☐ Air vent not patent

Complications:

☐ Catheter shear and potential plastic embolism
☐ Thrombophlebitis (redness and pain)
☐ Extravasation (leakage of fluid/infiltration)
☐ Bruising/ecchymosis at the puncture site
☐ Infection, both localized and systemic
☐ Volume overload

Trouble-shooting a malfunctioning IV:

☐ Ensure tourniquet has been removed Check tubing for kinks; all flow clamps to ensure that they are open
☐ Pull catheter back 1/8" and ¼" Aspirate extension tubing or lower IV bag below pt to check for blood return
☐ Inspect the IV site for S&S of infiltration Move the limb or immobilize on arm board to stabilize a positional line

RG 03/18

NWC EMSS Lab Skill Performance Record

INTRAOSSEOUS ACCESS USING EZ IO

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

A patient presents unconscious in septic shock. You are asked to assemble the equipment and achieve vascular access via the IO route using an EZ-IO driver.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***Verbalizes indications for IO infusions** ☐ Acute life-threatening or medically necessary situations urgently needing IVF or IV meds, esp. if circulatory collapse; difficult, delayed, or impossible venous access; or conditions preventing venous access at other sites. May be used in cardiac arrest or severe shock. ☐ States total # of attempts per site (bone) (1) ☐ Benefits of proximal humerus: Faster flow rates; ave. flow rate of 5 L/hour under pressure for humerus, 1 L/hour for tibia; reach the heart with medication or fluid in three seconds		
***Verbalizes CONTRAINDICATIONS** for IO infusions at first selected site (use alternate sites) ☐ Fracture of the bone selected for IO infusion ☐ Infection at selected site ☐ Previous significant ortho procedure at or near insertion site (joint replacement, *IO within 48 hrs, prosthetic devices*) ☐ Pre-existing condition (tumor near site, severe osteoporosis or other bone abnormality; severe PVD) ☐ Excessive tissue; absence of adequate anatomical landmarks (obesity, tissue edema)		
Prepare patient: If pt. conscious, advise of emergent need for procedure		
*** Select appropriate IO needle set; prepare and assemble equipment** ☐ EZ-IO reusable cordless driverl powered by lithium batteries (✓ battery-power indicator light) ☐ IV NS; reg. drip tubing ☐ Pressure infuser bag (1 L IV bag) ☐ PPE/Sharps container ☐ 2 luer lock syringes w/ sterile NS to prime connect tubing & flush IO: 10 mL (adults), 5 mL (infant/child) ☐ Conscious pt: 2% IV Lidocaine(100 mg/5 mL) preservative & epinephrine free ☐ EZ Connect tubing ☐ Skin prep: Chlorhexidine (CHG 2%)/(IPA 70%) ☐ EZ-IO® needle sets: o 45 mm (Yellow) proximal humerus; ≥40 kg with excessive tissue over insertion site o 25 mm (Blue) >3 kg o 15 mm (Pink) 3-39 kg (children) ☐ Arrow® EZ-Stabilizer® Dressing		
* BSI: Universal precautions: gloves and eye protection; perform hand hygiene		
* **If IV challenges needed**: Due to anatomy of IO space, flow rates slower than per IV catheter but natural gravity flow keeps line open. A 10mL NS rapid bolus/flush w/ syringe improves flow rates. If fluid challenges are required: Insert IV bag into a pressure infuser, prime IV tubing; inflate pressure infuser to 300 mmHg.		
* **Prepare equipment/supplies:** ☐ Inspect needle set packaging to ensure sterility, check expiration date on package ☐ Prime EZ-Connect Extension Set: Attach sterile NS filled syringe to EZ-Connect ® extension tubing; unlock clamp; prime tubing (requires 1 mL; leave at least 9 mL NS in syringe); purge air; leave syringe attached to EZ Connect tubing with set unclamped ☐ Open EZ-Stabilizer package ☐ Attach Needle Set to EZ-IO Power Driver (magnetized) and remove Safety Cap from Catheter; momentarily power drill – do not touch needle		
* **LOCATE INSERTION SITE (See below):** Position pt and palpate site(s) to identify appropriate anatomical landmarks and needed needle size. **System-approved sites:** ADULTS (≥12 years old): Proximal humerus; proximal tibia PEDIATRICS: Proximal tibia and distal femur (all peds ages); proximal humerus (>5 years)		
* Cleanse site using CHG/IPA prep; allow to air dry 30 sec. Use clean, "no touch" technique, maintaining asepsis.		
* Stabilize extremity with non-dominant hand;		
☐ Proximal humerus – Aim the needle at a 45° angle to the anterior plane and posteromedially ☐ Tibia and femur: Aim needle at a 90°angle to the center of the bone		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
☐ *With other hand, hold driver w/ needle set attached. Gently press needle tip through skin and soft tissue until tip touches bone. Black lines on the needle serve as depth markers; 5 mm marker must be visible above skin prior to powering driver to ensure adequate needle length for proper placement. If not visible, consider alt. site/ longer needle. ☐ Activate driver by squeezing the handgrip trigger. ALLOW DRIVER AND NEEDLE to DO the WORK; maintain gentle steady, consistent, pressure on driver. ☐ If driver slows down, lighten pressure on driver ☐ If pt. <40 kg: do NOT push – gently guide to avoid penetration through posterior bone. Note: Bones of young children are not fully ossified and may not "give' when the needle pierces the outer shaft and enters the bone marrow. ☐ **If driver fails: Insert needle manually using gentle twisting motion** ☐ Release trigger when a sudden give or pop is felt (indicates entry into the medullary space); the needle set will not always be inserted to the hub.		
* Once inserted, hold hub in place; detach driver from needle set by pulling straight off of hub. Leave the stylet and cannula firmly seated in the bone.		
☐ Continue to hold hub and **remove stylet** by rotating counterclockwise. Place directly in sharps container. NEVER return used stylet to the EZ-IO needle set. ☐ Remaining catheter has a standard Luer lock hub. Needle should feel firmly seated in bone (do not rock needle) (1st sign of confirmation) ☐ Place EZ stabilizer dressing over the catheter hub ☐ Connect primed extension set to catheter hub with clamp open; secure by twisting clockwise ☐ Pull tabs off of EZ stabilizer dressing to expose adhesive and secure to skin		
☐ **Confirm placement**: *Attempt to aspirate bone marrow (w/ syringe attached to primed EZ Connect tubing; If successful, do not remove more than 1 mL. Inability to aspirate marrow is NOT a reliable indicator of unsuccessful placement. ☐ Assess ability of the needle to maintain its position without support; asses for infiltration and tissue swelling with infusion of fluids (these findings may not always be present or reliable). ☐ Prevent needle movement – do not attach syringe directly to IO needle		
Conscious/responsive pts (before NS flush): Remove NS syringe on connecting tubing and replace w/ syringe containing 2% preservative-free and epinephrine-free lidocaine. Prime extension set with lidocaine. Note: priming volume of the EZ-Connect Extension Set is ~1 mL. For small doses of lidocaine in peds, consider giving by carefully attaching lidocaine syringe directly to needle hub (prime EZ-Connect Extension Set with NS) ☐ **LIDOCAINE 2%**100 mg/5 mL**: ADULT:** 1 mg/kg (max 50 mg - 2.5 mL) **| PEDS:** 0.5 mg/kg (max 40 mg - 2 mL) Push ***slow***ly over 2 min BEFORE NS flush, unless contraindicated. Allow lidocaine to dwell in IO space 60 sec. If needed; slowly give an additional 0.5 mg/kg (max doses as above) IO over 60 sec.		
☐ **Flush the EZ-IO Catheter with normal saline** (5–10 mL for adults; 2–5 mL for infants/children). ☐ May require multiple flushes. Observe for swelling around site. ☐ **If placement in doubt**: leave needle in place w/ connecting tubing & syringe attached (for ED to evaluate placement) & attempt IO on alternate site, or IV		
☐ *Attach IV tubing to EZ connect tubing, and begin infusion. If IVF challenges indicated, reassess and readjust pressure (300 mmHg) in infuser device as IV bag volume reduces. ☐ *Do not exceed calculated IV fluid challenge volume if indicated.		
☐ Secure tubing to extremity with tape. If proximal humerus: Secure arm in place across the abdomen.		
Apply wristband to pt. w date & time (reminds hospital to remove w/in approved time limits.		
* Monitor IO site, fluid infusion rate, and pt. condition. Verbalizes at least 1 complication of IO access.		
Critical Criteria - Check if occurred during an attempt ☐ Failure to take or verbalize appropriate BSI precautions prior to performing IO puncture ☐ Failure to identify the correct insertion site and/or correct size needle ☐ Failure to stabilize the limb/site and insert needle through skin to rest on bone prior to inserting into the bone ☐ Pushing down too hard on the driver and slowing needle insertion ☐ Twisting driver when removing from needle hub ☐ Failure to give lidocaine into IO line prior to fluid infusion if responsive ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Failure to assure correct needle placement or detect early signs of infiltration] ☐ Failure to successfully establish IO infusion within 2 attempts during 6-minute time limit ☐ Failure to properly dispose of blood-contaminated sharps at the point of use ☐ Uses or orders a dangerous or inappropriate intervention		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

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CJM 2/24

Preceptor (PRINT NAME – signature)

Finding insertion sites:

Proximal Tibia (peds & adults)

- Extend patient's leg; Palpate insertion site ~2 cm medial to the tibial tuberosity or ~3 cm below the patella and ~2 cm medially along the flat aspect of the tibia

Proximal Humerus (older children & adults)

- Place patient's hand over abdomen (elbow adducted and humerus internally rotated)
- Place palm on the patient's shoulder anteriorly to identify the "ball" under the palm as the general target area
- Place ulnar aspect of rescuer's hand on upper arm vertically along the anterior axillary line
- Place ulnar aspect of rescuer's other hand vertically along midline of upper arm (see illustration below)
- Place thumbs together over arm – identify vertical line of insertion on proximal humerus
- Palpate deeply as you climb superiorly up surgical neck of humerus
- Feel for a golf ball – where T meets ball is the surgical neck
- Insertion site on most prominent aspect of greater tubercle of humerus (1-2 cm above surgical neck)

Distal Femur (Infant/Child)

- Secure the leg out-stretched to ensure the knee does not bend
- Identify patella by palpation. Insertion site is just proximal to the patella (maximum 1cm) and ~1–2 cm medial to midline

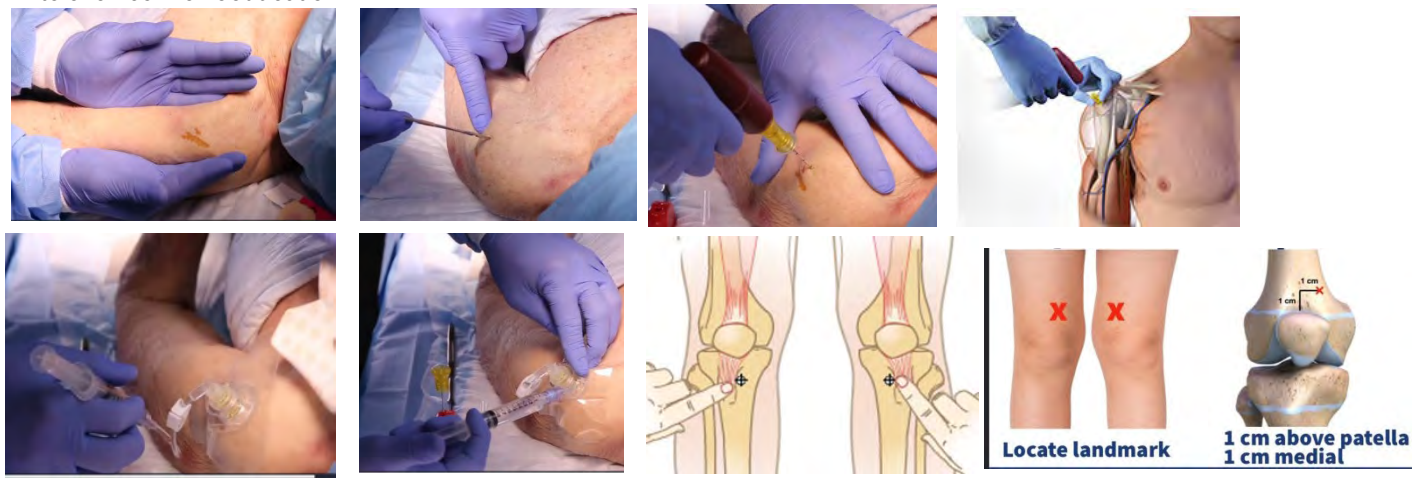
Small children - caveats	**Consider tissue density over the landmark desired)** ☐ **Proximal Tibia -** If NO tuberosity is present, insert ~4 cm below patella and medial along the flat aspect of the tibia. If the tuberosity IS present, the insertion site is ~2cm medial to the tibial tuberosity along the flat aspect of the tibia. Carefully feel for the "give" or "pop" indicating penetration into the medullary space. Studies show high percentage of malpositioning – consider distal femur as preferred site. ☐ **Proximal Humerus – See above; plus** *the proximal humerus may be difficult or impossible to palpate in children < 5 years of age as the greater tubercle has not yet developed. In these cases the insertion will most likely be a shaft insertion. Not the preferred route in small children.*

Complications of IO access

☐ Assesses for signs of extravasation of meds or fluids into the soft tissue from a misplaced IO device (can lead to compartment syndrome)
☐ Fractures caused by the intraosseous insertion (rare)
☐ Osteomyelitis uncommon and not associated with marked morbidity or mortality. Generally associated with poor aseptic technique, leaving the IO device in place for >24 hours, and multiple IO attempts at the same site.
☐ Fat embolus is a theoretical risk, but has not been reported in humans.

IO infusion is possible due to veins that drain the medullary sinuses in the bone marrow of long bones. These veins do not collapse in patients with shock or hypovolemia. The following are the most commonly used sites (UpToDate, 2022):
Proximal tibia – Popliteal vein | Femur – Branches of the femoral vein | Proximal humerus – Axillary vein

www.teleflex.com/ezioeducation



NWC EMSS Skill Performance Record

SAPPHIRE® INFUSION PUMP

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

The NWC EMSS requires that the Sapphire® Infusion Pump only be used by qualified EMS personnel who have received appropriate education and have been competencied in using the device.

Performance Standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***States INDICATIONS for use**: To be used as an adjunct to the administration of IV or IO medications that involve the process of counting drips, manual administration of medications via (IV/IO) piggyback (IVPB) or by slow IV/IO push (slow IVP) over a set period of time or administering IV medications in a set bolus amount.		
***States CONTRAINDICATIONS**: Do NOT use Sapphire® Infusion Pump in the following cases: ☐ IV/IO site is not patent ☐ Selected medication is not listed within the NWC EMSS Sapphire drug library		
***States possible SIDE EFFECTS of using the device:** Medication infiltration if the IV/IO site is not patent, leading to possible necrosis, infection or other complications		
***Pump anatomy: Explains meaning of User Control Panel keys** **Designed with a full-color touchscreen,** **ON/OFF**: Device will power up/ power down when this button is pushed for 1 second. When the device powers up, the Sapphire logo shows on the screen and device automatically does a self-test. When self-test is complete, the device will show the Start Up screen. This takes ~3-5 seconds. 		
STOP: ☐ When STOP button is pushed, the infusion will be immediately paused. **To STOP an Infusion in an emergency:** ☐ Stop the pump operation by opening the safety door, closing the clamps on the IV tubing, removing the administration cassette from the pump or disconnect the IV tubing from the patient. 		
INDICATOR LIGHTS: The three LED lights to the right of the screen are indicator lights. ☐ Flashing **RED** Light (Top): Alarm is activated ☐ Flashing YELLOW Light (Middle): Battery is charging ☐ Solid YELLOW Light (Middle): Battery is fully charged ☐ Flashing **GREEN** Light (Bottom): Pump is running 		
BATTERY INDICATOR: Rechargeable, energy-efficient battery is rated for up to 24 hours of use. **Features:** 5 bars show battery charge status • 5 bars: 100% battery life remaining • 4 bars: 75% battery life remaining • 3 bars: 50% battery life remaining • 2 bars: 25% battery life remaining • 1 bar: Low battery Verbalizes that an alarm is triggered when there are 30 minutes left until battery depletion. This time may depend on the delivery rate, the frequency of pressing keys, and whether the backlight is On. When the Battery Depletion alarm sounds, connect pump to a power supply. 		

Performance Standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
Sensors: Air-in-line: detects single and accumulated bubbles sized 0.02–0.5 mL; upstream/downstream occlusion; door open; temperature. **Alarm parameters:** Air in line, Cassette misplaced, Occlusions, Check for occlusion, Downstream occlusion, Upstream occlusion, Flow error, Insufficient battery. Occlusion Alarm Pressure: Up to 17.4 PSI (1.2 Bar). **Messages**: Battery issues (low battery, when battery life will expire, battery not fully charged), annual certification, cassette door open, infusion status (complete, near end), pump inactive **When an alarm sounds,** the device will immediately emit an audible signal; the RED LED light will flash and provide a message on the screen with the error and a suggested resolution. Follow the suggested resolution and then press OK. If still unresolved, discontinue use of the device by removing the administration cassette from the pump. Alarm volume may be configured to maximum or minimum. When option is set to minimum, messages are provided with a visual signal only. **Do not disable alarms**.		
Device Care and Maintenance: Follow manufacturer's recommendations regarding preparation of device, insertion of cassette for IV tubing, cleaning and charging battery.		
PROCEDURE		
Inspect tubing and medication dose		
Turn the Pump On: Depress the On/Off hard key, in the lower right corner of the pump. If auditory and/or visual signals do not perform according to settings, or if the hard keys do not perform as expected, do not use the pump and contact your PEMSC.		
Open the Cassette (safety) Door: Cassette door not integral to pumping process ☐ Using your thumb, press the gray latch. ☐ While maintaining pressure, swing the safety door outwards.		
Insert the Administration Cassette: ☐ Verify all clamps are closed. ☐ Arrow on the cassette must point towards the bottom of the device. ☐ At an angle, place the saddle on the round metal anchor and clip the upper end of the administration cassette into the metal lock. ☐ Ensure that the flanges are positioned on both sides of the administration cassette and the entire cassette is inside the administration cassette housing. ☐ **Close the safety door** over the administration cassette. ☐ Ensure that the safety door clicks upon closure and is secure.		
Prime the Device: Designed with quick priming capabilities. Priming expels all air from the administration set and fills it with infusion fluid/medication. ☐ Spike the bag; Optimum bag height above the pump is 20 inches (50 cm) ☐ Before priming the device, verify that the: - administration set clamp is open and there are no occlusions; - administration cassette is properly connected to the device - safety door is closed; and - administration set is DISCONNECTED from the patient: When the PRIME button is activated, a Red warning screen will show to ensure the tubing is not connected to the patient. ONLY prime device with the tubing DISCONNECTED from the patient. ☐ From the toolbar of the Start-up screen, press Prime ☐ From the Attention screen displayed next, press OK. Priming begins – While device is priming, a progress circle appears on the screen with a time countdown is displayed. ☐ Ensure fluid, not air, enters the administration set and all air in IV set is replaced by fluid. Default priming amount 8 mL; time is 2 minutes. ☐ The pump automatically indicates when priming is complete. Priming can be stopped by pressing FINISH PRIME in the lower right hand corner of the screen and then OK from the confirmation screen ☐ Allow device to run through its entire priming process and stop automatically. Fluid/ medication will start to drip from the end of the tubing. ☐ Once Priming is complete, press the Finish Prime/OK button | Connect to patient		

Performance Standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
Select Medication & Begin Infusion:  ☐ Select patient demographic (Adult vs. Pediatric) ☐ Select New Infusion ☐ Select medication from drug list. Confirm volume of medication matches volume of Normal Saline used for medication administration, 50 mL preferred. ☐ Enter and verify information on Confirmation screen: Multiple authorization levels ensure greater safety - Medication - VTBI (Volume To Be Infused) - Concentration ☐ Cross check: Verify information on Confirmation screen with second paramedic ☐ Press/Activate **START** button ☐ **Verify device is running** by seeing RUNNING in the top left of the screen, a progress circle showing at the top center of the screen and the **GREEN LED** light is flashing		
Begin Bolus Infusion: Verbalize how to identify which medications are weight-based ☐ From the medication running screen, select Bolus ☐ Enter patient weight ☐ Enter and verify information on Confirmation screen: Multiple authorization levels ensure greater safety: Medication - VTBI (Volume To Be Infused) - Concentration - Pt weight		
Pausing Infusion: ☐ From the toolbar, press PAUSE, then select OK. After 30 seconds an attention screen will appear and an auditory alarm will sound. Select OK. Or, at the bottom of the pump, press STOP and the infusion will pause. ☐ Verify that the screen shows PAUSED **Restarting (resuming) infusion:** ☐ From the toolbar, select CONTINUE. From the toolbar of the running screen, select OK. ☐ The main display appears and the infusion resumes. ☐ Verify device is running by seeing RUNNING in the top left of the screen, a progress circle showing at the top center of the screen and the GREEN LED light is flashing		
To remove cassette: When the infusion is done, disconnect administration set from patient, close clamps and disconnect administration cassette by raising the metal lock that secures it to the pump		
Turn off pump: Press and hold the ON/OFF key for five seconds		
CHARGING THE BATTERY: The pump can operate while it is being charged. To preserve battery life, connect pump to a wall outlet using the power supply cord, when possible. To charge: ☐ With the white arrows facing up, plug the plastic end of the power supply cord into the Sapphire pump power socket ☐ Plug the other end of the power supply cord into a wall outlet. On the front of the pump, verify that the Charge LED status indicator is ON (blinking yellow light). The yellow LED will remain steady on when battery is fully charged.		

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Rating: (Select 1)

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SAR/CJM Rev. 9/1/22 Preceptor (Printed Name & Signature)

Features: SAPPHIRE MULTI-THERAPY PUMP

Dimensions:	5.63” (14.3 cm) H x 3.78” (9.6 cm) W x 1.93” (4.9 cm) D
Weight:	14.7 (0.4 kg) oz without battery
Power	Battery life: 24 hours at 125 mL/hr
Power requirements:	100-240V, 50-60Hz, 0.6 A
Recharge time:	up to 6 hrs (when pump is not in operation)
Volume range:	1 - 9999 mL (increments of 1 mL)
Delivery rate accuracy:	± 2.5% (subject to external conditions)
Delivery rates:	0.1 - 99.9 mL/hr with increments of 0.1 mL/hr; 100 - 999 mL/hr with increments of 1 mL/hr
KVO Rate:	Up to 20 mL/hr with increments of 0.1 mL/hr

https://homecare.med.umich.edu/Document/View/1098

NWC EMSS Skill Performance Record

Peripherally Inserted Central Catheter (PICC) | Central Line Access

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Caveat: PICC Lines may only be accessed by those PMs/PHRNs that have received prior education, competency assessment, and authorization from the EMS MD.

Performance standard 3 Step omitted (or leave blank) 4 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 5 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
* **Types of venous access devices**: Peripheral venous access device (PVAD)-Short, Midlines, and Central venous access devices (CVADs) that include PICCs and Percutaneous Non Hemodialysis Lines State purpose of a **PICC line:** Long IV catheter that extends from an arm vein (e.g. basilic, cephalic or brachial) into the superior vena cava and typically provides central IV access for several weeks/months. The basilic vein is preferred as it offers the largest diameter of upper extremity vessels and affords a non-tortuous entry into the subclavian vein. The most appropriate location for the tip of PICCs is the lower one-third of the superior vena cava (SVC), close to the junction of the SVC and the right atrium. Extremely flexible, affords patient nearly full use of the extremity. Normally secured by a suture to the skin at the hub and three-way bifurcation anchor point, or using a sutureless fixation/securement device (preferred). They have one or two lumens (ports). **Indications**: long-term med administration (chemotherapy, antibiotics) or blood transfusions		
CVAD, non-valved (e.g., percutaneous, tunneled, PICC) **Central venous access device catheters** are a larger gauge and are designed to be placed into a large, more central vein such as the jugular or the femoral veins. Examples include HICKMAN, BROVIAC and GROSHONG catheters. Dialysis catheters are also central line catheters. Central line catheters normally have 2 or 3 lumens (double or triple lumen). On Multi-lumen catheters the **blue** hub typically identifies **venous access.** If catheter type is uncertain, ask the pt or a family member before attempting catheter use. If IVs are not being infused, they are often **locked**. Locked lumens require care and maintenance to allow them to remain patent until the next time they are needed. Peripheral venous access device (PVAD)-short cannulas that are locked are commonly referred to as a **saline lock**. CVADs are referred to as being either capped or locked; “a locked PICC,” “a capped percutaneous non hemodialysis CVAD,” or “a PICC with one capped lumen and two accessed lumens.”		
* **Verify indications for EMS access**: PMs may access PICC lines if functioning correctly and located in an extremity, to give IV meds and/or IVF if peripheral IVs are unsuccessful or not advised based on OLMC order. This usually implies a critical pt who is not a candidate for IO access.		
Due to the length of the catheter and the internal lumen diameter, PICC lines should not routinely be considered 1st line for rapid fluid resuscitation. Consider need for IO access.		
***State contraindications for EMS access** ☐ Central line catheters located in the neck, groin, or chest areas ☐ Dialysis catheters (rapidly attempt IO access)		
Prepare patient: Question re: any concerns over using their catheter. Explain procedure, confirm their understanding, and gain consent.		
Supplies needed to access: ☐ 3 CHG/IPA skin prep wipes ☐ IV set up with 1000 mL NS ☐10 mL syringe for aspiration ☐ Prefilled NS10 mL syringe ☐ Non-sterile gloves ☐ Sharps container		
Precautions: Most catheters are constructed of material that is pliable and fairly resistant to breakage, tearing, kinking, etc. However, this does occur. Always ☐ Inspect the catheter for tears or breaks and visible kinks. ☐ Check for bleeding around the site. Bleeding may be a sign of catheter dislodgement.		

Performance standard 3 Step omitted (or leave blank) 4 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 5 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
☐ Assess site for evidence of complications. If IV site is red, tender, swollen, and/or leaking, do not flush. A catheter that has migrated externally should not be readvanced.		
PROCEDURE		
Perform hand hygiene with an antiseptic-containing soap solution or use an alcohol-based waterless cleanser | apply gloves. Use aseptic technique and observe universal precautions throughout procedure. Protect catheter hub from becoming contaminated.		
Aggressively cleanse the needless cap including the luer locking threads for 15 seconds with a disinfectant wipe and friction. Allow to air dry for 15 seconds. Do not wipe blot, or blow onto site to dry it faster.		
Open clamp on extension tubing if present		
☐ **Check line patency by aspirating**. On a PICC, midline, and percutaneous non hemodialysis CVAD aspirating should reveal blood flashback into the tubing. Attach an empty 10 mL syringe to the port and attempt to withdraw ~10 mL of blood (should aspirate freely using a pull-pause technique). ☐ If blood is aspirated: Discard syringe into the sharps container, ☐ **If blood cannot be aspirated, remove the syringe and discard into the sharps container, DO NOT use the catheter for access.** Notes: Aspiration will remove any small clots that may have formed at the tip of the catheter. Also if the catheter had been flushed with any medication (heparin or NS), the residual will be removed. PICC lines do not require flushing with heparin after each use. Some hospitals and/or organizations require heparin flush in their protocols. Never assume a PICC line was flushed with NS after its last use. Flushing the line after each use helps to prevent formation of blood clots either in the catheter or at its tip in the vein. Inadvertently flushing a line rather than aspirating prior to use might result in bolusing the patient with heparin that may be in the catheter line. This can lead to possible serious consequences for the patient.		
FLUSH: Connect the prefilled 10 mL syringe of NS to the hub ☐ Flush catheter using a push-pause technique (1-2 mL NS boluses with short pauses in between to create turbulence and clear the catheter of blood or drugs that may adhere to the inner lumen). Use slow, steady, moderate pressure. Do not push too hard or catheter could flip up into the internal jugular vein. ☐ Observe site for infiltration, leaking, pain, or resistance. If resistance is felt, do not force the flush. Never attempt to flush a "blocked" lumen. ☐ Syringes with an internal diameter smaller than a 10 mL syringe can produce higher pressure in the lumen and rupture the catheter). ☐ Do not empty the syringe (leave 0.2 to 0.5 mL of fluid in the syringe). ☐ Remove syringe from the needleless cap; THEN clamp the extension tubing.		
Scrub the hub again for 15 sec with a disinfectant wipe. Allow to air dry for 15 seconds. Do not blow onto site to dry it faster. Connect the end of the IV tubing to the hub and begin IVF infusion; adjust rate to pt's needs.		
Give all medications through the IV ports on the IV tubing. Secure the IV tubing to the patient below the PICC connector for added safety.		
The goal of locking an IV line is to fill the catheter entirely and preserve its integrity for future use		
Most PICC lines have a needleless cap on the end. If you need to recap a needless line, the patient may have spare sterile caps or use a IV saline lock adaptor.		
Moving a patient: Risk of catheter displacement. Ensure adequate tubing length and that the catheter itself is not caught on side rails or other objects prior to moving. Extra tape and/or dressing material should cover the area of IV tubing before the PICC Line.		
If a catheter is accidentally removed, place firm pressure on the site for at least 10 minutes with several 4 x 4s and/or a trauma dressing to control bleeding.		
State the complications that may occur ☐ Infection -due to the location of the catheter, strict adherence to aseptic technique is crucial. ☐ Air embolism –catheter provides a direct line into the circulation, introduction of air into these devices can be hazardous.		

Performance standard 3 Step omitted (or leave blank) 4 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 5 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
☐ Thrombosis -a blood clot within the vascular system can be caused by improper handling and maintenance of the catheter; dislodging a clot can cause a pulmonary embolus or vascular damage.		
Critical Criteria - Check if occurred during an attempt ☐ Failed to take appropriate BSI precautions prior to/while performing catheter access ☐ Failed to maintain aseptic technique and contaminated equipment or site without appropriately correcting the situation ☐ Performed any improper technique resulting in potential for harm ☐ Failed to dispose of blood-containing syringes in proper container and reasonable time. ☐ Exhibited unacceptable affect with patient or other personnel ☐ Used or ordered a dangerous or inappropriate intervention		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 11/23

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

DRAWING UP MEDICATION FROM A GLASS AMPULE

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: An adult needs a medication that comes packaged in a glass ampule. You are asked to give 0.5 mL of the drug. Assemble the equipment and draw up the appropriate dose from the ampule.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***Verbalize the 7 rights of medication administration: RIGHT:** ☐ Person ☐ Drug ☐ Dose ☐ Route & site ☐ Reason ☐ Time ☐ Documentation		
* Apply appropriate PPE		
Prepare equipment/medication ☐ Medication ☐ Sharps container ☐ Syringe/ filtered needle or straw ☐ Gauze pad		
*Inspect medication packaging to confirm drug name, integrity of the ampule; concentration, dose, and expiration date. ☐ *Inspect solution for clumping, frosting, precipitation, and change in clarity or color ☐ *Calculate appropriate amount of medication for administration ☐ *Select approp. syringe & needle size for volume of fluid to be withdrawn & route of administration ☐ *Remove pre-attached needle from syringe& attach a filtered needle without contaminating either needle ☐ Gently tap upper portion of ampule ☐ Place 4X4 over top of ampule, cover scored portion where the ampule should split apart ☐ Hold medication-filled bottom cylinder in non-dominant hand ☐ *Grasp the ampule top with dominant hand and quickly snap the 2 sections apart. ☐ *Use aseptic technique when exposing medication to the environment. ☐ *Place ampule top immediately into a sharps container		
Medication removal * Insert sterile filtered needle or straw into liquid medication (may invert ampule – keep tip within liquid to be withdrawn; avoid pulling air into syringe with medication)		
* Withdraw appropriate amount of medication into the syringe. Remove syringe from ampule. Discard used ampule directly into a sharps container.		
* Hold syringe needle up and tap barrel to move air bubble to the top. Eject through needle.		
* Remove filtered needle and discard into a sharps container		
* Attach appropriate needle or IV adaptor for selected route of medication administration		
*Cross check: Reconfirm medication and appropriate dose prepared with another qualified practitioner		
Critical Criteria: Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Performs any improper technique resulting in the potential for patient harm ☐ Failure to dispose/verbalize disposal of sharps immediately in proper container at the point of use ☐ Exhibits unacceptable affect with patient or other personnel		

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Rating: (Select 1)

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CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

DRAWING UP MEDICATIONS FROM A VIAL

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: An adult needs a medication that comes packaged in a glass vial. You are asked to give 1 mL of the drug. Assemble the equipment and draw up the appropriate dose from the vial.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***Verbalize the 7 rights of medication administration: RIGHT:** ☐ Person ☐ Drug ☐ Dose ☐ Route & site ☐ Reason ☐ Time ☐ Documentation		
* Apply appropriate PPE		
Prepare the equipment/medication ☐ Medication vial ☐ CHG/IPA prep ☐ Sharps container ☐ Luer lock syringe ☐ Vent/needle		
* Inspect the medication packaging to confirm the drug name, integrity of the medication packaging; concentration, dose, and expiration date.		
* Open package and verify sterility of medication (all seals in place)		
* Inspect solution for clumping, frosting, precipitation, and change in clarity or color		
* Calculate appropriate amount of medication for administration		
* Select appropriate syringe for volume of fluid to be withdrawn		
* Remove plastic covering from the top of the vial without contaminating diaphragm. Use aseptic technique when exposing medication to the environment.		
Medication removal Fill syringe with air in an amount = to the *mL*s that will be removed. (Some sources omit this step). Connect needle/vent to syringe.		
With vial upright, insert needle/vent into vial, but not into the liquid. Inject air into the vial. Note: If removing medication from a multi-dose vial and this is not the first dose being removed, cleanse vial stopper prior to inserting needle or vent.		
* Withdraw appropriate volume/dose of medication into the syringe. (May invert vial) Remove syringe from vial.		
Hold syringe up and tap barrel to move air bubble to the top. Eject air through needle or vent.		
*Cross check: Reconfirm medication and appropriate dose prepared with another qualified practitioner		
Critical Criteria: Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Performs any improper technique resulting in the potential for patient harm ☐ Failure to dispose/verbalize disposal of sharps immediately in proper container at the point of use ☐ Exhibits unacceptable affect with patient or other personnel		

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Rating: (Select 1)

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☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

Mark I, DuoDote and/or Epi pen Autoinjector

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***Verbalize the 7 rights of medication administration: RIGHT:** ☐ Person ☐ Drug ☐ Dose ☐ Route & site ☐ Reason ☐ Time ☐ Documentation		
* Apply appropriate PPE		
Prepare/assess patient Begin IMC/ITC		
☐ *Confirm the need for Autoinjector use ☐ Confirm the absence of allergy or contraindications to the drug		
Explain drug actions, side effects, and procedure to patient.		
Prepare equipment ☐ Medication ☐ Sharps container		
☐ *Select the appropriate medication, dose, and/or number of auto-injectors for the age/size of the patient and severity of distress ☐ Inspect the auto-injector(s) to confirm the name of the drug, integrity of the container; concentration, clarity & color of the medication, and expiration date		
ADMINISTRATION		
If time allows, prep skin. If urgent proceed w/o skin prep.		
Remove safety cap from injector(s)		
Place tip of auto injector against pt's thigh (Lateral portion, midway between waist and knee)		
Push injector firmly against thigh until it activates		
Hold injector in place until medication is injected		
Discard injector directly into a sharps container		
Record medication name, dose (including concentration), route and time given		
Assess response: Reassess VS, breath sounds, resp. distress, drooling, etc.		
Critical Criteria: Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Performs any improper technique resulting in the potential for patient harm ☐ Failure to dispose/verbalize disposal of sharps immediately in proper container at the point of use ☐ Exhibits unacceptable affect with patient or other personnel		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

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_____

Preceptor (PRINT NAME – signature)

CJM: 12/16

NWC EMSS Skill Performance Record

METERED DOSE INHALER (MDI)

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult needs Proventil given via MDI. You are asked to assemble the equipment, choose the correct medication from those available, and administer the appropriate dose using the MDI technique.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***Verbalize the 7 rights of medication administration: RIGHT:** ☐ Person ☐ Drug ☐ Dose ☐ Route & site ☐ Reason ☐ Time ☐ Documentation		
Prepare/assess patient Initiate Initial Medical Care. (IV not necessary if mild distress)		
*Confirm need for Proventil (hx asthma, c/o SOB w/ wheezing; RA SpO_2 <95%, peak flow in yellow zone)		
Confirm absence of allergy or contraindications to the drug		
Explain procedure to pt: parts of MDI and how to coordinate breathing through mouth with inhaling medication		
Explain that they may feel a little jittery and pulse may increase		
Prepare equipment *Inspect MDI to confirm the name of the drug, integrity of the container; concentration of the medication, and expiration date		
Shake medication canister well (at least 10 times up and down)		
Remove cap from mouthpiece. Check mouthpiece for FB; remove if present.		
If using inhaler for the first time, or they have not used it for more than 7 days, "test spray" it 2 times into the air; avoid spraying into the eyes		
Apply a holding chamber (spacer), if available, between mouthpiece and medication canister		
Ensure that canister is fully and firmly inserted into plastic mouthpiece or holding chamber		
Administer medication Have patient exhale steadily and as comfortably as they can through their mouth		
Hold inhaler upright 1 – 2 inches in front of pt's mouth. If using a spacer, insert MDI into the open space and place mouthpiece between pt's lips and teeth. Seal lips tightly over mouthpiece.		
Have pt breathe in slowly through their mouth and press down on inhaler once.		
Have pt hold their breath for 10 sec to allow medication to reach deeply into the lungs		
Remove inhaler and instruct them to exhale slowly		
If order is for two puffs, wait 1-2 min & shake inhaler again before giving the 2nd puff		
Have patient rinse out mouth so no drug remains (Especially inhaled steroids)		
Record medication name, dose, route and time given		
Assess response to medication: Reassess VS, breath sounds, degree of distress		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

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☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 1/20

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

GIVING NEBULIZED MEDICATIONS by HHN/Mask

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: An adult with a history of asthma is short of breath with wheezing. You are asked to assemble the equipment, choose the correct medications from those available, and give the correct dose using a HHN.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***Verbalize the 7 rights of medication administration: RIGHT:** ☐ Person ☐ Drug ☐ Dose ☐ Route & site ☐ Reason ☐ Time ☐ Documentation		
Prepare/assess patient: Initiate IMC (IV not necessary if mild distress) | Position patient to optimize air exchange (upright)		
☐ *Confirm drug indication: Asthma/COPD, allergic reaction, croup/epiglottitis/RSV ☐ *Confirm absence of allergy or contraindications to drug(s)		
Explain procedure to pt and ensure understanding. Answer questions or concerns.		
Explain possible SE of medication(s)		
Prepare drugs/equipment: ☐ Meds (albuterol 2.5 mg, ipratropium 0.5 mg, or epinephrine 1 mg/10 mL 0.5 mg) ☐ HHN unit ☐ O_2 source & tubing ☐ Nasal cannula		
* Inspect packaging to confirm the drug name, integrity of packaging; color, clarity, concentration, dose, & expiration date * Prepare desired medication dose per SOP. | Cross check with another qualified practitioner		
*Unscrew nebulizer lid to expose medication cup | Hold medication cup upright		
* Without contaminating medication, pour or inject desired dose into cup and attach nebulizer lid		
* Attach mouthpiece and O_2 reservoir tubing T piece to top of medication cup		
*Connect O_2 tubing to bottom of medication cup | *Attach other end to O_2 source; adjust O_2 to 6 -8 L		
Watch for mist to come out of the nebulizer mouthpiece.		
Administer medication (Universal precautions) *Instruct pt. to hold mouthpiece firmly in their mouth; breathe in through their mouth to inhale mist		
If pt is hypoxic (Asthma: SpO_2 < 94%; COPD: SpO_2 < 92%): Add O_2 NC at 6 L (need 2nd O_2 source)		
Record medication name(s), dose(s), route and time given		
*Begin transport as soon as neb is started - do not wait for a response (verbalizes) Continue drug administration enroute until mist stops (5-15 min) |		
*Monitor pt. throughout treatment; reassess breath sounds, SpO_2, $EtCO_2$; & VS | Assess for side effects, adverse response, and/or need to switch to alternate drug or routes		
Alternative technique mask using NRM or CPAP mask *Remove bag from mask and attach medication cup to mask. Adjust O_2 flow at 6-8 L.		
Alternative technique: In-line via BVM: *Insert adaptors to connect medication cup in a T piece to the adaptor of a BVM and administer medication with ventilatory assist.		
***If wheezing persists:** Consider need for repeat dosing or alternate drug per SOP		

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Rating: (Select 1)

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☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 4/23

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

MUCOSAL ATOMIZER DEVICE (MAD)

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***Verbalize the 7 rights of medication administration: RIGHT:** ☐ Person ☐ Drug ☐ Dose ☐ Route & site ☐ Reason ☐ Time ☐ Documentation		
Prepare the patient Initiate Initial Medical Care. (IV not necessary if mild distress)		
*Confirm need for drug		
Confirm absence of allergy or contraindication to the drug if able.		
Explain drug actions, common side effects, and procedure to the patient (if conscious).		
*Inspect nostrils for problems that might inhibit absorption ☐ Trauma to nasal mucosa ☐ Epistaxis ☐ Damaged mucosa (chronic cocaine use) ☐ Severe hypotension or vasoconstriction ☐ If nasal secretions: suction or use alternate route		
Prepare equipment/medication * Select the appropriate medication ☐ naloxone 1 mg/1mL ☐ glucagon 1 mg/1 mL ☐ fentanyl 100 mcg/2 mL ☐ midazolam 10 mg/2 mL ☐ ketamine 50 mg/1mL (2) ☐ MAD device ☐ Syringe		
* Inspect medication packaging to confirm drug name, integrity of the medication packaging; concentration, dose, and expiration date. Inspect solution for clumping, frosting, precipitation, or change in clarity or color.		
* Calculate appropriate amount (dose/volume) of medication to administer		
Draw up appropriate dose using aseptic technique; expel air from syringe **Ideal IN volume for MAD = 0.25 - 0.3 mL;** Use 1 mL luer-lock syringe If total volume > 0.4 mL: Divide total amt. between 2 syringes; give ½ dose each nostril (limit 1 mL per nostril) Remove needle and firmly attach MAD to syringe		
*Cross check: Reconfirm medication and appropriate dose prepared with another qualified practitioner		
Procedure (Universal precautions) ☐ *Place tip of MAD 1.5 cm within the nostril; seat firmly to avoid leaks ☐ *Aim medial/inward (toward septum) & superior/upward; Do NOT tell pt to inhale (pulls med into posterior pharynx) ☐ *Push syringe plunger briskly (important to atomize) (The nose may leak fluid so have a gauze pad or towel ready to catch secretions)		
Assess patient response to medication IN absorption not as fast as IV: may take 3-5 min for onset, 10-15 for peak effect If no effect from 1st IN dose, consider alternate route		
* Record medication name, concentration, dose, route, time administered; HC provider name, pt response		

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Rating: (Select 1)

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CJM 5/18

Preceptor (PRINT NAME – signature)

NORTHWEST COMMUNITY EMERGENCY MEDICAL SERVICES SYSTEM

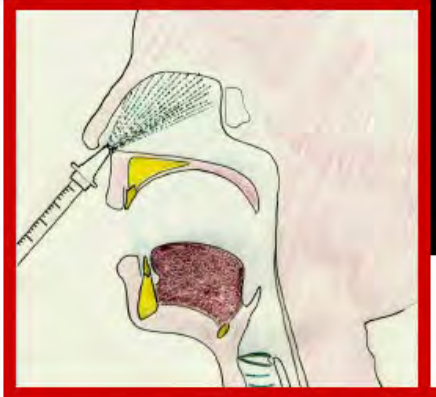
EST 1972

CLINICAL PRACTICE ALERT

MAD – IN Administration

- **Fentanyl**
- **Glucagon**
- **Naloxone**
- **Midazolam** (10mg/2mL concentration only)

- If nasal secretions: suction or use alternate route
- **Ideal IN volume for MAD = 0.25 - 0.3 mL**
- If total volume ≥ 0.4 mL: Divide amt between 2 syringes and give ½ dose each nostril (to increase surface area)
- **Use smallest syringe (1 mL leur-lock ideal)**
- **Aim medial/inward** (toward septum) **& superior/upward**
- **Do NOT tell pt to inhale** (pulls med into posterior pharynx)
- Push syringe plunger briskly (important to atomize)
- IN absorption not as fast as IV: may take 3-5 min for onset, 10-15 for peak effect
- If no effect from 1st IN dose, consider alternate route



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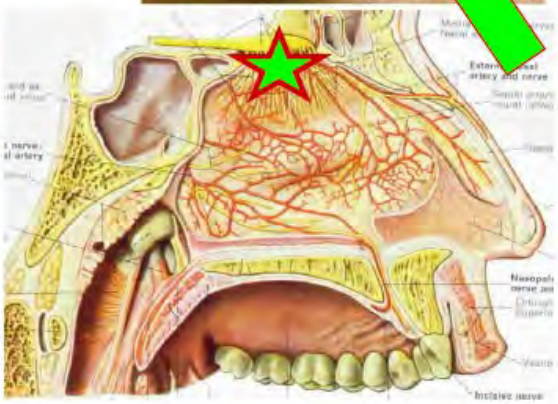

NWC EMSS Skill Performance Record

IV PUSH (IVP) MEDICATIONS

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

***Instructions**: An adult needs a medication to be administered IV Push. You will be given the drug and dose to administer. You are asked to assemble the equipment, and give the appropriate dose using the IV Push technique.*

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***Verbalize the 7 rights of medication administration: RIGHT:** ☐ Person ☐ Drug ☐ Dose ☐ Route & site ☐ Reason ☐ Time ☐ Documentation		
Prepare the patient ☐ * Confirm need for drug ☐ * Confirm absence of allergy or contraindication to the drug if possible		
***** Explain drug actions, common side effects, and procedure to pt (if conscious)		
* Verify patent vascular access		
Prepare the equipment/medication ☐ Select the appropriate medication ☐ Inspect packaging to confirm drug name, integrity of packaging; concentration, dose, and expiration date. ☐ Open package and verify sterility of medication (all seals in place) ☐ Inspect solution for clumping, frosting, precipitation, and change in clarity or color ☐ Calculate appropriate amount of medication for administration ☐ Prepare medication draw up into a syringe or engage preload cartridge with barrel of syringe) ☐ Observe syringe for air bubbles, point syringe upward, and expel bubbles ☐ ***Cross check:** Reconfirm medication and dose prepared with another qualified HC provider		
Procedure ☐ * Observe strict Universal precautions & aseptic technique during drug delivery ☐ * Cleanse IV tubing injection port closest to IV catheter with CHG/IPA prep ☐ Attach syringe to needless port ☐ Close flow clamp or pinch tubing proximal to insertion port ☐ Inject appropriate dose of drug at the prescribed rate ☐ Open flow clamp and flush tubing with NS and readjust IV flow rate ☐ * If a one-time dose: detach syringe; discard appropriately		
* Assess patient for response to medication; repeat VS		
* Document drug name, concentration, dose, route, time given, HC provider name & pt response		
Critical Criteria - Check if occurred during an attempt ☐ Failure to establish a patent and properly adjusted IV within 2 minute time limit ☐ Failure to take or verbalize appropriate BSI precautions prior to performing venipuncture ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Performs any improper technique resulting in potential for uncontrolled hemorrhage, catheter shear, or air embolism ☐ Failure to verbalize disposal of blood-contaminated sharps immediately in proper container at point of use ☐ Exhibits unacceptable affect with patient or other personnel ☐ Uses or orders a dangerous or inappropriate intervention		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

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☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

IV PIGGY-BACK (IVPB) MEDICATIONS

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: *An adult needs a vasopressor. You are asked to assemble the equipment, choose the correct medication from those available, and administer the appropriate dose using the IVPB technique.*

Performance standard 0. Step omitted (or leave blank) 1. Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2. Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***Verbalize the 7 rights of medication administration: RIGHT:** ☐ Person ☐ Drug ☐ Dose ☐ Route & site ☐ Reason ☐ Time ☐ Documentation		
Prepare the patient ☐ * Confirm need for the drug ☐ * Confirm absence of allergy or contraindication to the drug if possible		
***** Explain drug actions, common side effects, and procedure to the patient		
* Confirm patent vascular access		
Prepare the equipment/medication ☐ *Observe strict Universal precautions & aseptic technique during drug prep & delivery ☐ Select the appropriate medication and IV solution. ☐ *Cross check: Reconfirm medication with another PM ☐ *Inspect medication packaging; confirm drug name, integrity; concentration, dose, & expiration date. ☐ *Open IV outer bag and verify sterility of medication (all seals in place) ☐ * Inspect solution for clumping, frosting, precipitation, change in clarity or color if poss.		
Prepare medication for administration *Add norepinephrine 4 mg/4 mL to 1,000 mL D5W or NS. Label bag. * Insert appropriate IV tubing into port of the IV bag containing the medication. Fill drip chamber ½ full.		
☐ Flush tubing with medication fluid without wasting fluid. Observe tubing for air bubbles, expel ☐ Attach an adaptor for a needless port ☐ Close the flow clamp of the primary IV tubing above the medication injection port ☐ * Set the drip rate of the IVPB to deliver the desired dose of medication		
Document drug name, concentration, dose, route and time given		
* Assess patient response to medication; repeat VS		
* Document drug name, concentration, dose, route, time given, PM who initiated IVPB & pt response		
Critical Criteria - Check if occurred during an attempt ☐ Failure to establish a patent and properly adjusted IV within 2-minute time limit ☐ Failure to take or verbalize appropriate body substance isolation precautions prior to performing venipuncture ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Performs any improper technique resulting in potential for uncontrolled hemorrhage, catheter shear, or air embolism ☐ Failure to dispose/verbalize disposal of blood-contaminated sharps immediately in proper container at the point of use ☐ Exhibits unacceptable affect with patient or other personnel ☐ Uses or orders a dangerous or inappropriate intervention		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

ORAL MEDICATION (PO) ADMINISTRATION

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: A patient is complaining of chest pain that started 15 minutes ago. You are asked to choose the correct medication, and to administer the appropriate dose of ASA using the PO technique.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***Verbalize the 7 rights of medication administration: RIGHT:** ☐ Person ☐ Drug ☐ Dose ☐ Route & site ☐ Reason ☐ Time ☐ Documentation		
Prepare the patient ☐ * Confirm need for the drug ☐ * Confirm absence of allergy or contraindication to the drug ☐ If possible place patient in an upright or sitting position		
***** Explain drug actions, common side effects, and procedure to the patient		
Prepare the equipment/medication * Select the appropriate medication		
* Inspect the container or packaging to confirm the name of the drug, integrity of the medication packaging/container; color and concentration of the medication, dose of the tablet, and expiration date.		
* Determine the amount of aspirin to be administered: 4 (81mg) chewable tablets		
* Put on gloves		
Drug administration If a multiple dose container; shake 4 tablets into the lid of the container; do not touch multiple tablets. If single dose packaging; open and prepare to administer.		
*Cross check: Reconfirm medication and dose prepared with another qualified practitioner		
* Pour the tablets from the container lid into the patient's hand. Watch the patient place all of the tablets into their mouth. If patient needs assistance; place all 4 tablets into the patient's mouth.		
* Instruct the patient to chew and swallow the tablets		
* Practitioner may give a small amount of water to help wash down the medication. Confirm that the patient has swallowed all the medication.		
* Monitor patient's response to the medication (repeat vital signs)		
* Document drug, concentration, dose, route and time given, PM and pt. response		
Critical Criteria: Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Performs any improper technique resulting in the potential for patient harm ☐ Exhibits unacceptable affect with patient or other personnel		

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Rating: (Select 1)

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☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

SUBLINGUAL (SL) MEDICATION ADMINISTRATION

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: An adult needs a medication to be administered sublingually. You are asked to choose the correct medication and to administer the appropriate dose using the SL technique.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***Verbalize the 7 rights of medication administration: RIGHT:** ☐ Person ☐ Drug ☐ Dose ☐ Route & site ☐ Reason ☐ Time ☐ Documentation		
Prepare the patient ☐ *Confirm need for the drug (Hx, PE, 12-lead ECG) ☐ *Confirm absence of allergy or contraindications to the drug		
Explain drug actions, common side effects, and procedure to the patient		
Prepare the equipment/medication * Select the appropriate medication		
* Inspect the container to confirm name of the drug, integrity of the packaging/container; color and concentration of the medication, dose of the tablet, and expiration date.		
* Determine appropriate amount of medication for administration		
Drug administration (Universal precautions) * With gloved hand, take one tablet from container or pour one tablet into lid of the container.		
*Cross check: Reconfirm medication and dose prepared with another PM		
* Temporarily remove O_2 mask if applicable. Instruct pt to open mouth and lift tongue. Place tablet under the pt's tongue. Instruct pt to close their mouth and allow the tablet to dissolve.		
Advise patient not to swallow or chew the medication. If the patient's mouth is dry, may place a few drops of NS or water under the tongue.		
* Monitor pt's response to the medication (repeat VS; reassess pain, degree of distress)		
* Document drug, concentration, dose, route and time administered, PM and pt responses		
Critical Criteria: Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Performs any improper technique resulting in the potential for patient harm ☐ Failure to dispose/verbalize disposal of sharps immediately in proper container at the point of use ☐ Exhibits unacceptable affect with patient or other personnel		

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Rating: (Select 1)

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CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

SUBCUTANEOUS (SUBQ) INJECTIONS

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: An adult requires epinephrine 1 mg/1 mL 0.3 mg SUBQ. Assemble the equipment, choose the correct medication from those available, and administer the appropriate dose using the SUBQ technique.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***Verbalize the 7 rights of medication administration: RIGHT:** ☐ Person ☐ Drug ☐ Dose ☐ Route & site ☐ Reason ☐ Time ☐ Documentation		
Prepare the patient ☐ * Confirm need for the drug ☐* Confirm absence of allergy or contraindication to the drug		
Explain drug actions, common side effects, and procedure to the patient		
Prepare equipment/medication ☐ Syringe 1 mL w 5/8" needle ☐ CHG/IPA prep ☐ Filtered needle ☐ Epinephrine 1 mg/1 mL ☐ Sharps container ☐ Adhesive strip ☐ Gauze pad		
☐ Select the appropriate medication ☐ Inspect packaging to confirm drug name, integrity of packaging; concentration, dose, & expiration date. ☐ Open package and verify sterility of medication (all seals in place) ☐ Inspect solution for clumping, frosting, precipitation, and change in clarity or color ☐ Calculate appropriate dose and draw up into syringe ☐ *Prepare medication: Draw into syringe from an ampule using filtered needle/straw) ☐ Observe syringe for air bubbles, point syringe upward, expel bubbles; Change to 5/8" needle. ☐ **Cross check:** Reconfirm medication and dose prepared with another qualified practitioner		
Drug administration (Universal precautions) ☐ Select appropriate injection site on lateral middle third of patient's upper arm ☐ Cleanse selected site with CHG/IPA prep ☐ Pinch flesh in selected area with index finger and thumb to create a skin surface at least 2" in which to deposit medication. Do not touch the cleansed site. ☐ With dominant hand, grasp syringe between thumb and index finger and quickly insert needle bevel up at a 45° angle to the skin surface so needle tip remains in the SUBQ space. ☐ *Slowly depress plunger to inject medication		
☐ Withdraw needle, place gauze pad over injection site, apply gentle pressure ☐ * Dispose of used needle, syringe, and ampule directly into a sharps container		
☐ Apply adhesive strip over injection site if oozing or bleeding ☐ Assess patient for response to medication ☐ * Document drug, concentration, dose, route, time given, & patient response		
Critical Criteria: Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Performs any improper technique resulting in the potential for patient harm ☐ Failure to dispose/verbalize disposal of sharps immediately in proper container at the point of use ☐ Exhibits unacceptable affect with patient or other personnel		

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Rating: (Select 1)

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☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.
☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

INTRAMUSCULAR (IM) INJECTIONS

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: An adult is in need of epinephrine (1mg/1mL) 0.3 mg IM for an allergic reaction. You are asked to assemble the equipment, choose the correct medication from those available, and to administer the appropriate dose using the IM technique.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***Verbalize the 7 rights of medication administration: RIGHT:** ☐ Person ☐ Drug ☐ Dose ☐ Route & site ☐ Reason ☐ Time ☐ Documentation		
Prepare patient ☐ *Confirm need for the drug ☐* Confirm absence of allergy or contraindication to the drug ☐ Explain the drug action, possible side effects, and procedure to the patient		
Prepare equipment/medication ☐ Syringe 1-3 mL w 21-22 g; 1½ - 2½" needle ☐ CHG/IPA prep ☐ Medication ☐ Sharps container ☐ Adhesive strip ☐ Gauze pad		
☐ *Select the appropriate medication ☐ Inspect packaging to confirm drug name, integrity of packaging; concentration, dose, & expiration date. ☐ Open package and verify sterility of medication (all seals in place) ☐ Inspect solution for clumping, frosting, precipitation, and change in clarity or color ☐ Calculate appropriate dose and draw up into syringe from a vial. Give up to 3 mL of drug per inj. ☐ Observe syringe for air bubbles, point syringe upward, and expel bubbles ☐ **Cross check:** Reconfirm medication and dose prepared with another qualified practitioner		
Drug administration (Universal precautions) *Preferred site: Vastus Lateralus muscle (adults and children). Alternate site: deltoid muscle two finger breadths below acromion process if other site inaccessible.		
☐ *Cleanse selected site with CHG/IPA prep; allow to dry for 30 seconds ☐ *Gently stretch skin overlying muscle; do not to touch cleansed area ☐ *With dominant hand, grasp syringe like a dart and quickly insert needle bevel up at a 90° angle to the skin surface until it is firmly seated in muscle ☐ Release skin, hold syringe and needle in place, and gently pull back on plunger to check for blood return		
☐ *If no blood return: depress plunger and inject medication slowly ☐ *If blood return: withdraw syringe/needle, apply pressure to site, discard syringe in a sharps container, begin again		
☐ *Withdraw needle, place gauze pad over injection site, and apply gentle pressure ☐ *Dispose of used needle and syringe directly into a sharps container		
☐ Apply adhesive strip over injection site if oozing or bleeding ☐ Assess patient for response to medication ☐ *Document drug, concentration, dose, route, time given, & patient response		
Critical Criteria: Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Performs any improper technique resulting in the potential for patient harm ☐ Failure to dispose/verbalize disposal of sharps immediately in proper container at the point of use ☐ Exhibits unacceptable affect with patient or other personnel		

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Rating: (Select 1)

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☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

INTRARECTAL DIAZAPAM using Diastat® syringe

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: A child weighing 30 lbs presents with generalized seizure activity. The parents have Diastat available and are asking your assistance in providing diazepam via this route. You are asked to prepare and give diazepam using the Diastat syringe via the IR route.

Note: This is not the EMS System's preferred route for providing a benzodiazepine to abort tonic clonic seizure activity. In the absence of vascular access, midazolam IM is the preferred medication and route for PMs.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***Verbalize the 7 rights of medication administration: RIGHT:** ☐ Person ☐ Drug ☐ Dose ☐ Route & site ☐ Reason ☐ Time ☐ Documentation		
Prepare the patient ☐ *Confirm need for the drug ☐* Confirm absence of allergy or contraindication to the drug ☐ Explain the drug action, possible side effects, and procedure to the patient/caregiver		
Prepare equipment/medication Diastat syringe (traditional) 2.5 mg or Diastat AcuDial system. When Diastat AcuDial is prescribed, pharmacist "dials in" the correct amount of diazepam to deliver into a pre-filled delivery system and locks it into place. The locking mechanism ensures that the correct dose is given. Drug comes in a Twin Pack that contains 2 pre-filled delivery system with the patient's dose locked in, 2 packets of lubricating jelly, administration and disposal instructions.		
* Select appropriate medication: Inspect packaging to confirm drug name, integrity of packaging; concentration, dose, and expiration date.		
* Open package and verify sterility of medication (seal pin is attached to cap)		
*Cross check: Reconfirm medication with another PM		
Push up with thumb and pull to remove cap from syringe. Remove seal pin with the cap; lubricate tip of syringe. Ensure green ready band is visible on Diastat AcuDial		
Drug administration (Universal precautions) Position pt on side with upper leg/hip flexed, to allow better visualization of anus		
*Insert syringe tip into the rectum; syringe rim should be snug against rectal opening; slowly inject medication; count to three before removing syringe. Hold buttocks together for another count of 3 to minimize leakage of medication		
***Reassess patient** ☐ Seizure activity should stop within one to three minutes ☐ Observe for signs of resp. depression (↓ rate/depth) and hypoxia. Assist ventilations prn. Slower absorption of IR Valium may make resp. depression and hypotension less likely to occur. ☐ Document drug, concentration, dose, route and time administered, & PM		
Critical Criteria: Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Performs any improper technique resulting in the potential for patient harm ☐ Failure to dispose/verbalize disposal of sharps immediately in proper container at the point of use ☐ Exhibits unacceptable affect with patient or other personnel		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

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☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

Braun® Fluid Dispensing Connector

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

The NWC EMSS requires that the Braun® Fluid Dispensing Connector only be used by EMS personnel who have received appropriate training and have been competencied in how to use the device.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***States INDICATIONS**: Intended for use as a method to draw up medications from a larger or pre-loaded syringe when smaller amounts of medication are required (peds patients).	☐	☐
***States CONTRAINDICATION**: Do NOT use if the patient requires the full amount of medication contained in the original packaging.	☐	☐
Application & Use: In all cases follow the 7 Rights of med administration from SOPs		
Insert medication filled syringe (original packaging) into Braun Fluid Dispensing Connector: Insert the medication filled syringe to be drawn from (original packaging) into one side of the Braun unit and twist to secure until the syringe is seated snuggly.	☐	☐
Insert smaller, empty syringe into the Braun Fluid Dispensing Connector: Attach a smaller, empty syringe into which you wish to draw the medication into the remaining, open connection site on the Braun unit and twist to secure until the syringe is seated snuggly.	☐	☐
Begin medication transfer: ☐ Calculate the exact dose needed in mL ☐ Draw back on the smaller syringe plunger until the correct amount of medication is obtained. ☐ Perform an independent cross-check of exact dosing if required by SOP. **Note there will be resistance when drawing the medication into the smaller syringe.*	☐	☐
Disconnect smaller syringe from the Braun Fluid Dispensing Connector: ☐ Twist the smaller syringe (that now contains the desired amount of medication) in the opposite direction to disconnect from the Fluid Dispensing Connector. ☐ Label the new syringe with drug name, concentration, and dose	☐	☐
Complications: Too much or too little medication drawn into the smaller syringe: If too much medication is accidentally drawn into the smaller syringe, depress the plunger to push the excess medication back into the larger syringe.	☐	☐

Factually document below your rationale for checking any of the above critical criteria.

_____

_____

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Rating: (Select 1)

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SAR/CJM 11/20

_____
Preceptor (Printed Name & Signature)

NWC EMSS Skill Performance Record

CAPILLARY GLUCOSE TESTING (Microdot Xtra® Meter)

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult is tremulous, light headed, tachycardic and diaphoretic. You are asked to assemble the equipment and obtain a blood glucose reading using the Microdot Xtra monitoring system.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Verbalize indications for glucose testing ☐ All pts with AMS, neuro deficits; diaphoresis/tachycardia ☐ Seizures		
*** Prepare and assemble equipment** ☐ Microdot Xtra meter ☐ Lancet (no lancing device) ☐ Microdot Test strips ☐ CHG/IPA prep		
Verbalizes correct procedure for storage and handling of test strips ☐ Store test strips in original vial in cool, dry place 50°- 86° F. Keep away from sunlight and heat, do not refrigerate or freeze. ☐ Record the discard date on each vial (90 days from date opened) ☐ When removing strip from vial, close cap immediately. Use strip immediately. ☐ Discard unused test strips 90 days from date opened; don't use strips beyond expiration date printed on vial		
Verbalize correct procedure to storage and handling of high and low test solutions ☐ Record the discard date on each vial (90 days from date opened). ☐ Discard unused control solution 90 days from date opened; don't use solution beyond expiration date printed on vial. ☐ Store at room temperature below 86° F; keep vials of test solution tightly closed when not in use		
Verbalize need for quality control procedures using control solution testing ☐ **Frequency: DAILY (every 24 hours) if strips are opened plus…** ☐ Any time a new vial of test strips is opened ☐ Whenever meter is not operating properly ☐ If pt's S&S differ from test results ☐ Question if test results are accurate ☐ If meter is dropped or damaged ☐ Test strip vial has been left open for >2 hours ☐ Verbalize that daily tests are documented on MicroDot Quality Control Daily Check form		
☐ BSI: Apply gloves ☐ Obtain a complete set of VS; include SpO_2 to put test results into context		
Perform procedure *Open bottle and retrieve test strip. Inspect and discard if bent, scratched, wet, or damaged Close lid tightly to maintain integrity of strips.		
* Insert contact bars of test strip firmly into monitor test port so white fill chamber faces upward. (Place strip directly onto black tongue-shaped platform before inserting into meter)		
* Advance test strip until it stops. Observe monitor turn on; all lights will perform a self-diagnostic test.		
Troubleshoot monitor if error (E 1-5) codes appear before applying blood. Eject test strip by pressing eject button and follow instructions for E code identified.		
Select site: Avoid sites that are swollen, bruised, cyanotic, cold, scarred, or calloused (poor blood flow) * Cleanse side of patient's finger with CHG/IPA prep. Allow to dry completely.		
☐ *Obtain a blood drop using a lancet and correct technique (side of finger) (600 microliters) *Do not squeeze, milk finger past most distal knuckle or apply strong repetitive pressure to site. May cause hemolysis or increase tissue fluid in blood sample causing incorrect results. ☐ *Dispose of lancet in a sharps container		
☐ If skin did not dry thoroughly, wiped away first drop of blood and used second drop to run test. ☐ *Hold strip next to drop of blood; allow blood to wick into test strip. Do not smear blood onto strip or place blood on top of strip. Wait for meter to beep when test zone is full.		
Test starts automatically when blood sample is detected. Verbalize that monitor will display --- -- - followed by a countdown from 10		
*Observe display; correctly interpret significance of reading after 10 secs Reportable ranges: Meter is accurate from 20-525. If <20 = LO; > 525 mg/dL meter displays HI If LO or hypoglycemic: ensure vascular access ASAP (IO if needed); infuse D10% IVPB per SOP		
Turn off monitor: Hold meter vertically above a safe disposal container with strip pointing down; press eject button		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
Clean and disinfect meter after each use by thoroughly wiping surface of unit with an approved 1 minute disinfectant wipe and then wrap in wipe, place in disinfection case and activate 1 min timer. Wet dwell time per wipe.		
Verbalize steps to take if meter malfunctions and/or gives persistent suspected incorrect readings despite appropriate troubleshooting: Follow Medical Device Malfunction policy. Remove meter and strips from service; contact EMS MD and EMS Admin Director. Contact Frederick W. Engimann, President, Cambridge Sensors USA LLC Cell: 815-341-8094; fengimann@microdotcs.com to collect meter/strips and do an analysis.		
Critical Criteria - Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions prior to performing skin puncture ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Performs any improper technique resulting in potential for incorrect test result/patient harm ☐ Failure to dispose/verbalize disposal of blood-contaminated sharp immediately in proper container ☐ Exhibits unacceptable affect with patient or other personnel		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

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CJM 1/20

Preceptor (PRINT NAME – signature)

Expected competencies for Point of Care glucose Testing (POCT):

- Only qualified and credentialed EMS personnel perform POCT.
- Only test strips (within expiration date) recommended by the glucometer manufacturer are used in testing.
- **EMS takes appropriate action if the results are not within the normal ranges.**
- **Treat the patient – not the monitor.** If pt is symptomatic, but reading is normal, REPEAT TEST on another arm/hand.
- EMS effectively problem solves error messages displayed on the device and possible incorrect readings.

Microdot error messages – See manufacturer's instruction

Complete and document **daily quality control checks** in compliance with CLIA regulations for professional use meters.

Control solution test procedure:

1. **Shake test solution well** before using. Wipe dispenser tip then waste first drop of Control Solution to ensure an accurate result.
2. Insert a test strip into the Microdot Xtra meter. Black contact bars must go fully into the meter.
3. Remove cap, invert bottle and squeeze out one drop of control solution. Apply the drop to the strip by bringing the meter and the strip to the drop. Touch drop with the top edge of the test strip and wait until the test pad fills with the solution. Results appear in 10 seconds.
4. Compare results with the ranges of expected results shown on the test strip vial. (Low=Blue cap; High=Red cap)
5. **If results outside of expected range,** repeat test. If second test falls outside of normal range, repeat test with new bottle of control solution and test strips. Verify that strips are not part of recalled lots and that strips and test solutions are not damaged and/or past their expiration dates. Verify that strip test vials have not been left open and meters are in correct mode. **Error persists: implement medical device malfunction policy.**

Glucose log completion and submission:

May use System's current paper form, a fillable PDF document (paper form as template), or third party software such as ImageTrend, Target Solutions, or other program that meets these criteria:

- Original electronic documentation must include all data on the System's Glucometer Quality Control Log including signatures (written or electronic).
- If using 3rd party software, a monthly summary log must be produced, one page per vehicle, in an easily viewable format to show that all information is complete. Agencies must be able to show official electronic signatures for the weekly and additional checks.
- PEMSCs will provide a written or electronic signature at the end of their agency monthly glucometer report for each meter to attest to their review and verification of data completeness and accuracy.

Due date: Submit Glucometer logs to the assigned HEMSC/educator by the 4th week of the following month.

MicroDot® Glucometer Quality Control Log

EMS Agency: _____ Vehicle ID: _____ Month/Year: _____

Instructions: Test glucose meter with HI/LO solution **at least weekly** per a recurring schedule determined by the EMS agency and record results on the form below or in 3rd party software meeting these specifications such as ImageTrend, Target Solutions, or other program that meets the criteria listed in the Procedure Manual.

1. Shake test solution well before using. Discard first drop of solution and wipe dispenser tip to ensure accurate results.
2. Insert a test strip (black contact bars) fully into the meter.
3. Remove solution cap; invert bottle and squeeze out one drop of control solution. Apply drop to the strip by bringing the strip to the drop. Touch drop with the top edge of the test strip and wait until the test pad fills with the solution. Results appear in 10 seconds.
4. Compare results with the ranges of expected results shown on the test strip vial. (Low=Blue cap; High-Red cap)

If results are outside of the expected range, repeat test. If the 2nd test falls outside of the normal range, repeat the test with a new bottle of control solution and test strips. Verify that strips are not part of recalled lots and that strips and test solutions are not damaged and/or past their expiration dates. Verify that strips and test vials have not been left open and meters are in the correct mode. If the error persists, implement the medical device malfunction policy.

Weekly Checks (document regularly scheduled weekly checks below)

Date	EMS clinician legible signature (ink/electronic)	**Low Result**	**Low Range**	**High Result**	**High Range**	**Strip Lot #**	Exp. Date for BOTH strips / solutions
8-1	J. Doe, PM	33	29-59	320	260-420	700125	7-15-23 / 8-29-23
							/
							/
							/
							/
							/

Additional Checks: Document additional checks below if a new vial of strips is opened (NEW), the meter is dropped or if you believe that the results are not accurate (ERROR)

Date	**EMS clinician-legible signature**	Low Result	**Low Range**	High Result	**High Range**	**Strip Lot #**	Exp. Date for BOTH strips / solutions	**Test Reason**
8-4	J. Doe, PM	33	29-59	320	260-420	700125	7-15-23 / 8-29-23	Dropped
							/	
							/	
							/	
							/	
							/	
							/	

PEMSC (PRINT Name/signature: _____ Date: _____

(Rev. 8/23) Submit Glucometer logs to the assigned HEMSC/educator by the 4th week of the following month

NWC EMSS Skill Performance Record

DEXTROSE 10% (25 g / 250 mL)

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: *An unconscious adult is determined to be severely hypoglycemic. You are asked to assemble the equipment and administer the appropriate dose of D10% (25 g / 250 mL) via IVPB. The patient weighs 150 pounds.*

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Equipment needed: ☐ IV start supplies (size-appropriate IV catheter ☐ 0.9% NS IV solution ☐ D10% (25g/250 mL) ☐ 2 sets IV tubing (15 drops = 1 mL) ☐ CHG/IPA prep		
***Verbalize the 7 rights of medication administration: RIGHT:** ☐ Person ☐ Drug ☐ Dose ☐ Route & site ☐ Reason ☐ Time ☐ Documentation		
Verbalize the following: ☐ Drug action: Concentrated source of carbohydrate for IV infusion ☐ *Indication: Confirmed hypoglycemia ☐ *Side effects: hyperglycemia. Less likely with D10% than with D50%: hyperosmolarity, hypervolemia, phlebitis, pulmonary edema, cerebral hemorrhage, cerebral ischemia		
Confirm RIGHT PATIENT (Drug is indicated) ☐ Confirm hypoglycemia (bG ≤ 70) or S&S hypoglycemia ☐ Confirm absence of allergy to the drug (hypersensitivity to corn products) ☐ Confirm absence of contraindications to the drug: glucose level is normal or high		
Prepare the patient Explain drug and procedure to the patient		
Start peripheral IV/IO line with age & size appropriate catheter per procedure. Hypertonic dextrose solutions (above 5% concentration) should be given slowly, preferably through a small bore needle into a large vein, to minimize venous irritation. Infuse 0.9 NS at TKO rate		
* Verify patency of primary IV line. In peripheral vein, check for retrograde blood flow (should be blood return in tubing) when IV bag is lowered. IV and IO lines should run well with no swelling at the site.		
Prepare equipment/medication: Confirm RIGHT DRUG: D10% (25g/250mL) ☐ Open D10% outer wrap and verify sterility of medication (all seals in place) ☐ Check drug solution for color (discoloration), clarity (particulate matter), expiration date		
Prepare medication for administration (RIGHT ROUTE & site – IV or IO) Concentrated dextrose solutions should not be administered via SUBQ or IM routes ☐ Insert piercing pin from secondary set IV macrodrip tubing into D10% IV bag. Suspend and squeeze drip chamber to fill ⅓ full; prime tubing without wasting fluid; close clamp ☐ Cleanse IV injection port closest to patient on primary IV tubing with CHG/IPA ☐ Using strict aseptic technique, attach secondary set (D10% line) to primary IV tubing at port closest to the patient ☐ Close flow clamp of primary IV tubing; open secondary tubing to D10% line to begin infusion		
Deliver RIGHT DOSE in RIGHT TIME Calculate appropriate dose of medication based on age, size, blood glucose (bG) level. Maximum rate at which dextrose can be infused without producing glycosuria is 0.5g/kg /hr. **Adult dose if bG is borderline 60-70 & no evidence of pulmonary edema:** ☐ Open IV WO for DEXTROSE 10% and infuse 12.5 Gm (125 mL or ½ of IV bag). ☐ Once dose administered, close IV clamp on D10% IV and open 0.9 NS clamp to TKO rate. **Adult dose if bG < 60 and no evidence of pulmonary edema:** ☐ Open IV WO for DEXTROSE 10% and infuse 25 Gm (entire 250 mL). ☐ Once dose administered, close IV clamp on D10% IV and open 0.9 NS clamp to TKO rate. **If S&S of hypoglycemia fully reverse** and pt is decisional after a partial dose, reassess bG. If >70; clamp off D10% and open 0.9 NS TKO		
Children and Infants if bG is borderline 60-70 and symptomatic: ☐ Give half (½) of the dose listed below.		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
☐ **Children and Infants (up to 50 kg or 110 lbs) dose if bG < 60:** Initial dose **0.5g/kg up to 25 g** (5mL/kg) For smaller children, draw up desired volume into a syringe and administer slow IV push. Give additional 0.5 g/kg (5mL/kg) if pt. remains hypoglycemic &symptomatic 5 min after initial medication dose.		
☐ **If pt. has HF or a history of HF and lungs are clear:** standard dose, but slow infusion rate to 50 mL increments followed by reassessment ☐ **If pt. has HF and lungs have crackles or wheezes:** Call OLMC for orders		
Verbalize Caution: administering too forcefully can result in loss of IV line and damage to surrounding tissues. Exercise care to insure that the IV catheter is well within the lumen of the vein and that extravasation of the medication does not occur. If IV infiltration with fluid extravasation does occur, immediately stop the infusion and inform OLMC.		
Reassess patient response 5 minutes after infusion: Mental status (GCS) and blood glucose level **If bG 70 or greater**: Ongoing assessment **If bG less than 70**: Repeat D10% in 5 Gm (50 mL) increments at 5 -10 minute intervals. Reassess bG and mental status every 5 minutes after each increment.		
RIGHT DOCUMENTATION: Note presenting S&S of hypoglycemia; baseline bG level; lack of contraindications to drug; drug name, concentration, dose (in Gm), route, time given; patient response (repeat bG level and mental status); any side effects and/or complications.		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 12/16

Preceptor (PRINT NAME – signature)

Peds dosing DEXTROSE 10% (25 g/250 mL)
Dose: 0.5 g/kg (5 mL/kg) (0.1 g/1 mL in solution)
Max initial dose: 25 g

Weight	Dose g = mL	Weight	Dose g = mL	Weight	Dose g = mL
6.6 lbs = 3 kg	1.5 g = 15 mL	41.8 lbs = 19 kg	9.5 g = 95 mL	77 lbs = 35 kg	17.5 g / 175 mL
8.8 lbs = 4 kg	2 g = 20 mL	44 lbs = 20 kg	10 g = 100 mL	79.2 lbs = 36 kg	18 g = 180 mL
11 lbs = 5 kg	2.5 g = 25 mL	46.2 lbs = 21 kg	10.5 g = 105 mL	81.4 lbs = 37 kg	18.5 g = 185 mL
13.2 lbs = 6 kg	3 g = 30 mL	48.4 lbs = 22 kg	11 g = 110 mL	83.6 lbs = 38 kg	19 g = 190 mL
15.4 lbs= 7 kg	3.5 g = 35 mL	50.6 lbs = 23 kg	11.5 g = 115 mL	85.8 lbs = 39 kg	19.5 g = 195 mL
17.6 lbs = 8 kg	4 g = 40 mL	52.8 lbs = 24 kg	12 g = 120 mL	88 lbs = 40 kg	20 g = 200 mL
19.8 lbs = 9 kg	4.5 g = 45 mL	55 lbs = 25 kg	12.5 g = 125 mL	90.2 lbs = 41 kg	20.5 g = 205 mL
22 lbs = 10 kg	5 g = 50 mL	57.2 lbs = 26 kg	13 g = 130 mL	92.4 lbs = 42 kg	21 g = 210 mL
24.2 lbs = 11 kg	5.5 g = 55 mL	59.4 lbs = 27 kg	13.5 g = 135 mL	94.6 lbs = 43 kg	21.5 g = 215 mL
26.4 lbs = 12 kg	6 g = 60 mL	61.6 lbs = 28 kg	14 g = 140 mL	96.8 lbs = 44 kg	22 g = 220 mL
28.6 lbs – 13 kg	6.5 g = 65 mL	63.8 lbs = 29 kg	14.5 g = 145 mL	99 lbs = 45 kg	22.5 g = 225 mL
30.8 lbs = 14 kg	7 g = 70 mL	66 lbs = 30 kg	15 g = 150 mL	101.2 lbs = 46 kg	23 g = 230 mL
33 lbs = 15 kg	7.5 g = 75 mL	68.2 lbs = 31 kg	15.5 g = 155 mL	103.4 lbs = 47 kg	23.5 g = 235 mL
35.2 lbs = 16 kg	8 g = 80 mL	70.4 lbs = 32 kg	16 g = 160 mL	105.6 lbs = 48 kg	24 g = 240 mL
37.4 lbs = 17 kg	8.5 g = 85 mL	72.6 lbs = 33 kg	16.5 g = 165 mL	107.8 lbs = 49 kg	24.5 g = 245 mL
39.6 lbs = 18 kg	9 g = 90 mL	74.8 lbs = 34 kg	17 g = 170 mL	110 lbs = 50 kg	25 g = 250 mL

NWC EMSS Skill Performance Record

MONITORING a NASOGASTRIC TUBE

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult with a nasogastric tube must be transported. You are asked to prepare the patient for transport and explain the steps a practitioner should take to troubleshoot a non-draining tube.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
*** State indications for an NG tube** ☐ Aspiration risk ☐ Need for gastric lavage ☐ Need for gastric decompression		
* Universal precautions		
State at least two **complications** of NG tubes ☐ Soft tissue trauma from poor technique ☐ Tube misplacement ☐ Tube obstruction		
Check to see if tube is draining. If no drainage: ☐ Use a 60-mL syringe; instill air into tube. Listen over the epigastric area for air movement into the stomach. ☐ Aspirate syringe to see if gastric contents can be withdrawn. ☐ If the tube is misplaced, contact OLMC to see if the tube can be removed. If not, leave tube in place and ensure nothing gets instilled into the tube.		
☐ Disconnect tube from suction machine if applicable ☐ Tape a glove securely around distal tube end to collect drainage		
Secure tube prior to transport: ☐ Ensure that tube is secure to nose or face ☐ Without tension on tube extending from nose or mouth, measure length to upper chest ☐ Place loop of tape around tube at that point creating a tape tab and pin through tape to shirt or gown to prevent kinking or dislodging during transport		
Allow distal end of tube to rest in pt's lap if sitting or below stomach if supine to allow for gravity drainage. Do not allow end of tube to touch floor.		
If patient is non-decisional/combative apply soft wrist restraints to protect tube		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

MONITORING an INDWELLING URINARY CATHETER

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult with a Foley catheter must be transported. You are asked to prepare the patient and explain the steps a practitioner should take to ensure safe transport with an indwelling urinary catheter in place.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
*** State indications for an indwelling urinary catheter** ☐ Urinary retention or incontinence ☐ Epidural ☐ Surgical patient (drainage of urine) ☐ Clinical need/unstable/sacral or perineal wound ☐ Medications ☐ Strict output ☐ Comfort care		
* Universal precautions		
State at least two **complications** of indwelling urinary catheters ☐ Soft tissue trauma; bleeding ☐ Tube kinking, obstruction ☐ Infection (common) ☐ Abdominal pain ☐ May be pulled out accidentally: inflated balloon can cause trauma; impotence		
Assess for S&S of urinary tract infection ☐ Pain ☐ Change in urine color ☐ Abdomen/flank discomfort ☐ Temp > 38° C ☐ Clots/mucous in urine		
***Secure tube prior to transport:** ☐ Maintain closed system; don't clamp tubing ☐ Ensure that securing device or tape applied to upper thigh prevents tension on tubing and "in & out" movement of catheter from urethra (Photo 1) ☐ Ensure that tubing is never kinked or obstructed to prevent Autonomic Hyperreflexia or infection ☐ Secure drainage bag below level of bladder; don't allow bag to be carried higher than bladder ☐ Don't place bag between patient's legs on stretcher ☐ Do not allow drainage tube to loop around leg or fall below bag (no dangling or looping) ☐ Don't let bag lay on floor		
☐ Recommend drain urine out of tubing and collection bag pre-transfer; document output (Photo 2) ☐ *Wash hands before & after emptying bag, change gloves - avoid touching spout to container		
If patient is non-decisional/combative apply soft wrist restraints to protect tube		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

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☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

CONTACT LENS REMOVAL: HARD LENSES

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: An adult has experienced ocular trauma but the globe appears intact. You are asked to remove the hard contact lenses.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
*__Obtain rapid gross visual acuity__ ☐ Can read name badge ☐ Sees shape/shadow/motion ☐ Can count fingers ☐ Sees light projection only ☐ No light perception (NLP)		
__*Prepare and assemble equipment – Apply BSI__ ☐ Contact lens storage case or 2 containers w/ lids ☐ Suction cup - optional ☐ Sterile saline without preservatives ☐ Towel or 4X4s		
__Prepare patient__ ☐ Remove external debris by gently touching adhesive tape against closed eyelids. ☐ Gently remove dirt, blood, or makeup from eyelids with 4X4s moistened with saline or cotton applicators. Do not dislodge clots. ☐ Place 2 mL of sterile saline into each specimen cup and label containers L & Rt. If a lens case is used, place a few gtts. of saline into each compartment. ☐ If eye appears dry, instill several drops of preservative-free sterile saline solution and wait a few minutes before removing the lens to help prevent corneal damage.		
Locate the lens in each eye: Can be seen moving on cornea when pt. blinks or by looking sideways across eye - shine a penlight across the eye.		
Critical steps: It is safer for the lens to be entirely on sclera (white) or cornea (color) then partially on each. If unable to remove, slide to either position.		
Using one thumb, pull the pt's upper eyelid towards the lateral orbital rim (towards ear)		
With other thumb on lower lid, and index finger on upper lid gently move the lids towards each other to trap the lens edges and break the suction.		
Gently press eyelids together toward lens. Use slightly more pressure on lower lid when moving it toward bottom edge of lens.		
☐ Pop or slide the lens out between the lids ☐ Remove the lens and place it in prepared container ☐ Remove and care for the opposite lens in the same manner		
Examine the eyes for redness or irritation		
__Optional approach: Suction cup removal of hard lenses__ ☐ Wet the suction cup with a drop of saline ☐ Gently pull up the upper lid with index finger and pull lower lid down with thumb ☐ Press the suction cup gently to the center of the lens ☐ Pull the suction cup and lens away from the eye in a straight line ☐ Place the lens in the prepared container		
State one complication of the procedure: Trauma after touching cornea w/ suction cup or attempting to remove dry lenses		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

CONTACT LENS REMOVAL: SOFT LENSES

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult has eye trauma but the globe appears intact. You are asked to remove the soft contact lenses.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
*__Obtain rapid gross visual acuity__ ☐ Can read name badge ☐ Sees shape/shadow/motion ☐ Can count fingers ☐ Sees light projection only ☐ No Light Perception (NLP)		
__*Prepare and assemble equipment__ ☐ Contact lens storage case or 2 containers w/ lids ☐ Suction cup - optional ☐ Sterile saline without preservatives ☐ Towel or 4X4s		
* Apply BSI (gloves)		
__Prepare patient__ ☐ Remove external debris by gently touching adhesive tape against closed eyelids. ☐ Gently remove dirt, blood, or makeup from eyelids with 4X4s moistened with saline or cotton applicators. Do not dislodge clots. ☐ Place 2 mL of sterile saline into each specimen cup and label containers L & Rt. If a lens case is used, place a few gtts. of saline into each compartment. ☐ If eye appears dry, instill several drops of preservative-free sterile saline solution and wait a few minutes before removing the lens to help prevent corneal damage.		
Locate the lens in each eye: Can be seen moving on cornea when pt. blinks or by looking sideways across eye when shining a penlight across eye. They are less dangerous than hard lenses when left in place.		
Critical steps: It is safer for the lens to be entirely on sclera (white) or cornea (color) then partially on each. If unable to remove, slide to either position.		
Raise upper eyelid with index finger and hold it against the upper orbital rim. Place thumb on lower lid and gently pull down.		
Have pt look up and slide the lens downward onto sclera (white of eye) with index finger of other hand		
Compresses or pinch lens gently between index finger and thumb		
Remove lens from eye and place in separate, clearly marked ("right" and "left") containers filled with sterile saline solution		
State one complication of the procedure: Trauma as a result of touching the cornea while attempting to remove the lenses.		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

INSTALLATION OF TETRACAINE EYE DROPS

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult is experiencing severe eye pain after falling asleep wearing their contact lenses. You are asked to assemble the equipment and perform installation of tetracaine eye drops for possible corneal abrasions.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***Obtain rapid gross visual acuity** ☐ Can read name badge ☐ Sees shape/shadow/motion ☐ Can count fingers ☐ Sees light projection only ☐ No Light Perception (NLP)		
☐ Determine care provided prior to EMS arrival		
Prepare the patient ☐ *Confirm need for the drug ☐ *Confirm absence of allergy or contraindication to the drug		
Explain the drug action, possible side effects, and procedure to the patient		
* Select appropriate medication: Inspect packaging to confirm drug name, integrity of packaging; concentration, dose, and expiration date		
* Inspect solution for precipitation and change in clarity or color		
* Open package after verifying sterility of medication		
Perform procedure: * Universal precautions * Instruct patient to look up		
* Gently pull lower eyelid downward		
☐ *Without touching medication container to eye, instill 1 gtt. tetracaine into conjunctival cul-de-sac ☐ * Do not place drops directly onto the cornea		
Release lower eyelid and allow pt. to close eyes normally to distribute gtts Provide patient with tissue to absorb excess drops		
Critical Criteria: Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Performs any improper technique resulting in the potential for patient harm ☐ Exhibits unacceptable affect with patient or other personnel		

Factually document below your rationale for checking any of the above critical criteria.

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

EYE IRRIGATION

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult has experienced a chemical splash to their eyes. You are asked to assemble the equipment and perform eye irrigation.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
☐ **Determine type of chemical if known:** acid, alkali or other – but do NOT delay onset of irrigation ☐ Determine care provided prior to EMS arrival		
*** Prepare and assemble equipment** ☐ 1000 mL NS IV or any clean/non-toxic solution ☐ Gauze pads ☐ Towels ☐ Regular IV tubing ☐ Tetracaine gtts ☐ Bath basin		
* Universal precautions		
Prepare patient – move as quickly as possible ☐ Contact lenses may actually act as a barrier from caustics. Do not delay irrigation in order to remove contact lenses. Lenses generally are more easily removed after a period of irrigation and should then be discarded. ☐ Perform rapid visual acuity for light perception only while starting the irrigation procedure		
Explain procedure to patient if awake		
* Instill **tetracaine drops** per procedure. Note: The degree of pain is not necessarily a good indicator of severity of a chemical burn as the pain in one eye may mask the pain in the other. Alkali burns have been known to cause nerve damage, providing their own analgesic effect. With some caustics, the onset of pain may be delayed for hours.		
☐ Position patient on side if only 1 eye needs irrigation with affected eye downward or turn head to side. Place supine if both eyes must be irrigated. ☐ Place towel around neck; position bath basin to collect liquid		
Perform procedure * Apply dry gauze above and below eyelids. Ask patient to look upward and gently pull down lower lid		
☐ * Aim fluid from inner to outer canthus, avoid direct stream onto cornea. Irrigation must cover the whole surface of the external globe and extend into the conjunctival fornices. ☐ * Ask patient to look down and gently retract upper lid. Irrigate under upper lid. ☐ * Do NOT neutralize with a solution of opposite pH – will cause heat reaction ☐ * Do NOT use an O_2 nasal cannula as an irrigating tool. Does not ensure chemical removal from all eye surfaces ☐ May transition to a Morgan lens after 1 L of manual irrigation if available		
Remove any particulate matter with a moistened cotton applicator		
Continue irrigation enroute, repeating installation of tetracaine prn. Note: irrigation should be continued until eye pH returns to normal. This may require at least 30 minutes for acid burns and 2 to 3 hours (or more) for alkali burns. Assume the caustic is an alkali until proven otherwise.		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 2/19

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

EYE PRESSURE PATCH

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions*: An adult has sustained a possible corneal abrasion. You are asked to pressure patch the affected eye.*

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
***Obtain rapid gross visual acuity** ☐ Can read name badge ☐ Sees shape/shadow/motion ☐ Can count fingers ☐ Sees light projection only ☐ No Light Perception (NLP)		
* Inspect the eye for signs of perforation or penetration		
***Prepare and assemble equipment** ☐ Tetracaine eye drops ☐ Oval eye patches (2) or 4x4 gauze (2) for each eye to be patched ☐ Tape - at least three 9" lengths ☐ Towel or 4X4s		
*Apply BSI (gloves)		
State one contraindication to the procedure: ☐ Eye irritation as a result of infection ☐ Suspected open globe evidenced by hyphema, leak of aqueous or vitreous humor, tear-drop shaped pupil etc.		
Prepare patient ☐ *Instill several drops of tetracaine and wait a few seconds before applying the patch ☐ Cleanse skin around eye to remove debris, drainage, or residual eye medications		
Critical steps: Ask patient to close eyes		
Determine the number of eye pads needed to fill the depth of patient's eye socket		
*Fold oval eye patch in half or 4X4 in quarters		
*Position folded patch or 4x4 against closed lid. Cover first patch with one or more flat eye patches angled across eye to fill socket.		
☐ *Tape snugly in place with parallel strips of tape extending from central forehead to lateral cheek on both sides of patch. Before securing tape to cheek, lift cheek up, apply tape, and then release cheek. ☐ Avoid placing tape over side of nose or nasolabial fold.		
***State one complication of the procedure:** ☐ Eye patches applied too tightly can result in eye damage ☐ Further trauma due to lid motion under a loose patch		
Critical Criteria: Check if occurred during an attempt ☐ Failure to take or verbalize appropriate body substance isolation precautions ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Performs any improper technique resulting in the potential for patient harm ☐ Exhibits unacceptable affect with patient or other personnel		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

PEDIATRIC MEASUREMENT using a LENGTH-BASED TAPE

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

***Instructions**:* You are asked to accurately use a pediatric length-based tape to measure the size/weight of various pediatric size manikins and identify the information to be gained from the tape relative to catheter sizes, fluid volumes to infuse, drug doses, etc.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
* Apply PPE		
Use the most recent edition of a commercial tape. Broselow-Luten (2019)		
* Place child in a supine position on a flat surface | Never measure a child in the seated position		
* Place the Broselow™ Pediatric Emergency Tape next to them with the color-coded/weight side visible and the RED arrow aligned at the top of the patient's head (red to head)		
* Anchor the tape in place with the edge of one hand resting on the red box. Using your free hand, extend the tape from the patient's head to their heel (not extended toes)		
* Identify the color section on the tape at the child's heels		
State at least 4 points of information to be offered by measuring child's size with the tape: ☐ *Approximate weight of the patient ☐ *Medication dosages ☐ *Equipment sizes: (i-gel size, suction catheter, oral/nasal airways) ☐ *Fluid bolus amounts		
If the child is longer/larger than can be measured with the tape (> 34 kg), stop and proceed as you would with an adult patient		
* Document patient's estimated weight in kg and their color code on the patient care report		

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Rating: (Select 1)

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☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 1/23

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

PEDIATRIC ADVANCED AIRWAY ADJUNCTS (Age ≤12 yrs)

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Notes from 2019 SOP: *If BLS unsuccessful: May make 1 attempt at advanced (alternate) airway per SOP and local protocol. Repeat attempt requires OLMC order.*

Instructions: *An unconscious child presents from a submersion incident with an impaired airway but protective airway reflexes intact with a carotid pulse present. No c-spine injury is suspected. Prepare the equipment and place an i-gel.*

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
* States indications **for advanced airway (extraglottic) airways in children**: ☐ Persistent airway impairment, ventilatory failure (apnea, RR <12 or >40; shallow/labored effort; $SpO_2 \leq 94$; increased WOB (retractions, nasal flaring, grunting) → fatigue ☐ Inability to ventilate/oxygenate adequately after insertion of OP/NP airway and/or via BVM ☐ Need ↑ inspiratory pressure or PEEP to maintain gas exchange or sedation to control ventilations.		
BSI: Universal and droplet precaution		
☐ **IMC:** SpO_2 and $ETCO_2$: evaluate before and after airway intervention; auscultate breath sounds for baseline; confirm patent IV/IO; ECG monitor ☐ Consider and Rx causes of obstruction; position, suction, manual maneuvers, medications for an allergic reaction, FB removal with direct laryngoscopy; attempt to ventilate w/ peds BVM		
Prepare patient ☐ Position appropriately with pad under occiput or torso depending on age and size ☐ Open the airway manually ☐ AMS & airway patent: Gag reflex present: > 4 yrs: NPA; No gag reflex (all ages): OPA		
☐ **Preoxygenate 3 minutes:** **Apply NC 6 L**; maintain during procedure – PLUS: ☐ IF RR ≥ minimum normal for age: O_2 12-15 L/(peds) NRM - OR ☐ IF RR <12 or shallow: O_2 15 L/BVM q. 3 to 5 sec; pressure & volume just to see chest rise (Target SpO_2 ≥95%)		
Prepare equipment: Drugs & airway equipment per procedure ☐ Check suction source; attach rigid tip catheter; prepare i-gel and cricothyrotomy equipment ☐ Select i-gel based on child's size, not chronological age; measure w/ Broselow tape up to 35 kg **i-gel size / Pt Size / Pt wt (kg) / (LBS) / Broselow color / Suction size** 1.5 Infant 5-12 kg 11-25 Pink, red, purple 10 Fr. 2 Small child 10-25 kg 22-55 Yellow, white, blue 10 Fr. 2.5 Large child 25-35 kg 55-77 Orange 10 Fr.		
☐ Lubricate i-gel per procedure ☐ Commercial tube holder or tape, head blocks or tape, stethoscope		
☐ **If responsive to pressure and/or gag present: Sedation** (and Pain mgt)**: KETAMINE** 2 mg/kg slow IVP (over 1 min) or 4 mg/kg IN/IM. Allow for clinical response before insertion (if possible); See notes on peds sedation in IMC. ☐ **Contraindications/restrictions to using sedatives:** Coma with absent airway reflexes or known hypersensitivity/ allergy to drugs; consider need for BLS airways & BVM		
Place advanced airway per procedure: ☐ Maintain O_2 6 L/NC during procedure ☐ Monitor VS, level of consciousness, skin color, $ETCO_2$, SpO_2 q. 5 min. during procedure ☐ If HR <60 or SpO_2 < 95%: Pause & give 1 breath q. 3-5 sec w/ O_2 15 L//Peds BVM until condition improves.		
Confirm advanced airway placement ☐ Ventilate w/ 15 L O_2/peds BVM at age-appropriate rate; observe chest rise. Auscultate over epigastrium, both midaxillary lines and bilaterally over anterior chest. ☐ Definitive confirmation: $ETCO_2$ **Time of first breath:** _____		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
If successful: ☐ O_2 15 L/peds BVM continue ventilating every 3 to 5 seconds just to see chest rise ☐ Secure airway with commercial device. Reassess $ETCO_2$ & lung sounds. ☐ Apply lateral head immobilization. ☐ **Assess need for Post invasive airway sedation and analgesia (PIASA) –** If SBP >70 + 2 X age or ≥90 if 10 yrs: ☐ **KETAMINE** 0.3 mg/kg slow IVP every 15 min OR ☐ **MIDAZOLAM 0.1 mg/kg slow IVP (0.2 mg/kg IN/IM)** (max single dose 2 mg). May repeat q. 2 min to total of 10 mg based on size and BP. ☐ Consider need for FENTANYL (standard dose) if restless/tachycardic and midazolam used for sedation ☐ Continue monitoring $ETCO_2$ & lung sounds to confirm adequacy of ventilations & tracheal placement		
If unsuccessful: Ventilate with O_2 15 L/peds BVM. May repeat attempt X 1 based on OLMC order.		
If advanced airway unsuccessful and good air exchange w/ peds BVM: Continue ventilations/BVM.		
If unable to place advanced airway or adequately ventilate with BVM: Consider need for cricothyrotomy: Children ≤12: needle; may attempt surgical cric in children 8 - 12 only per OLMC.		
* **Reassess**: Frequently monitor SpO_2, $EtCO_2$, tube depth, VS, & lung sounds enroute to detect displacement, complications (esp. after pt movement), or condition change If deteriorates, ✓ **D**isplacement of i-gel, **O**bstruction of tube, **P**neumothorax, **E**quipment failure (DOPE)		
State complications of the procedure: ☐ Post-airway **hyperventilation**: Use watch, clock, timing device ☐ **Barotrauma:** pneumothorax & tension pneumothorax; esophageal perforation ☐ Trauma to teeth or soft tissues ☐ Undetected malpositioning ☐ Hypoxia, hypercarbia, hypotension, dysrhythmia		
Critical Criteria: Check if occurred during an attempt (automatic fail) ☐ Failure to initiate ventilations within 30 sec after applying gloves or interrupts ventilations for >30 sec at any time ☐ Failure to take or verbalize body substance isolation precautions ☐ Failure to voice and ultimately provide high oxygen concentrations [at least 85%] ☐ Failure to ventilate patient at an age & size appropriate rate ☐ Failure to provide adequate volumes per breath [maximum 2 errors/minute permissible] ☐ Failure to pre-oxygenate patient prior to placing advanced airway and suctioning ☐ Failure to successfully ventilate and oxygenate effectively ☐ Failure to assure proper airway placement by $ETCO_2$ and auscultation of chest bilaterally and over the epigastrium ☐ Inserts any adjunct in a manner dangerous to the patient ☐ Suctions patient excessively or does not suction the patient when needed ☐ Failure to manage the patient as a competent practitioner ☐ Exhibits unacceptable affect with patient or other personnel ☐ Uses or orders a dangerous or inappropriate intervention		
Evaluator initials for each attempt		

Factually document your rationale for checking any of the above critical items below.

_____

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

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CJM 6/19

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Preceptor (Print name / signature)

NWC EMSS Skill Performance Record

PEDIATRIC IV INSERTION

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: A 4 y/o needs peripheral vascular access for a TKO line. You are asked to assemble the equipment, choose the correct size catheter from those available, and initiate an IV on the manikin.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Verbalize indications for IV: ☐ Fluid & elect replacement ☐ Drug administration Most urgently needed for: hypovolemia, hemorrhage, or prolonged cardiac dysfunction with acidosis		
Prepare patient and caregiver Use age-appropriate techniques to prepare the child. Inform them about procedure in terms they can understand (what they will experience and feel). Explain procedure to caregiver; provide reassurance.		
Prepare equipment ☐ *Select appropriate IV solution (NS) ☐ 1000 mL NS or ☐ 250 mL NS and examine covering for leakage or other damage. Open outer bag at the precut slit at either end. Take care not to cut or puncture the inner IV bag. ☐ *Verify sterility of solution (all seals in place). Check solution for leaks, clarity, cloudiness, contaminates, precipitation, and expiration date.		
Spike IV bag & prime IV tubing ☐ Remove infusion set from package; uncoil tubing; close clamp, remove spike protector without contaminating spike or the needle adaptor. ☐ Turn IV bag upside down with IV & medication ports facing up; remove cover from IV port, maintain sterility of port ☐ *Insert tubing spike into IV port with a pushing and twisting motion until it punctures seal. ☐ *Invert bag. Grasp IV set at drip chamber and squeeze. Fill drip chamber ⅓ to ½ full or to the fill line. ☐ *Open clamps and/or flow regulator to flush (prime) line with NS. May temporarily remove end cap to facilitate procedure, but not necessary. Remove all large air bubbles from tubing. (Empty IV tubing contains ~30 mL of air. This could cause a lethal air embolus if all infused into the patient.) ☐ Clamp tubing shut. Recap end if removed to flush tubing. ☐ Hang IV or have someone hold bag. Place capped tubing end close to where line will be started for easy access.		
* Select appropriate **IV catheter**. Type of venipuncture device will depend on the child's age, activity level, purpose of IV, available veins, and site selected. Largest gauge catheter with the shortest length is preferred to allow rapid fluid infusion when volume resuscitation is necessary. ☐ Neonates 24-26 g ☐ Infants 22-24 g ☐ Children 20-22 g ☐ Adolescents needing fluids 16-18.gauge		
☐ CHG/IPA skin prep ☐ Gauze pads ☐ Tape ☐ 50-60 mL syringe w/ 3-way stopcock ☐ Skin protectant film ☐ Tourniquet ☐ Sharps container ☐ Tear 3-4 pieces of ¼-½" tape ~4-6" long ☐ IV protector shield; arm board		
Procedure * Observe strict Universal precautions & aseptic technique during catheter insertion		
Site selection/preparation Select vein that is pliable, appears long enough to accommodate catheter length without traversing a joint, and large enough to allow blood flow around the catheter. Commonly selected vessels: metacarpals on dorsum of hand, accessory cephalic, cephalic, and antecubital (often visible or palpable in children when other veins won't dilate, as in shock or severe dehydration). During CPR: use IO. Avoid veins in the inner wrist or arm -small and uncomfortable to access. Avoid sites with circumferential burns, infection, or marked edema; extremity with a suspected fracture. ☐ Expose extremity to be cannulated. Inspect for suitable site. ☐ Place small roll of gauze behind elbow to aid in hyperextension for antecubital site. ☐ May need to papoose child with sheet to protect their safety during procedure.		
* Apply venous tourniquet 4" proximal to selected IV site; palpate distal pulse. Never leave in place for more than two minutes as changes occur in slowed venous blood.		
* Lightly palpate veins with index finger. If it rolls or feels hard and rope-like, select another vein. Avoid points of flexion if possible. If vein easily palpable but not sufficiently dilated: ☐ Tap gently over vein with your finger. **Do not slap** - will collapse the vein.		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
☐ Place extremity in a dependent position ☐ Have patient open and close fist several times		
* Prep site with CHG/IPA*. Dry 30 sec. Do not contaminate by touching after cleaned.		
Catheter insertion per BD Nexiva instructions for adults		
* Anchor vein with thumb distal to insertion site, stretching the skin near the vein. Do not place your thumb directly over vein or blood flow will be occluded and veins will flatten. If using a hand vein, slightly flex patient's wrist.		
* Hold catheter between thumb and index finger of dominant hand (like a pool cue). Insert needle, bevel up (in relation to the patient's skin surface) through skin & vein at a 15-30° angle. (Very sharp catheters enter veins with little or no popping sensation.) Take care not to enter too fast or too deeply as needle can pass through back-side of vein.		
☐ Observe for blood return in flashback tubing ☐ If vein is missed, retract needle as described below, apply gauze dressing/Band-Aid and begin again with a new catheter at another site		
☐ If vein successfully cannulated: Lower catheter angle to almost parallel to skin & advance needle/catheter 1/8th inch to ensure proper tip positioning in vein ☐ If unable to enter vein, withdraw needle & catheter slightly, use caution not to withdraw needle tip out of skin. Re-attempt to advance into vein. If vein is missed or needle is pulled entirely out of skin, retract needle, apply gauze/Band-Aid and begin again with new catheter at another site. Limited to 2 attempts unless OLMC authorizes additional tries.		
Catheter advancement: * Hold flash chamber/needle stationary and use index finger to advance catheter off the needle into the vein up to its hub. (Needle provides guidewire effect for catheter advancement.)		
* **Release tourniquet** (Failure to release before needle retraction may result in blood exposure)		
Needle retraction per BD Nexiva instructions for adults: ☐ Discard shielded needle unit immediately into sharps container		
Connect IV tubing to catheter and establish IV flow: ☐ *Remove protective cap on IV tubing; slide end of tubing onto IV catheter hub; release pressure to vein ☐ Use of J loop preferred between IV catheter and IV tubing ☐ *While continuing to hold the IV catheter, open clamp on IV tubing to start fluid flow to establish patency, adjust desired flow rate. Note: When using a roller or screw clamp for flow regulation, rate must be monitored closely as vein spasm, vein pressure changes, pt. movement, bent or kinked tubing, and gravity drop height may cause flow rate to vary markedly. * If giving an IV bolus, calculate child's wt. X 20 mL/kg. Attach 60 mL syringe to stopcock; open stopcock to IV bag and withdraw appropriate amount. Turn stopcock to child and slowly push fluids. Repeat until correct amount given (over 5 min) while preserving the integrity of IV. If IVF is given too fast or too slowly, child may experience phlebitis, infiltration, circulatory overload, or insufficient resuscitation.		
Dressing/Stabilization: ☐ Peel lining from transparent dressing exposing adhesive surface; center dressing over catheter site; apply protective film over dry skin without stretch or skin tension, leave IV tubing connector to colored hub free. Slowly remove the frame while smoothing dressing from center to edges using firm pressure to enhance adhesion. ☐ Secure IV tubing with adhesive strips or commercial dressing as needed. Do not tape over IV connection sites. Do not conceal hub-tubing connection. ☐ **Protect the site**: Immobilize limb on an arm board. Position board so fingers curve over the end rather than being fully outstretched on a flat plane. Cover/protect site with a paper or Styrofoam cup sliced in half or a commercially available product secured over IV insertion area.		
* **Document** IV fluid, insertion site, # of attempts as successful or unsuccessful, catheter gauge, time started, flow rate and amount infused. Label IV bag.		
*State 2 signs of infiltration (D/C line) ☐ IV does not flow ☐ Local swelling ☐ Site pain/burning		
* State method to determine patency: check retrograde flow * State method to troubleshoot poorly running line (See adult IV access procedure)		
* Properly discard all disposable components; Sharps directly into sharps container		
State 3 complications of an IV (See adult IV access procedure)		
Note actual time for each attempt from start to finish:		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	Attempt 1 rating	Attempt 2 rating
☐ *Check if patent IV was not established within 2 minutes		
Monitor and document response to initial fluid bolus: improvement in capillary refill, mental status, skin color and temperature of the extremities, ↓ HR, and elevation of an initially low BP.		
Critical Criteria - Check if occurred during an attempt ☐ Failure to establish a patent and properly adjusted IV within 2 minute time limit ☐ Failure to take or verbalize appropriate body substance isolation precautions prior to performing venipuncture ☐ Contaminates equipment or site without appropriately correcting the situation ☐ Performs any improper technique resulting in potential for uncontrolled hemorrhage, catheter shear, or air embolism ☐ Failure to dispose/verbalize disposal of blood-contaminated sharps immediately in proper container at the point of use ☐ Exhibits unacceptable affect with patient or other personnel ☐ Uses or orders a dangerous or inappropriate intervention		

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Factually document your rationale for checking any of the above critical items below.

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_____

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

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☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

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Preceptor (Print name / signature)

CJM: IVPEDS 2/24

NWC EMSS Skill Performance Record

REMOVAL of CHILD from CAR SEAT for SPINE MOTION RESTRICTION

Name #1:	1st attempt:	☐ Pass ☐ Team repeat
Name #2	2nd attempt:	#1: [ ] Pass [ ] Repeat
Date		#2: [ ] Pass [ ] Repeat

Instructions: *A child presents with possible spine trauma following an MVC. Prepare the equipment and remove the child from the car seat and place them in spine motion restriction on a peds spine board.*

Performance standard 0. Step omitted (or leave blank) 1. Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2. Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Equipment needed ☐ Backboard/scoop stretcher of appropriate size ☐ Peds cervical collar ☐ Towel rolls and/or appropriate size ☐ Min. 2 rescuers ☐ Straps for board/scoop ☐ Heavy-duty scissors		
Prepare the patient *Apply manual c-spine motion control while keeping child as calm as possible; limit head and neck motion.		
Remove car seat padding from sides of the pt's head and neck if possible. If padding cannot be removed push into the seat as best as possible.		
To remove or loosen the harness: ☐ Unbuckle 5-point harness & remove from limbs. If seat has a removable clip or bar type device at the back for the harness system; remove so harness can be slipped out of the shoulder slots. If this is difficult, cut the straps with heavy-duty scissors. ☐ To loosen harness, check for tightening/loosening tabs at bottom of seat. Infant carriers may have a tightening clip on back of seat. If manipulating the straps causes movement of the pt. or is difficult, cut the straps.		
Place car seat at foot of the backboard/scoop stretcher. Tip seat backwards onto the device (child's torso flat; legs upward). The child should look as if a chair was tipped over and he or she is lying flat in the chair, with the back of the chair on the board (photo 1).		
☐ 1st rescuer positions self at child's head. Slide hands along each side of child's head until hands are behind child's shoulders. Support head and neck laterally with rescuer's arms (photo 2). ☐ 2nd rescuer controls child's body.		
The rescuer at head performs a 3 count. At count of 3, the child is slid upward out of the car seat onto the board/scoop and immobilized per usual procedure (photo 3)		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

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CJM 12/16

Preceptor (PRINT NAME – signature0



NWC EMSS Skill Performance Record

SECURING PEDIATRIC PATIENT: ACR4

Name #1:	1st attempt: ☐ Pass ☐ Team repeat
Name #2	2nd attempt: #1 ☐ Pass ☐ Repeat
Date	#2 ☐ Pass ☐ Repeat

Instructions: *Prepare the equipment and secure a child to a stretcher using the ACR4.*

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Equipment needed* ☐ Stretcher ☐ ACR4 straps and harnesses ☐ Child or manikin		
Prepare the patient* ☐ Measure child with Broselow tape if size unknown ☐ Explain to child/caregiver what you intend to do and each step as it is done.		
Prepare the equipment* Position 4 harness straps on stretcher frame. Place blue straps to desired position of patient and pass buckle through loop to secure to the frame. (Premark strap position for various sizes on stretcher)		
☐ Select appropriate size device (Extra small 4-11 lbs, Small 11-26 lbs, Medium 22-55 lbs, Large 44-99 lbs ☐ To attach harness, lay ACR on cot and secure using 4 buckles, ensuring straps are not taut and harness is not twisted		
Perform procedure* Place patient on top of flat, open harness. One rescuer holds child in place and engages w/ child.		
Release chest strap. Fit shoulder straps. Reconnect quick release chest strap.		
Feed straps through 'D' rings. White marker on strap must pass through 'D' ring and be visible. After straps are fed through 'D' rings, press hook and loop firmly together, ensuring correct position of white marker indicating minimum hook and loop contact area		
Fit and engage waist straps - Press firmly together. Pull waistband over and close hook and loop. Make sure hook and loop are correctly aligned and slide 3 fingers under harness to ensure it is not attached too tightly.		
Peel back outer waistband leaving inner attached.		
Position crotch pad centrally, close and engage upper strap, pressing firmly together, ensuring the markers (A-B) have a sufficient hook and loop engagement in the contact area.		
☐ Tighten the 4 harness straps ensuring patient remains central on the ambulance cot. ☐ Secure the patients legs with the stretcher strap if larger child		
General information: ☐ *If the device becomes contaminated, how should it be cleaned?* (Machine washable) ☐ *Can patient be transitioned quickly from sitting to flat or to the recovery position?* (Yes) ☐ *Can the device be used with the stretcher back rest in the raised position?* (Yes)		
Critical errors ☐ Failure to confirm that pt is secured properly ☐ Failure to manage pt as a competent practitioner ☐ Exhibits unacceptable affect with patient or other personnel ☐ Uses a dangerous adaptation of appropriate securing procedure		

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Rating: (Select 1)

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CJM 8/17

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

SECURING PEDIATRIC PATIENT: Ferno Pedi-Mate®

Name #1:	1st attempt:	☐ Pass	☐ Team repeat
Name #2	2nd attempt:	#1 ☐ Pass	☐ Repeat
Date		#2 ☐ Pass	☐ Repeat

Instructions: *Prepare the equipment and secure a child to a stretcher using the Pedi-Mate.*

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Equipment needed* ☐ Stretcher ☐ Pedi-mate ☐ Child or manikin		
Prepare the patient* ☐ Measure child with Broselow tape if size unknown ☐ Explain to child/caregiver what you intend to do and each step as it is done.		
Prepare the equipment* - Positioning on the stretcher ☐ Remove any devices attached to the cot ☐ Raise cot backrest; lock in place at 15-45°angle. Keep shoulders higher than pelvis; maintain proper center of gravity. ☐ Unroll Pedi-Mate and spread it flat on the cot mattress with all straps extended ☐ Center the blanket left to right on the mattress ☐ Position blanket with black backrest strap at point where you expect patient's shoulders to rest. ☐ Run ends of backrest strap around cot backrest until they meet in back, fasten buckle. Leave slack for final adjustment.		
Securing the Pedi-Mate ☐ Place pt on the Pedi-Mate. If the black backrest strap is not at the patient's shoulder level, adjust the blanket position. ☐ With blanket positioned, tighten backrest strap by pulling firmly on free end of strap until mattress is compressed ☐ Fasten a main frame strap by threading the free end downward between the cot main frame and mattress next to the head-end sidearm casing. ☐ Wrap the strap up around the cot main frame and fasten the buckle. Leave a little slack in the strap for final adjustment. ☐ Repeat with the other mainframe strap ☐ Tighten each main frame strap by holding onto the buckle with one hand and pulling firmly on the free end of the strap		
Perform procedure* - Securing the patient Pull crotch strap buckle up between patient's legs and lay the strap on the patient's abdomen.		
Lift shoulder strap over one shoulder. Place pt's arms through strap; lock buckle half into central buckle. Repeat other side.		
Thread shoulder strap onto the pt's left side through the chest clip and slide the chest clip to armpit level		
Snug shoulder/torso strap against pt's shoulder and chest by pulling the loose end of the strap with one hand while steadying the central buckle with the other hand. Repeat with the other torso strap.		
Snug the crotch strap by pulling on the free end.		
General information: ☐ *If the device becomes contaminated, how should it be cleaned?* (Machine washable) ☐ *Can patient be transitioned quickly from sitting to flat or to the recovery position?* (Yes) ☐ *Can the device be used with the stretcher back rest in the raised position?* (Yes)		
Critical errors ☐ Failure to confirm that pt. is secured properly ☐ Failure to manage pt. competently ☐ Exhibits unacceptable affect with patient or other personnel ☐ Uses a dangerous adaptation of appropriate securing procedure		

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Rating: (Select 1)

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CJM 8/17

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

DRESSING & BANDAGING – superficial wound

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Apply PPE (gloves)		
Determine location of the wound and expose injured area (cut away clothing as appropriate, preserving evidence as necessary)		
Inspect wound for size, type, depth, nature (arterial/venous), amount and type of bleeding, debris, & foreign bodies. Remove loose debris or F/B.		
Remove all jewelry from the injured area and distally		
Select appropriate size dressing		
Open dressing using sterile technique and place over the wound site. Apply direct pressure with hand over the dressing.		
Secure dressing with a bandage, using roller gauze, wrapping distally to proximally. If a limb, leave fingertips or toes exposed to check distal neurovascular status. Secure the bandage with tape.		
Assess pain and consider need for pain medication; apply cold pack to reduce swelling.		
Note the rate at which a dressing becomes saturated with blood and apply additional pressure or consider need for more aggressive hemorrhage control		

Comments_____

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Rating: (Select 1)

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Preceptor (Print name / signature)

5/14

NWC EMSS Skill Performance Record

HEMORRHAGE CONTROL- Use of Hemostatic gauze –Tourniquets

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
☐ Apply PPE **Expose wound; Assess for nature of bleeding:** ☐ Type (arterial, venous, capillary) ☐ Source ☐ Amount ☐ Rate ☐ Explain all interventions to patient		
Apply **direct digital pressure** using palm of hand over a single layer sterile dressing placed over wound unless contraindicated (open scalp wound w/ possible unstable fx) or more aggressive measures indicated (exsanguinating wound)		
Bleeding persists: (Direct pressure ineffective or impractical; wound not amenable to tourniquet e.g. trunk, groin, neck, head or other location where a tourniquet cannot be used – pack wound with **hemostatic gauze – Celox *Rapid* Z-fold preferred)** ☐ Cover all bleeding surfaces; tightly pack unfolding Celox *Rapid* directly to the source of bleeding in deep wounds. Pack remaining wound cavity with Celox (will likely be painful during packing process); mound up. Take care that Celox granules that slough off of dressing do not get into the eyes. ☐ Apply FIRM pressure using palmar aspect of hand over dressing for at least 1 min or until bleeding stops ☐ Once bleeding stops, apply pressure bandage (if an extremity) to hold dressing in place. ☐ Do not remove blood-soaked bandages from wound in the field, may cause more bleeding		
Severe extremity bleeding Verbalize need for a **tourniquet** ☐ * Mangled extremity; amputation ☐ * Arterial bleed ☐ * Direct pressure ineffective or impractical; hemostatic dressing ineffective in hemostasis		
Procedure for CAT® or TMT tourniquet Route band around extremity 2-3 cm proximal to wound; pass free-running end through inside slit of buckle or tighten buckle clip. If wound is over a joint or just distal to a joint, apply tourniquet just proximal to the joint. Do NOT apply over a joint or a fracture.		
CAT: Pass band back through the outside slit of the buckle. This uses the Friction Adaptor Buckle which will lock band in place. Pull the band tight and securely fasten the band back on itself		
*Twist the Windlass Rod™ until bleeding stops and/or distal pulse is absent. Lock rod with the clip: Bleeding should be controlled. Secure rod with the strap.		
If bleeding continues, place 2nd tourniquet proximal to 1st		
*Reassess extremity; ensure bleeding has stopped. Tourniquet should be visible/well marked (time applied). Do NOT obscure with clothing or bandages. Continue reassessment enroute. Do NOT release tourniquet until patient reaches definitive care.		
Assess need for pain management: If hemodynamically stable – fentanyl per SOP		
Documentation (verbalize) ☐ MOI: Blunt, penetrating ☐ Site of tourniquet application: arm, leg; R or L ☐ Measures used prior to tourniquet application ☐ Time tourniquet applied ☐ Who applied and/or removed tourniquet ☐ Success of hemorrhage control ☐ Total tourniquet time in minutes ☐ Whether pt required pain meds d/t tourniquet pain ☐ Tourniquet-related complications if known: ischemia damage, compartment syndrome		

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CJM 2/19

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

NEEDLE PLEURAL DECOMPRESSION

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult is experiencing severe shortness of breath following chest trauma and you suspect a tension pneumothorax. You are asked to assemble the equipment and perform needle pleural decompression.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
State indications for procedure/S&S of a tension pneumothorax ☐ ***Unilateral absence of breath snds** ☐ ***SBP < 90 (adult)** ☐ Severe dyspnea ☐ JVD ☐ Asymmetric chest expansion ☐ Pleuritic chest pain ☐ Hyperresonance to percussion on affected side		
State contraindications for procedure ☐ **SBP > 90** ☐ Simple pneumothorax		
***Prepare and assemble equipment** ☐ Adult: 10 g; 3"-3.25" needle or PneumoFix™ ☐ 10 mL syringe ☐ CHG/IPA prep ☐ Child 12 & younger: 14-16 gauge 1 ½ inch needle		
Attach 10 mL syringe to end of IV catheter		
*Observe Universal precautions (gloves & face protection); maintain aseptic technique		
Prepare patient: Explain procedure to patient if awake		
Perform procedure *Identify landmarks: 2nd-3rd intercostal space in midclavicular line on affected side		
Cleanse skin with CHG/IPA prep		
*Insert needle at a 90° angle to chest wall over superior border of 3rd or 4th rib		
*Listen for "pop" as needle penetrates pleural space; observe plunger move in syringe or sudden movement of the green indicator toward pt. if using Pneumofix. If aspirating with syringe, air or fluid may be withdrawn. Stop needle advancement.		
Assess radial pulses and ventilatory status for improvement		
*Holding needle in place, advance catheter into chest 2-3 cm or up to hub; remove needle – prevent catheter kinking; secure catheter to chest wall with ½" tape to prevent dislodgement. May place flutter valve over catheter hub by taping one finger cut from a disposable glove with small slit cut in the end.		
*Immediately place needle into a sharps container		
Reassess pt. to determine need for a second needle placement		
Verbalizes at least 2 **complications** associated w/ this procedure ☐ Hemothorax: Inadvertent puncture of costal vessels ☐ Pneumothorax if not pre-existing ☐ SUBQ emphysema ☐ Prolonged pain from injury to intercostal nerves		
Transport pt. to a Level I trauma center if ground transport time ≤ 30 min		

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CJM 10/21

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

CLOSURE OF AN OPEN PNEUMOTHORAX

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: An adult is experiencing severe shortness of breath following penetrating chest trauma and you suspect an open pneumothorax. You are asked to assemble the equipment and apply a vented chest seal.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
State indications for procedure/S&S of an open pneumothorax ☐ Penetrating chest trauma with visible defect ☐ *Unilateral to bilateral absence of breath snds ☐ Aphasia (inability to speak) ☐ Sucking sound from wound on inhalation ☐ Asymmetrical chest expansion ☐ SUBQ emphysema ☐ Severe dyspnea; hypoxia ☐ Frothing/bubbling at site		
Prepare patient: Explain procedure to patient if awake		
Immediately cover wound with gloved hand while prepping equipment		
***Prepare and assemble equipment: Commercial dressing**: The TLS Provider manual recommends use of a chest seal with an exhaust valve (Asherman chest seal, Bolin chest seal or Halo vent). All work well on dry skin with no blood coming from wound. Asherman and Bolin seals may more easily peel off wet skin compared to the SAM, HyFin, Russell, or FastBreathe seals. Laminated vent channels on other chest seals allow effective evacuation of blood and air from the pleural cavity and prevent tension hemopneumothorax. Laminated vent channels also prevent adhesive failure because blood does not accumulate behind the chest seals. ITLS recommendation: Based on local protocols, vented chest seals fitted with a laminated vent channel should be applied to patients with open pneumothorax.		
☐ Dressings should be at least 3 or 4 times the size of the defect. ☐ Open package, center dressing over wound. Peel away protective liner; avoid wrinkling during application ☐ Observe patient for improvement in ventilatory distress		
Note: Past recommendations were to place an occlusive dressing taped on 3 of 4 sides to allow air to egress and prevent a tension pneumothorax. These guidelines have not proven to be effective or realistic. Covering the wound improves respiratory mechanics, but the three-sided occlusive dressing is no longer recommended. Tactical Combat Casualty Care Guidelines recommend a vented chest seal and a non-vented seal if a vented one is unavailable		
Oxygen 12-15 L/NRM; assist with BVM as necessary. Use positive pressure ventilations with caution in pts who have penetrating chest wounds. High ventilatory pressures may force air from an injured bronchus into an adjacent open pulmonary vein, producing systemic air emboli. This may account for many of the dysrhythmias and sudden deaths that occur in patients with severe penetrating chest wounds.		
☐ Observe for development of a tension pneumothorax: May develop if penetrating wound has a one-way flap, is sealed with an occlusive dressing, or blood accumulates in the vent. ☐ If p.t becomes dyspneic and BP drops, temporarily lift/remove chest seal to release air or allow blood to escape. ☐ Assess need for needle pleural decompression if no improvement following removal of dressing		
Transport pt. to a Level I trauma center if ground transport time ≤ 30 min		

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CJM 2/24

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

APPLICATION of a rigid C-COLLAR

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
*State at least three **indications for spine motion restriction following blunt trauma** per national policy guidelines, position statements, and SOP: ☐ Acutely altered level of consciousness (e.g., GCS <15, evidence of intoxication) w/ MOI ☐ Midline neck or back pain and/or tenderness ☐ Focal neurologic signs and/or symptoms (e.g., numbness or motor weakness) ☐ Anatomic deformity of the spine ☐ Distracting circumstances/injury (long bone fx, degloving, or crush injuries, large burns, emotional distress, communication barrier, etc.) that impairs pt's ability to contribute to a reliable exam)		
*RESCUER #1 provides manual splinting of head/neck as found (in neutral alignment if possible). Never apply traction to neck or spine.		
*Assess/open/maintain airway, ventilations & gas exchange		
Select and prepare equipment *Rescuer #2: Use fingers to measure key dimension for proper collar sizing (imaginary line from top of shoulder where collar will sit to bottom plane of chin)		
*Rescuer #2: Apply key dimension to the collar by aligning fingers with the bottom edge of the plastic neck band. Select sizing window closest to the height of the stacked fingers. Adjust chin piece until the markers are visible in both windows of the chosen size collar. Press tab locks on both sides of collar to secure.		
Rescuer #2: Pre-form collar by flexing end w/o strap inward to triangular trach hole		
Collar application ***PT SITTING:** Rescuer #2: Apply collar by sliding chin support up the chest wall until collar is placed under the chin. Pt's chin should at least cover the central fastener.		
*Rescuer #2: Secure collar by using the trach hole as an anchor point. Gently pull posterior portion around back of neck and secure Velcro tab.		
***PT SUPINE:** Rescuer #2: Slide back of collar under neck. Position chin piece and fasten Velcro as above.		
Both positions: ☐ If heavy or bulky clothing is removed, pt. should be resized for an appropriately fitting collar ☐ *Pad occiput to keep head and neck in neutral alignment; apply lateral immobilizers.		
☐ ***Can SMR be properly performed with a c-collar only or pt in a sitting position?*** [NO]. ☐ ***What additional steps are needed?*** Stabilize rest of spine by keeping head, neck, and torso in alignment. Secure to a stable reference point. Options: scoop stretcher, long backboard, vacuum mattress, or ambulance cot. ☐ ***If the patient's head must be elevated, how should that be accomplished?*** Elevate the splinting device at the head while maintaining alignment of neck and torso. ☐ Use blocks, blanket roll, or head immobilizer so flexion, extension, and/or rotation of head/neck is minimized ☐ Secure pt. to cot, scoop stretcher, or long board with straps across shoulders, hips, knees		
Verbalizes: The collar should not impede mouth opening or airway clearance; obstruct airway passages or breathing; or be loose as to allow the chin to sink below the collar chin piece.		

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CJM 6/19

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

KENDRICK EXTRICATION (Vest-Type) DEVICE (KED)

Name #1:	1st attempt:	☐ Pass	☐ Team repeat
Name #2	2nd attempt:	#1: ☐ Pass	☐ Repeat
Date		#2: ☐ Pass	☐ Repeat

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Assesses pain, SMV in all extremities & need for extrication and spine motion restriction		
*__Verbalize at least 2 contraindications__ to use of KED or vest-type device: ☐ Unstable pt. or scene w/ possible spine injury. (use rapid extrication) ☐ A vest-type device could cause hypoventilation in a pt. w/ dyspnea ☐ Reliable pt. w/ uncertain or negative MOI w/ normal neuro exam		
*Rescuer #1 Apply manual stabilization to head and neck *Rescuer #2 Correctly size and apply c-collar		
Rescuer #2 Prepare KED for insertion behind patient		
*Rescuer #2: Slip body portion of KED behind pt. w/ smooth side towards pt's back. Straighten KED so pt. is centered in device and head support is behind head.		
Move leg straps down from stored position		
*Bring chest flaps around pt. Fasten middle strap first. (*MBLHT)		
Position firmly under armpits by using lift handles on side of unit		
*Fasten bottom chest strap next		
*Bring leg straps under buttocks; cross over to opposite side and secure into device unless contraindicated. Pad groin as needed.		
*Adjust head pad to fill gap between head and head support		
*Bring head flap forward and secure with straps over forehead and under chin piece of c-collar		
Release manual stabilization		
*Secure top chest strap last Check all straps for snugness before moving patient		
☐ *Place foot end of long board next to pt's buttocks, perpendicular to pt. Pivot pt. parallel to board. ☐ *Lift pt. slightly onto board and position supine maintaining axial alignment. Keep knees bent during position change.		
Once supine, disengage leg straps and lower legs to board; may loosen chest straps to ensure adequate ventilations		
*Secure pt. & KED to the long board with straps		
Reassess spine pain, SMV in all extremities		

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CJM 6/19

Preceptor (PRINT NAME – signature)

* MBLHT (My baby looks hot tonight helps recall the order of strap application: middle, bottom, legs, head, top)

NWC EMSS Skill Performance Record

HELMET REMOVAL

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

NOTE: Never apply traction to neck or spine. See SOP re removal of protective equipment.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
☐ *Rescuer#1: Kneel at pt's head, apply manual stabilization by palming each side of helmet & curling fingertips over helmet's lower edge so thumbs are on pt's mandible and index fingers are on the occipital ridges. ☐ *Rescuer #2: Position at pt's side near shoulder		
☐ *Perform primary assessment while patient supine w/ helmet in place ☐ *Remove chin strap or face shield if more direct access required for airway assessment ☐ *If airway/ventilations adequate; immobilize w/ helmet (pads) in place using tape and blanket roll and padding as necessary to maintain axial alignment		
State indications for procedure: ☐ *Helmet fails to hold head securely (loose-fitting) ☐ *Helmet/face shield prevent airway control even after removal of face shield ☐ Helmet has a face shield that cannot be removed within a reasonable period of time ☐ Helmet prevents proper immobilization for transport		
State contraindications for procedure: Untrained personnel unless obvious airway impairment evident & failure to remove helmet would compromise patient		
If pt awake, explain procedure. Instruct pt. not to attempt to help or to move. (Assess/document SMV)		
If helmet has snap-out ear protectors, pry them loose with a tongue blade and remove. If helmet has an inflatable pad, DO NOT decompress air bladder until after the next step.		
*Rescuer #2: Place one hand on mandible: thumb on one side and the long and index fingers on the other. Place other hand under base of occiput under the helmet and maintain axial alignment.		
If helmet has an inflatable air bladder, deflate bladder with an air pump needle while the Rescuer #2 continues to hold C-spine motion restriction. Detach any other removable padding to make helmet easier to remove.		
*If no inflatable air bladder: Rescuer #1 should reach inside helmet & spread sides away from pt's head and ears while gently pulling and tilting helmet upward slightly, clearing pt's nose. As helmet comes over the occiput, it may be necessary to tilt the helmet FORWARD slightly about 30° following curvature of pt's head. Remove helmet by carefully pulling it in a straight line.		
*Rescuer #2: Maintain in-line stabilization throughout the process to prevent c-spine motion. Slide hand under neck upwards as helmet is removed to provide occipital support and prevent head from falling back once helmet is removed.		
After removal, apply padding under head to maintain neutral position. Apply a c-collar and lateral immobilization and secure pt. to scoop stretcher with straps.		
Assess pain and SMV in all extremities after procedure.		

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Rating: (Select 1)

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CJM 6/19

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

SLING and SWATHE

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Apply PPE (gloves)		
Expose injured area (cut away clothing as appropriate, preserving evidence as necessary)		
Assess need for splint: pain, deformity, motor deficit, paresthesia, pallor, and/or pulselessness of injured shoulder, clavicle, or arm. Compare injured to uninjured side.		
Remove all jewelry & clothing from injured areas and distal extremity		
Cover all open wounds w/ sterile dressings per hemorrhage control SOP		
Consider need for fentanyl and benzodiazepine prior to splinting		
Apply gentle support and stabilization to the fracture/dislocation site while applying sling		
Place padding between arm and chest in axillary area		
Fold forearm of injured side across chest, with hand slightly elevated toward opposite shoulder		
Place **triangular bandage** under and over arm with point at elbow and two ends tied around the neck. Knot should be to the side of the neck.		
Envelope wrist and most of hand in the sling. Hand and wrist should not be able to drop out of sling. Keep fingers exposed to check neurovascular status. Keep hand and wrist slightly elevated.		
Pin or tie point end of a triangular bandage to form a cup for the elbow		
Alternative approach: Apply commercially available sling by inserting forearm into the sleeve and securing the strap (at the elbow) behind the shoulder and forward around the opposite side of the neck to attach to the hand portion of the sling. The sling straps should not hang forward in front of the neck on both sides.		
Reassess motor, sensory, and circulatory integrity of injured extremity after splinting to compare injured to uninjured sides		
Wrap a wide cravat or roller gauze around injured arm and body as a swathe to pull shoulder back and secure injured arm to body		
Transport in a sitting position		
Apply cold pack to reduce swelling		

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Preceptor (Print name / signature)

6/19

NWC EMSS Skill Performance Record

RIGID SPLINTS

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
State purpose of splinting ☐ Reduce pain ☐ Stabilize injury; provide substitute support ☐ Facilitate transfer and transport ☐ Prevent/minimize skin laceration; motion of broken bone ends; damage to muscle, nerves; restriction of distal blood flow; excessive bleeding		
Prepare/assess patient Explain procedure to patient		
*Completely expose the injured area (limb)		
*Assess need for splint and distal motor & neurovascular function prior to moving injured area: pain, position, paralysis or motor deficit, paresthesia, pallor, pulselessness, pressure. Compare injured to uninjured side.		
*Remove jewelry on affected limb. Secure w/ pt belongings. If unable to remove a ring with soap/lubricant, cold or string, consider a ring cutter.		
*Offer pain/antispasmodic meds before splinting if not contraindicated		
☐ *If angulated long bone fx with SMV impairment: apply gentle traction to both bone ends and attempt to realign. Constant firm pressure; NO jerky movements ☐ If resistance encountered or pt. c/o severe pain – STOP**.** Splint in position of deformity ☐ Splint joint injury as found		
*Cover all open wounds w/ sterile dressings; hemostasis per ITC SOP		
Prepare equipment: *Select a splint that immobilizes one joint above and one joint below a suspected fx.		
Pad splint or wrap limb distally to proximately with Webril if available. Overlap each layer by ½ the width. Smooth out creases. Apply extra padding to fill voids and over bony prominences. Omit step if using prepadded splint.		
Perform procedure – Generalized approach – adapt to device ☐ *Manually support site & minimize movement until splint is applied & secured ☐ *Apply splint per manufacturer's recommendations w/ minimal movement of injury ☐ Splint knees straight unless injured or angulated ☐ If forearm injury, have pt. hold (flex fingers over) a bandage wrap. Flex elbow to 90° if possible. Extend wrist to 20°; abduct thumb and flex finger joints to 70°.		
*Secure by fastening Velcro straps or w/ bandage or ACE wrap. Do not tape circumferentially (allow pressure relief).		
*Reassess distal motor & neurovascular integrity after splinting. Instruct pt to alert you if they experience numbness, color change, increasing pressure or pain.		
☐ *If possible; elevate injured extremity above level of heart ☐ Apply cold pack over injury site unless contraindicated		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 6/19

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

TRACTION SPLINTS

Name #1:	1st attempt:	☐ Pass ☐ Team repeat
Name #2:	2nd attempt:	#1: ☐ Pass ☐ Repeat
Date:		#2: ☐ Pass ☐ Repeat

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Prepare/assess patient Assess need for traction splint: Mid-thigh femur fracture & no need for immediate transport		
Verbalize at least 3 **contraindications** ☐ Partial amputation ☐ *Hip, pelvis injury ☐ *Knee or lower leg injury ☐ *Exposed bone ends		
State at least two **purposes** of traction splinting ☐ *Elongate muscle and decrease bleeding ☐ Reduce/overcome muscle spasm ☐ *Reduce pain ☐ Align bone ends; prevent further nerve, vascular & tissue damage		
Remove shoe & sock if easily accomplished and expose leg; remove toe rings		
Compare and note motion, sensation and circulation in both feet		
Offer pain/antispasmodic medications if not contraindicated		
Prepare equipment: May use unipolar or bipolar device; scoop stretcher or long spine board ☐ Place splint beside pt's uninjured leg; adjust to 8-10" longer than uninjured leg; lock splint length ☐ Adjust proximal and distal support straps		
Perform procedure – Generalized approach – know your device ☐ Manually stabilize site above & below fx so minimal to no motion occurs ☐ Apply ankle hitch/strap per manufacturer's directions		
☐ Hare: Elevate leg slightly, apply manual traction by pulling on ankle hitch straps (not rings); exert slow, steady pull in axial alignment. Use enough force to align limb to fit into splint; do not attempt to align fragments anatomically. ☐ If pain is severe, stop and immobilize as found with rigid splint or spine board. ☐ Single post: No elevation or manual traction		
☐ Hare: Once manual traction applied; 2nd RESCUER: Slide splint under the leg from the foot upward until the padded ring rests against pt's. ischial tuberosity ☐ Pad the groin area if necessary and secure the ischial strap ☐ Fold down foot stand until it locks into place		
Connect ankle strap to end of splint and turn ratchet until manual traction is replaced by mechanical traction. Traction is sufficient when injured leg is as long as uninjured leg or pt. feels relief.		
☐ Ensure that foot remains midline; not inverted or everted ☐ Verbalize action if pulse disappears after application of splint (inform OLMC; await orders)		
Secure proximal and distal support straps leaving injured area and knee open		
☐ Reassess motor, sensory and circulatory integrity of both feet ☐ Warn pt. to tell you if they experience weakness or numbness, ↑ pressure, or pain		
Place pt. on a long spine board, scoop stretcher, or vacuum mattress for transport		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

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☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 6/19

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

VACUUM SPLINTS

Name #1:	1st attempt: ☐ Pass ☐ Team repeat
Name #2:	2nd attempt: #1: ☐ Pass ☐ Repeat
Date:	#2: ☐ Pass ☐ Repeat

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Prepare/assess patient Assess need for splint: Swollen, painful or deformed extremity or possible spine injury		
Advantage: Angulated fx can be splinted as found as opposed to fitting them into a preformed splint		
Inform patient about the procedure		
*Expose injured area; remove all clothing, jewelry and secure w/ pt. belongings Remove any sharp or bulky items that may injure pt or damage the splint		
*Compare and note motion, sensation and circulation proximal & distal to injury		
*Cover open wounds with sterile dressings		
Offer pain/antispasmodic medications if not contraindicated		
Prepare equipment: Select appropriate size splint		
*Lay splint out flat, with all straps open and inner surface that will touch patient's skin (face up). May need to pad splint if using on frail skin.		
*Check splint integrity: rigidity will be compromised if leak or tear in splint or if valve is damaged or open		
Perform procedure – Generalized approach – know your device *Gently elevate and support area of injury as splint is placed beneath, then around injured limb, or use a scoop stretcher to place pt. into a body mattress splint (maintain spine alignment)		
Wrap splint around sides of limb, or lift edges of mattress to conform around contour of pt., starting at the head; secure with straps (chest, hips, legs)		
*Attach vacuum pump to splint and evacuate air until the splint feels firm and solid Splint should be rigid, conforming to the shape of the limb or body		
Close off vacuum valve and disconnect pump		
Ensure that splint does not shrink too much and become too tight when air is removed Readjust straps as necessary		
*Reassess pain; motor, sensory and circulatory integrity distal to the injury		
May place pt. on scoop stretcher for transport (vacuum mattress may take place of spine board)		
Monitor for cautions: ☐ Loss of vacuum will soften the splint and cause loss of immobilization ☐ Vacuum splints can make motor, sensory and neurovascular checks difficult		

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CJM 6/19

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

APPLICATION of a PELVIC SPLINT

Name #1:	1st attempt: ☐ Pass ☐ Team repeat
Name #2:	2nd attempt: #1: ☐ Pass ☐ Repeat
Date:	#2: ☐ Pass ☐ Repeat

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Prepare/assess patient Assess hemodynamic stability and need for splint: possible pelvic fracture ☐ Blood at urinary meatus ☐ Scrotal swelling/hematoma		
Verbalize no contraindications in emergent setting except open fracture		
Inform patient about the procedure		
Compare and note motion, sensation and circulation distal to injury		
Provide pain medication if not contraindicated		
Prepare equipment:		
Open KED- check all straps; have head pad within reach		
Perform procedure Gently slide KED upside down under patient from the feet up to the level of the greater trochanters without rocking the patient		
Draw ends of the KED together and create circumferential tension to stabilize the pelvis; ensure that splint is not too tight		
Place padding between legs, secure feet together		
Reassess motor, sensory and circulatory integrity distal to the injury		
Use scoop stretcher or vacuum body mattress to place pt on stretcher		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

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☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

SCOOP STRETCHER

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
State indications: Pt requires spine motion restriction and/or movement to the stretcher		
State contraindication: Pt size exceeds capacity of device		
Prepare scoop stretcher ☐ Adjust scoop to length of pt.; turn lock pegs where stretcher narrows to open sliding mechanism ☐ Pull bottom of the scoop out to desired length ☐ Lock into place by turning lock pegs in opposite direction (will hear a click when it locks in place)		
* Open mechanism at top and bottom of stretcher to separate into right & left halves		
Prepare the patient Explain process to patient		
☐ Position pt. supine unless contraindicated (impaled object on posterior of body ☐ Hold axial alignment and apply C-collar if indicated		
Fold patient's arms across chest		
Procedure * Slide one stretcher half beneath pt on each side, taking care not to pinch skin or clothing. Use a gentle see-saw motion to get each side under pt.		
* Lock stretcher back together at head and foot		
☐ Properly position head support & lateral immobilization; pad as necessary ☐ Secure pt to scoop stretcher with straps over shoulders, chest, pelvis & knees		
* Bring ambulance stretcher close to pt; put side rails down; lock wheels		
* Note: Scoop stretchers replace need for long spine boards for most pts. See System memo #349.		
* Lift scoop stretcher by end-carry method		
* Lower scoop stretcher gently onto stretcher		
* Secure patient to stretcher with straps per procedure		
* Reassess patient		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

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☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.
☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 6/19

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

START & JUMP START PRIMARYTRIAGE

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

Instructions: Use START and JumpStart triage to initially categorize patients for priority movement to the triage sector.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
START PRIMARY TRIAGE		
Use appropriate BSI		
Ask pts who can to walk to move to a safe designated area. If can walk: Tag GREEN		
Respiratory status		
* Assesses respirations ☐ If no respirations: open airway ☐ If breathing does not resume: tag deceased and move on ☐ If breathing resumes with airway maneuver: Tag RED (immediate) ☐ If breathing present - check rate. If >30: Tag RED ☐ If rate <30 - check perfusion		
Perfusion		
*** Assess radial pulse** ☐ If pulse absent or cap refill > 2 sec: tag RED; control bleeding ☐ If radial pulse present or cap refill <2 sec: check mental status		
Mental status		
*If pt cannot follow simple commands tag RED		
If pt follows simple commands tag YELLOW (delayed)		
JUMP START TRIAGE SYSTEM		
Use appropriate BSI		
* If patients are able to walk: tag MINOR and send to secondary triage		
* If patients cannot walk assess for breathing ☐ If breathing: assess respiratory rate: If <15 or >45 tag RED ☐ If no breathing: open airway – breathing resumes tag RED ☐ If apneic - check for a pulse. If absent tag BLACK (Deceased) ☐ If pulse present - give 5 rescue breaths, if remains apneic tag BLACK (Deceased) ☐ If breathing resumes - tag RED (Immediate)		
* If respiratory rate is 15-30 per min. - check pulse ☐ if pulse absent - tag RED (Immediate) ☐ If pulse present assess AVPU ☐ If AVPU is inappropriate or unresponsive - tag RED (Immediate) ☐ If AVPU is appropriate - tag YELLOW (Delayed)		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

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☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 12/16

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

Care of agitated, combative, violent patients
Use of RESTRAINTS

Date:	EMS Agency		
Name:		☐ Pass	☐ Re-education
Name:		☐ Pass	☐ Re-education
Name:		☐ Pass	☐ Re-education
Name:		☐ Pass	☐ Re-education
Name:		☐ Pass	☐ Re-education

Instructions: Use this checklist in conjunction with the NWC EMSS SOPs. System agencies and hospitals shall ensure that all EMS practitioners are competent in the use of devices, techniques, and medications used for EMS assessment, de-escalation, sedation, monitoring, and restraint of patients with a BHE. Agencies shall ensure that practitioners have training in communicating and engaging with individuals who are agitated, uncooperative, and/or violent (NAEMSP). Each EMS practitioner must have their competency assessed using this checklist annually. Randomly ask questions requiring a verbal response of all team members.

Performance standard	Yes	No
SCENE/Personal SAFETY: If in jeopardy, request law enforcement protection; withdraw until scene is safe for EMS ☐ Quickly evaluate the situation and resources (often with limited information available) ☐ Apply appropriate PPE /source control ☐ Call for help/additional resources if indicated		
Assess pt for imminent risk of harm to self or others: verbal; non-verbal, or written threats/threatening behavior ***List at least three examples of behaviors suggesting an imminent risk of harm:*** ☐ Combative ☐ Shouting ☐ Pacing ☐ Punching or kicking ☐ Anger ☐ Shaking fists ☐ Intentionally slamming doors ☐ Destroying property/vandalism ☐ Sabotage ☐ Throwing objects ☐ Self-injurious behaviors ☐ Disordered eating ☐ Physical attacks (hitting, shoving, biting, pushing or kicking) ☐ Extremes: rape; arson, use of lethal force		
Inspect environment for clues suggesting substance use (bottles, drugs, toxins); letters, notes, plans to harm others		
General pt appearance; hygiene, grooming, odors | Inspect for Medic alert jewelry; impairment; trauma		
☐ **Obtain collateral information from informants**: Hx (if known); recent mood, behavior, or thought changes ☐ Confer with law enforcement if applicable; determine the pt's condition prior to EMS arrival What happened to create the situation? What changed? What is the goal?		
Describe the spectrum of agitated behaviors: Anxiety to high anxiety, to agitated and cooperative to aggression. Patient may exhibit delirium with agitated behavior & a dangerous inability to understand the situation or dangers of their behavior. Associated motor activity is usually repetitive and non-goal directed: Foot tapping, hand wringing, hair pulling, and fiddling with clothes or other objects; may exhibit repetitive thoughts and statements; irritability, and hyper-responsiveness to stimuli		
Use the Richmond Agitation Sedation Scale (RASS), as part of the assessment and reassessment of agitated patients (See bottom of skill sheet)		
Role play at least 8 assessments that must be performed to determine decisional capacity Ability to understand and appreciate the nature and consequences of a decision re: medical Rx or foregoing life-sustaining treatment and the ability to reach and communicate an informed decision (755 ILCS 40/10 [1996], as amended by P.A. 90-246). Capacity can be influenced by medications, pain, time of day, mood, medical or mental illness. If any S&S below are abnormal/ impaired the pt may lack capacity Attempt to assess if changes are new (acute) or features of chronic dx and how grossly abnormal EMS interprets the exam findings to be.		
Has pt been declared an emancipated minor? ☐ Yes ☐ No | Has pt been declared legally incompetent? ☐ Yes ☐ No		
Alertness (Abn. GCS 13 or less): E (3 or 4 OK): V (5): M (6) Total:		
Orientation X 4: Answers accurately person, place, time, and situation (Abn. X 3 or less / 4)		
Speech: Speaks with normal rate, volume, articulation, content | (Disorganized, repetitive utterances?)		
Affect: Mood/emotional response (sad, depressed, flat, anxious, irritable, angry, elated, inappropriate, and incongruent with speech content)		

Performance standard	Yes	No
Behavior: Posture, gestures, abnormal movements, repetitive behaviors; is pt. quiet, restless, inattentive, hyperactive, agitated, violent? Is pt cooperative and able to remain in control?		
Cognition: Intellectual ability/thought processes - Note if linear, confused, disorganized, obsessive thoughts, not making sense; evidence of delusions, delirium, dementia, hallucinations, phobias, suicidal or homicidal ideations.		
Memory: Immediate, recent, remote (amnesia/dementia?)		
Insight: Can pt articulate lucid and logical implications of the situation and consequences to their choices? Do they understand relevant information? Can they draw reasonable conclusions based on facts and communicate a safe and rational alternative choice to recommended care?		
Assess for and Rx causes of AMS per symptom-specific SOP (Consider baseline/normal ranges for pt)		
BALANCE/Coordination – Ataxia (upper or lower extremities); tremors | EYES: Nystagmus		
☐ **A**: Alcohol/drugs/toxins (substance use); ACS/HF, arrhythmias, anticoagulation, anemia ☐ **E**: Endocrine/exocrine (thyroid/liver/renal/adrenal dx); electrolyte/fluid imbalances; ECG: dysrhythmias / prolonged QT ☐ **I**: Insulin disorders: ✓**glucose for hypo or hyperglycemia** (DKA/HHNS) ☐ **O**: O_2 deficit (**hypoxia – ✓ SpO_2**), **opioids/OD,** occult blood loss (GI/GU) ☐ **U**: Uremia; other renal causes including hypertensive problems ☐ **T**: (recent) Trauma, temperature changes (hypo-hyperthermia) ☐ **I**: Infections, neurologic and systemic (**sepsis**) ☐ **P**: Psychological*; poisoning; perfusion deficits; massive pulmonary embolism ☐ **S**: Space occupying lesions (epi or subdural, SAH, tumors); stroke, shock (hypotension), seizures ☐ **Neuro:** Delirium, dementia (Alzheimer's dx), developmental impairment, autism, Parkinson's dx; migraine/other HA ☐ **Metabolic**: Acidosis **(✓ $EtCO_2$)**, vitamin/dietary deficiencies; disordered eating / malignancies ☐ ***Psych/behavioral:** Anxiety or mood disorders; PTS, mental health crisis; personality and bipolar disorders; delusions, psychosis; hallucinations (auditory, visual, tactile)		
Determine decisional capacity + mental health safety risk ☐ **Low risk:** Flat affect; low suicide risk; thoughts disordered (confused) with insight, cooperative ☐ **Medium risk**: Intoxicated, disinhibited, no insight, unpredictable, cooperative ☐ **High risk:** Violent; agitated; aggressive, uncooperative; no insight | high risk to self/others		
Sequence the general approach to agitated/combative/violent patients: ☐ **IMC** special considerations | MEDICAL care = MEDICAL decision | Work collaboratively w/ mental health / LEO ☐ **Priority: Pt & Personal SAFETY |** Recognize warning signs | Wait to approach/maintain safe distance until adequate resources are available unless urgent interventions are indicated ☐ **Containment: Use least risk/force possible** to protect all from injury; facilitate assessment ☐ Take all reasonable steps to assess and properly care for an individual who is plainly in distress; do not require a pt with AMS to walk; lift and move using standards-based techniques; bring appropriate conveyance devices to pt; Rx life-threats ☐ Maintain dignity and protect modesty to the extent possible ☐ Express concern for their well-being; declare your intent to touch them for an assessment or safety hold ☐ Consider need for early O_2 ***General approach:*** ☐ **Verbal de-escalation & crisis communication** ☐ Defensive tactics ☐ Physical safety hold / physical device ☐ Sedation & monitoring		
Provide low stimulus & calm environment; limit responders to minimum safe levels, isolate from bystanders		
If S&S of anxiety | verbal aggression/confrontation | Cooperative | Low-medium safety risk: **Empathetic communication:** Verbally redirect and de-escalate when possible with coaching & reassurance **Respect personal space** while maintaining a safe position: maintain at least 2 arm's length distance and out of striking or kicking distance **Do not be provocative/antagonistic and avoid coercive interventions that escalate agitation**; Stay calm; body language must reflect desire to prevent a confrontation; avoid staring, clenching or concealing your hands, and closed body language that implies judgment **Establish verbal contact/rapport** (one responder) provide emotional reassurance**.** Speak in a calm, professional voice. Explain who you are; attempt to reorient them as able; do not yell or speak to them disrespectfully. Build a bond. Assure pt that the goal is to help resolve the issue and keep everyone safe. Do not reinforce delusions or hallucinations. **Be concise** Use clear, short sentences and simple words; give pt time to process and respond Repeat key information as needed		
Help pt manage their emotions or distress and maintain or regain control if possible **Identify wants and feelings:** Respond with empathy and compassion even if expectations are unrealistic		

Performance standard	Yes	No
Actively listen to complaints or concerns Try to find common ground; **agree or agree to disagree** but acknowledge patient's feelings		
A severely agitated person may be unable to engage in any conversation and requires very different interventions than one who is able to engage.		
Set boundaries and clear limits that are essential (mutual respect); calmly inform pt re unacceptable behaviors (violence) and potential consequences; communicate in a factual, nonthreatening manner. **Attempt verbal de-escalation**		
Offer realistic and alternative choices to violence and optimism if possible:		
If pt lacks decisional capacity	poses medium-high risk to self or others: **DO NOT LEAVE ALONE** ☐ Provide **continuous visual observation** and ability to intervene immediately ☐ Rx per implied consent ☐ Try to ensure safety of the physical space in which the patient is encountered and transported. ☐ Search for, secure, and remove items that could be thrown or used as a ligature point or weapon. ☐ Avoid extremes of sensory stimuli/sound (no lights or sirens)		
If patient is an immediate threat: try to isolate the aggressor in as limited an area as possible and evacuate others as quickly as possible by all means of egress available.		
Define physical restraint (May paraphrase): Direct application of force to an individual without the person's permission to restrict freedom of movement.		
Give 2 examples of patients on whom a form of restraint might be indicated *EMS practitioners face higher risks when caring for pts in the confined space of an ambulance or with limited resources in the field. These differences may require the use of restraint techniques and thresholds for the implementation of restraint techniques that are specifically intended for the out-of-hospital environment. These may differ from those used by health care providers within a hospital.* ☐ Physical restraint and pharmacologic management / sedation are only indicated to protect a patient, the public, and emergency responders from further injury, facilitate assessment, or allow for treatment of life-threatening injury or illness ☐ EMS practitioners should use the least restrictive restraint techniques to facilitate clinical patient assessment, medically indicated treatment, and safe transport to a hospital		
State at least 1 example of a soft restraint ☐ Roller gauze ☐ Sheets/blankets ☐ Chest Posey		
State at least one example of a hard restraint ☐ Velcro limb restraints ☐ Plastic ties ☐ Leather restraints		
State one example of a forensic restraint (Handcuffs)		
State who is responsible for a prisoner in handcuffs (Arresting law enforcement officer)		
State what an officer must give to EMS personnel if a prisoner is in handcuffs and they follow the ambulance in the police vehicle (Handcuff key)		
Verbalize 2 approved positions for a prisoner being transported in handcuffs behind their back ☐ Seated ☐ On their side		
Verbalize two civil torts (wrongs) that EMS practitioners can be accused of if restraints are incorrectly or inappropriately applied ☐ False imprisonment ☐ Assault/battery		
Have criminal charges been alleged against EMS relative to sedation and restraint use? *Yes; manslaughter, negligent homicide, and murder*		
State a Federal allegation that may be brought due to improper restraint use ☐ Violation of civil rights to liberty ☐ Use of excessive force under the Constitution		
Application of 4-point limb restraints		
Process steps (See SOPs) ☐ Avoid threatening or ALS interventions or restraint unless necessary for patient, crew/bystander safety. ☐ Explain to patient that their cooperation is needed in remaining still and in control. If they cannot do that right now that you will secure their arms and legs for their safety and protection. ☐ If patient remains an imminent risk of harm to self or others: Provide physical restraint. ☐ Ensure patient safety using continuous visual observation (CMS) ☐ Provide as much privacy as possible		
State the minimum number of rescuers needed to apply restraints to a violent pt. (5)		
Who must provide authorization for restraints either before or after their application? On-line medical control physician. In an emergency, apply restraints; then confirm necessity with OLMC		
*__Prepare equipment__ for full limb (4 point) restraint: 2 wrist; 2 leg restraints: Use proper size for patient and correct product to prevent patient injury.		

Performance standard	Yes	No
Plan the approach to the patient based on location, patient situation, & resources available		
Demonstrate application of 4-point restraints with team members ***Take patient safely down to a prone or supine position** ☐ *One person controls each limb by grasping clothing and large joints; ideally one controls the head ☐ Use only enough force to protect patient and/or EMS personnel (do not slam pt to ground or cot). ☐ Restraint should not be unnecessarily harsh or punitive. ☐ Never apply force to the neck or back Aguirre v City of San Antonio, 995 F.3d 395 (5th Cir. 2021) "it is clearly established … that exerting significant, continued force on a person's back while that person is in a face-down prone position after being subdued and/or incapacitated constitutes excessive force."		
*Adjust pt to a supine or side-lying position as soon as EMS has control of pt's movements		
☐ Expose area to assess limb SMV. Remove all jewelry from areas to be restrained. ☐ Apply limb restraint in compliance with manufacturer's directions for a particular product ☐ Ensure peripheral perfusion distal to restraint | Allow for rapid removal if ABCs compromised ☐ *Restrain 1 arm at side and other above head; both legs to cot or scoop stretcher ☐ Avoid injury | Never use prone, hogtie (hobble) positioning nor place under a backboard or mattress		
☐ *Place stretcher straps over bony prominences, crisscrossed over chest, pelvis, and legs in a manner that restrains movement, but ensures adequate oxygenation, ventilation and perfusion ☐ Secure straps to scoop stretcher or cot part that moves with the patient ☐ Secure straps out of patient's reach ☐ Cardiac arrest can happen quickly | Watch for sudden giving up, quiet compliance, collapse ☐ Use quick release ties for non-Velcro restraints for rapid removal if a medical emergency occurs that requires resuscitation		
State at least 3 signs of physical distress in individuals who are being held or restrained ☐ Shortness of breath ☐ Reduced/absent pulse distal to restraint (adjust application) ☐ Inability to speak ☐ Cool/pale limb distal to restraint ☐ Hypoxia ☐ Hyperthermia ☐ Pain due to restraint ☐ Cardiac dysrhythmia; unstable VS ☐ Soft tissue injury ☐ Patient continues to move/thrash about		
Under what circumstances are EMS personnel authorized to remove restraints once applied? EMS receives orders from OLMC to D/C restraint.		
What steps may EMS personnel take if a patient is biting or spitting at them? Place a surgical or oxygen mask over the patient's face		
Special populations		
Who must accompany a child in restraints? Responsible adult		
How can one compensate for an elderly adult's loss of sight or hearing? Reassuring physical contact		
What special accommodations must be made for hearing impaired persons whose primary mode of communication is sign language? Hands must be freed for brief periods unless freedom may result in physical harm		
****Besides normal EMS-related reporting, to whom must EMS personnel report a death of a pt while in restraints or following sedation?*** EMS MD *Within what time frame? ASAP;* 2 hours		
Sedation and monitoring indications/contraindications (Paramedics/PHRNs) ☐ Not used to prevent an agitated state**.** In severely impaired pts, rapid pharmacologic mgt/ sedation may be indicated to prevent adverse/life-threatening conditions and maximize pt safety. ☐ EMS practitioners must not give sedating medications based on LEO's request to an individual to facilitate arrest or to assist LEO to take the individual into custody.		
****State at least 5 complications of delirium and severe agitation if the pt is struggling before or after physical restraint application*** ☐ Aspiration ☐ Positional asphyxia ☐ Severe acidosis ☐ Trauma ☐ Hypoxia ☐ Hyperthermia ☐ Hyperkalemia ☐ Hypoglycemia ☐ Dysrhythmia ☐ STEMI ☐ Cardiac arrest ☐ Rhabdomyolysis ☐ Stroke		
Pharmacologic sedation and monitoring ☐ ******Which agent is used to achieve sedation for* ***anxious*** *patients?* Midazolam ☐ ******State the IN dose for adult patients* 0.2 mg/kg IN up to 10 mg ☐ ******State the IV dose for adult patients* 2 mg increments slow IVP q. 2 min up to10 mg ☐ ******State the IM dose for adult patients*: 5-10 mg (0.1-0.2 mg/kg) max 10 mg ☐ State the max dose for all routes: 20 mg if SBP ≥ 90 (MAP ≥ 65) unless contraindicated		

Performance standard	Yes	No
If hypovolemic, elderly, debilitated, PMH chronic dx (HF/COPD); prone to ventilatory depression (SCI); and/or suspect use of opioids or CNS depressants: reduce total dose to 0.1 mg/kg.		
☐ **Which agent is indicated to achieve sedation in violent, combative patients?* Ketamine Use care/caution with dose selection. ***How can body weight be accurately estimated?*** ☐ Mid-upper arm circumference (MUAC) formula: Wt in kg = 4 X MUAC (in cm) – 50 ☐ **State the IN/IM dose for adults* 4 mg/kg (max 300 mg) (OLMC required for addl. dose) ☐ **State the IV dose for adults* 2 mg/kg slow IVP (max 300 mg) **Optional dosing approach if urgent need for SEDATION and NO IV/IO & based on pt. wt.:** ☐ Up to 50 mg (1 mL) IN (NASAL) each nostril (unless contraindicated); may repeat within 90 seconds +/or ☐ Up to 150 mg (3 mL) IM (may use both thighs through clothing prn). Max cumulative dose: 300 mg per SOP.		
How must a pt be monitored after restraint and/or sedation administration? ☐ GCS ☐ RASS ☐ Airway ☐ VS ☐ SpO_2 ☐ $EtCO_2$ ☐ WOB ☐ ECG q. 5 min ☐ Document untoward events after sedation or restraint ☐ Watch for complications of delirium w/ severe agitation		
Follow infection control guidelines for cleaning restraints after removed from patient.		
Documentation: List at least 6 things that must be documented if a patient was placed into restraints:* ☐ Clinical justification for use | EMS assessment of pt safety | Rationale for type of intervention selected ☐ Failure of non-physical methods of de-escalation and/or restraint ☐ Reasons for restraint were explained to patient (informed restraint) ☐ Restraint order confirmed by OLMC - physician's name who authorized restraint ☐ If applicable: Describe how restraint was applied by others and reassessed by EMS ☐ Type(s) of restraint used ☐ Time of application; reassessments every 5 minutes ☐ Care during transport ☐ Any injuries or adverse outcomes sustained by patient or rescuers **Documentation in addition to usual history and exam (ImageTrend worksheet) ▪ Who called EMS? What happened? ▪ Where/when did event happen? ▪ Preceding factors (prior events) ▪ Decisional capacity/risk assessment findings ▪ Suicide screen (if applicable) ▪ Interventions (type and nature)/responses ▪ Any challenges encountered during the call ▪ Pt's access to lethal means of harm ▪ Types of threat alleged or observed: verbal or physical (nature) ▪ Witnesses; others involved; account of situation/statements by pt ▪ Verify injuries sustained: emotional/physical ▪ Evidence to support risk assessment (notes/social media posts) ▪ Scene factors/observations to support risk concerns ▪ Pt's stated preferences regarding Rx if different from EMS ▪ LEO/mental healthcare worker presence/engagement ▪ Patient disposition		
Critical errors ☐ Use of excessive force or pressure to neck or back ☐ Failure to assess and ensure patient safety throughout encounter ☐ Failure to position and support patient appropriately ☐ Performs in a way that could cause harm to a pt or is inconsistent with competent care ☐ Exhibits unacceptable affect with patient or other personnel		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

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CJM 1/23

Preceptor (PRINT NAME – signature)

Modified Richmond Agitation Sedation Scale (RASS)

Used for Behavioral Health Emergency patients prior to / during / after sedation

Score	Responsiveness	Speech
+4	Combative, violent, out of control	Continual loud outbursts or growling
+3	Very anxious and agitated	Loud outbursts
+2	Agitated, overstimulated but self-controlled	Fast speech; flight of ideas
+1	Anxious or restless	Normal, talkative
0	Awake, alert, calm, cooperative	Normal
-1	Drowsy, asleep, rouses to voice	Slurring or slowing
-2	Light sedation; rouses to physical stimulation	Marked slowing; few recognizable words
-3	Moderate sedation; responds to pressure stimulus	Words or no speech
-4	Deep sedation; no response to stimulus – hold further med	No speech

References:

Am College of Emerg Physicians (2020). Policy statement: Use of patient restraints

Beebe, C. (2018). Ligature-risk requirements. Patient safety. Accessed online: www.HFMmagazine.com

Day, S.W., Sharp, J., Jackson, G.L. et al. (2022). Management of aggressive patient situations. Am Nurs Journal, 17(4).

Garner, D.G., DeLuca, M.B., Crowe, R.P., et al. (2022). Emergency medical services professional behaviors with violent encounters: A prospective study using standardized simulated scenarios. Journal of the Am Coll of Em Physicians Open. Apr;3(2):e12727. DOI: 10.1002/emp2.12727. PMID: 35475121; PMCID: PMC9023872. https://onlinelibrary.wiley.com/doi/epdf/10.1002/emp2.12727

Klein, L.R. & Cole, J.B. (2021). Ketamine: Focusing on the facts and forgetting the fiction. Ann Emerg Med, 78(1), 132-139. PMID 34167728 DOI: 10.1016/j.annemergmed.2021.03.039

Kupas, D.F., Wydro, G.C., Tan, D.K. et al. (2021). Clinical care and restraint of agitated or combative patients by emergency medical services practitioners. Prehospital Emergency Care, 25(5), 7210723. DOI: 10.1080/10903127.2021.1917736.

Meyers M. (2022). Don't do these 5 things while de-escalating mental health/substance abuse crises. EMS1. Accessed online: EMS scene safety: de-escalating mental health/substance abuse crises (ems1.com)

Richmond, J.S., Berlin, J.S., Fishkind, A.B. et al. (2012), Verbal de-escalation of the agitated patient: Consensus statement of the American Association for Emergency Psychiatry Project ETA De-escalation Workgroup. West J Emerg Med, 13(1), 17-25. Doi: 10.5811/westjem.2011.9.6864. PMID: 22461917; PMCID: PMC329820

Salvatore, T. (2022). Beyond BLS: suicidality and postvention: What EMS needs to know about treating suicide attempts. EMS1. Accessed online: https://www.ems1.com/suicide/articles/beyond-bls-suicidality-and-postvention-wIQmfbsqG8wlBaRd/

Wolfberg, D. and Wirth, S. (2023). Malpractice or murder: When do EMS providers cross the line from negligence to a crime? EMS1. Accessed online: Malpractice or murder: EMTs charged with homicide in Moore case (ems1.com)

NWC EMSS Skill Performance Record

POST-Use ELECTRICAL CONDUCTED WEAPON - TASER

Name:	1st attempt: ☐ Pass ☐ Repeat
Date:	2nd attempt: ☐ Pass ☐ Repeat

***Instructions*:** *An adult has been subdued by law enforcement personnel using a taser. Please examine the patient and verbalize any treatment that you should provide.*

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1 rating**	**Attempt 2 rating**
Scene size up: Confer with police; determine pt's condition before, during & after taser discharge		
Perform a primary assessment ☐ SpO_2 ☐ ECG rhythm analysis for potential cardiac dysrhythmias ☐ 12 L ECG if: S&S that could be cardiac in nature, is elderly, history of CVD or drug use		
Secondary assessment. ☐ VS ☐ Hyperthermia ☐ Volume depletion ☐ Tachycardia ☐ Metabolic acidosis ☐ Determine SAMPLE history: date of last tetanus prophylaxis cardiac history; use of mind altering stimulants (PCP, methamphetamines, cocaine). ☐ Secondary assessment: Can have injury/illness that occurs before/during/after Taser event (fall)		
ITC: Supportive care ☐ Apply/maintain restraints if needed ☐ IV NS to correct volume depletion if present		
Anxiety and SBP ≥ 90 (MAP≥ 65): **MIDAZOLAM** 2 mg increments slow IVP **q. 2 min** (0.2 mg/kg IN) up to 10 mg titrated to response. If IV unable/IN contraindicated: IM 5-10 mg (0.1-0.2 mg/kg) max 10 mg single dose All routes: May repeat to a max total dose of 20 mg prn if SBP ≥ 90 (MAP ≥ 65) unless contraindicated If hypovolemic, elderly, debilitated, chronic dx (HF/COPD); and/or on opioids or CNS depressants: ↓ total dose to 0.1 mg/kg		
Uncooperative pt exhibiting violence/delirium with extreme agitation/great strength; numbness to pain ☐ Treat per Psych/BHE SOP: Verbal de-escalation; sedation & monitoring; restraint prn for pt/responder safety ☐ KETAMINE SEDATION dose: 2 mg/kg slow IVP (over 1 min) or 4 mg/kg IN / IM (max 300 mg) Contact OLMC if higher doses appear needed | See SOP appendix for dose chart Use w/ caution in patients with active psychosis		
Identify location of probes: DO NOT remove (Rx like impaled object)		
If probe becomes disengaged, check with law enforcement to see if they want probes as evidence. If not, handle as a sharp and dispose into a designated sharps container		
If probe remains attached to pt: Cleanse puncture sites and bandage per System procedure		
If patient has not had tetanus immunization in the last 10 yrs, advise to acquire it		
Strongly recommend transport for further evaluation		
If pt has decisional capacity and refuses EMS care and/or transport, advise to seek medical attention immediately if they experience any abnormal S or S. Provide disclosure of risk and obtain signature on refusal form. Contact OLMC from point of patient contact.		

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The practitioner can sequence, perform and complete the performance standards independently, with expertise and to high quality without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

CJM 11/22

Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

Donning & Doffing PPE: Droplet/Airborne Precautions

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Fail

Instructions: Select and prepare the equipment and don and doff PPE for droplet/airborne precautions

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1**	**Attempt 2**
☐ *Identify an area where it is safe to be unprotected and to apply PPE ***Prepare equipment:** Identify and gather the proper PPE. Ensure correct sizing. Check each item for defects. ☐ Isolation gown ☐ Eye protection (goggles or face shield) ☐ N95 respirator (procedure mask if unavailable). Required for aerosol-generating procedures. Healthcare workers (HCW) who wear respirators must be properly fit-tested initially and then periodically according to federal, state, and local regulations Size/style per fit test: ☐ Gloves ☐ Alcohol based hand rub (ABHR) ☐ EPA approved disinfectant wipes ☐ Waste container lined with a red biohazard bag		
If applicable ☐ Tie back long hair and control stray hairs ☐ Shave facial hair that prevents a tight face seal prior to donning an N95 respirator ☐ Remove jewelry		
***Perform hand hygiene:** If soap and water is unavailable, use ABHR for at least 20 sec until hands are dry ☐ Apply manufacturer recommended amount to the cupped palm of one hand and rub hands palm to palm ☐ Rub the right palm over the back of the left hand with interlaced fingers and vice versa ☐ Rub both palms together with fingers interlaced ☐ With left thumb clasped in right palm, rub rotationally and switch ☐ Continue to rub both hands together until the sanitizer is dry		
Donning		
***Isolation gown** ☐ Pick up gown and allow it to unfold in front of you without touching areas of your body that may be contaminated to minimize transmission of microorganisms. Put on gown and wrap it around the back of your uniform, making sure it overlaps and completely covers your uniform to prevent contact with the patient or environment. ☐ Tie all ties or fasten the snaps or pressure-sensitive tabs at the neck. Then tie the waist strings. Assistance may be needed from another HCW.		
***N95 Respirator** (or procedure mask if a respirator is unavailable or not required) ☐ Don N95 respirator by cupping outer portion of mask in your hand with nosepiece oriented up. Respirator should extend under chin. ☐ Secure top strap over crown of head and bottom strap around base of the neck ☐ Fit nosepiece by molding over nose with both hands. Do not bend, tent or pinch with one hand. **If using an N95 respirator** ☐ *Perform seal check: inhale & exhale quickly while using fingers to feel for air leaks around mask edges and nose **If using a procedure mask** ☐ Place mask snugly and completely over nose and mouth. Secure ear loops around ears or tie strings at the middle of the back of your head and neck so the mask won't slip off. If mask has a metal strip, squeeze to fit your nose firmly but comfortably. If you wear eyeglasses, tuck upper edge of the mask under the lower edge of the glasses.		
***Eye protection** ☐ Choose eye protection according to the risk of exposure. Goggles provide eye protection, but don't protect the rest of the face from splashing of potentially infectious substances. Wear a face shield for any procedures that may involve spraying or splashing of respiratory secretions or other body fluids. Put on eye protection (goggles or face shield) ensuring it does not interfere with N95 fit		

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1**	**Attempt 2**
***Perform hand hygiene again before donning gloves:** Use ABHR for at least 20 sec until dry		
***Gloves** ☐ Put on gloves in a size that is comfortable and conducive to providing patient care ☐ Ensure gloves cover the gown cuff (wrist) and cover the edges of the gown sleeves		
Doffing		
*Choose a safe doffing location that is at least 6 feet from the patient and in a way that you will not contaminate yourself or the environment		
***Removal of gown and gloves** ☐ **Gown and gloves together:** Gently break all straps, untie all ties. Reach up to the shoulders and carefully pull gown down and away from body. Roll gown down inside out and away from the body. Once gown is rolled down, pull hands out while removing gloves with the sleeves one arm at a time. Dispose of gown and gloves in a trash receptacle. ☐ **Gown and gloves separately:** Remove gown first as above. Dispose in a trash receptacle. Remove gloves next. Ensure glove removal does not cause contamination of hands using glove-in-glove or bird beak technique.		
***Perform hand hygiene** using ABHR for at least 20 seconds and until hands are dry		
***Remove face shield or goggles:** Carefully remove face shield or goggles by grabbing the strap and pulling upwards and away from head. Do not touch front of face shield or goggles. If item is to be reused, clean and disinfect all surfaces with EPA approved disinfectant wipes.		
***Remove and discard N95 respirator** (or procedure mask) without touching front of mask **If an N95 respirator** ☐ Remove the bottom strap by touching only the strap and bring it carefully over the head. Grasp the top strap and bring it carefully over the head, and then pull the respirator away from the face without touching the mask front). **If a procedure mask** ☐ Carefully untie (or unhook from ears) and pull away from face without touching mask front		
***Perform hand hygiene** after removing N95/procedure mask using ABHR for at least 20 sec		
Critical Criteria: Check if occurred during an attempt ☐ Performed improper technique in a manner that would result in potential exposure or contamination ☐ Incorrect sequence/timing, or omission of all starred (*) items ☐ Failure to correctly perform hand hygiene ☐ Failure to correctly discard any used or contaminated PPE		

Special considerations:

- If your respirator device is reusable, retain it for further use unless it's contaminated, damaged, or fails to form a good seal. Store it as directed. Reuse of respiratory protection may consist of removing and redonning the device between patient encounters. To avoid a transmission risk, to stringent hand hygiene before and after handling the respiratory protection device.
- Always perform hand hygiene before putting on gloves *to avoid contaminating the gloves with microorganisms from your hands*
- Use gloves only once.
- Isolation garb loses its effectiveness when wet *because moisture permits organisms to seep through the material.* Change masks and gowns as soon as moisture is noticeable or according to the manufacturer's recommendations or guidelines.

Scoring: All steps must be independently performed in correct sequence with appropriate timing and all starred (*) items must be explained/ performed correctly in order for the person to demonstrate competency. Any errors or omissions of these items will require additional practice and a repeat assessment of skill proficiency.

Rating: (Select 1)

☐ **Proficient**: The HCW can sequence, perform and complete all performance standards independently, with expertise and high quality and without critical error, assistance or instruction.

☐ **Competent:** Satisfactory performance without critical error; minimal coaching needed.

☐ **Practice evolving/not yet competent:** Did not perform in correct sequence, timing, and/or without prompts, reliance on procedure manual, and/or critical error; recommend additional practice

MJG/CJM 8-20-20 Preceptor (PRINT NAME – signature)

NWC EMSS Skill Performance Record

Reading a Mantoux Tuberculin skin Test

Name:	1st attempt:	☐ Pass	☐ Repeat
Date:	2nd attempt:	☐ Pass	☐ Repeat

Instructions: Demonstrate the procedures for reading, recording, and interpreting a tuberculin skin test.

Performance standard 0 Step omitted (or leave blank) 1 Not yet competent: Unsuccessful; required critical or excess prompting; marginal or inconsistent technique 2 Successful; competent with correct timing, sequence & technique, no prompting necessary	**Attempt 1**	**Attempt 2**
☐ *State the **timing of the reading**: After 48 hours but before 72 hours following injection of purified protein derivative (PPD) into the inner surface of the forearm. ***Prepare equipment:** ☐ Pen ☐ Caliper ruler marked in mm		
***Perform hand hygiene:** If soap and water is unavailable, use ABHR for at least 20 sec until hands are dry		
Position the person in an area of good lighting with the forearm slightly flexed on a firm surface		
Inspect the skin test site from a side view against the light as well as by direct light for redness, swelling, blistering, and induration (hard, dense, raised formation)		
***Palpate:** Using your fingertips, lightly palpate the site across multiple directions to determine if induration is present		
***Mark both edges of induration only (not redness)** at the widest width across the forearm (parallel with the watch band) using a pen held at a 45° angle		
***Measure** (accurately) the distance between the pen marks using a caliper ruler noted in mm.		
☐ **Record** the width of induration in millimeters (mm) ☐ Do not record as positive, negative, or inconclusive ☐ If no induration, record as 0 mm		
Interpreting the results		
Reaction size (mm) — Setting in which reaction is considered significant/positive		
>5-9 mm — People living with HIV infection | Recent contact with a person w/ infectious TB disease Abnormal chest x-ray findings suggestive of previous TB Immunosuppression: prolonged steroid therapy = to >15 mg/day of prednisone or those taking TNF-α antagonists; organ transplant recipients		
>10 mm - Foreign born or frequent travelers to areas where TB disease is common (Mexico, Philippines, Vietnam, India, China, Haiti, Guatemala) - Alcohol and substance use disorder | Mycobacteriology lab workers - Employees/residents of congregate settings (nursing homes, homeless shelters, correctional facilities) - Medical conditions (silicosis, diabetes, severe kidney dx, some cancer & intestinal conditions - People with low body weight (<90% of ideal body wt) - Children< 5 years old | Infants, children, & adolescents exposed to high-risk adults		
>15 mm — People with no known risk factors for TB		
☐ Record date + time test was read on the TB test card/form & the size of induration in mm ☐ Sign your name and credentials | ☐ Note adverse reactions (blistering, redness, swelling)		
All persons exhibiting a significant reaction (as above) should have a complete TB assessment Explain the significance of a positive reading and encourage rapid follow-up		
Promptly report all significant test results to the Department of Public Health		

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Rating: (Select 1)

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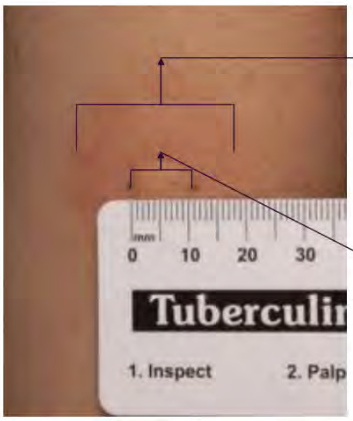
High risks for exposure

☐ Contacts of people known or suspected to have TB disease
☐ Foreign born or frequent travel to countries where TB disease is common
☐ Residents or employees at high-risk congregate settings
☐ Health care workers who serve patients with TB disease
☐ Populations defined locally as having an increased incidence of LTBI or TB disease☐
☐ Infants, children, and adolescents exposed to adults with increased risk for LTBI or TB

MANTOUX SKIN TEST (TST)

- NOT a vaccine or immunization
- Helps detect TB infection
- Do not use Tine test
- Injection of tuberculin into the skin
- Contains purified protein derivative (PPD)
- Does not contain dead or alive TB bacillus
- If infected with TB, immune system usually mounts a response

READING THE TST

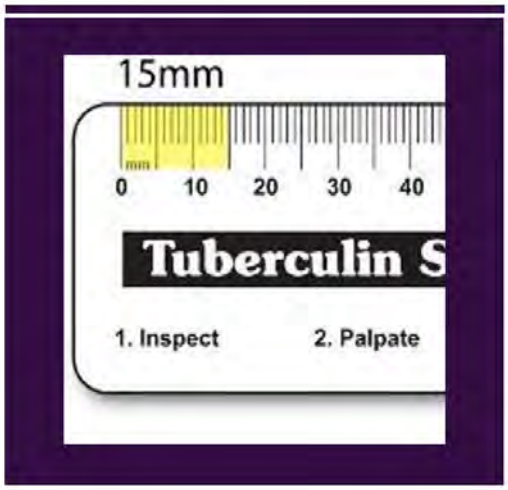


Erythema (reddening of the skin) - do not measure

Induration (hard, dense, raised formation)

5) Place "0" ruler line inside left dot edge

6) Read ruler line inside right dot edge (use lower measurement if between two gradations on mm scale)



INTERPRETING THE TST

Induration of 15 or more millimeters is considered (+) for

- People with no known risk factors for TB

(+) TST reaction will usually remain (+) with every test regardless if treatment was completed

Do NOT perform TST if history of (+) TST or completed TB disease treatment

References

AMBU. (2018). King Vision ® Video Laryngoscope Instruction manual for use with standard and channeled blades. Accessed on line: www.ambu.com

BD Nexiva video gallery of educational clips. See https://www.bd.com/en-us/comany/video-gallery?video+4464103615001

Bledsoe, B.E. et al. (2017). Paramedic Care Principles and Practice (5th edition) volumes 1-5. Boston: Pearson/Brady.

Cambridge Sensors USA. (2018). Microdot® Xtra Quick Reference Guide.

Cambridge Sensors USA. (2018). Microdot® Xtra Operations and quality assurance procedure manual for healthcare professionals. Accessed on line: www.microdotcs.com/assets/microdotxtra_operations-manual.pdf

LUCAS® 3 Chest Compression System – INSTRUCTIONS FOR USE 101034-00 Rev E, valid from COJ3201 © 2018, Jolife AB

Mayo Clinic. (2018). Ventricular assist device (VAD). Accessed on line: https://www.mayoclinic.org/tests-procedures/ventricular-assist-device/about/pac=20384529

Mercury Medical. (2018). FlowSafeII EZ Quick Start instructions. Accesed on line: www.mercutymed.com

Prometheus Deltatech. (2018). Russell PenumoFix®. Instructions for use (Boundtree).