**Post-intervention Test**

***Clinical Cases***

***Please answer the following questions. Please mark the most appropriate choice(s) for each question. There may be more than one correct answer per question.***

**Case I:**

You are the ICU fellow at a large private hospital, responsible for new admissions and evaluation of potential admits in the emergency department (ED). You are called to evaluate a patient for possible ICU admission. The patient has no insurance.

1. Are you required to see this patient?

* Legally-speaking no, but you see the patient anyways because “it’s the right thing to do”
* **Yes, it is required by EMTALA**
* It depends on your hospital’s policy
* No, the patient should be transferred to the local county hospital

1. Later that day, you are called to evaluate a patient with multifocal pneumonia who is currently on BiPAP in the ED. She is relatively stable, but will need further care in an ICU. You have no ICU beds available and you anticipate no discharges within the next 24 hours. Which of the following options are legally and practically feasible?

* Admit patient to a general care floor bed
* **Transfer patient directly to another facility’s ICU**
* **Board the patient in the ED until there is a bed available**
* **Transfer patient to another facility’s ED so that the patient can be admitted to their ICU after evaluation in the ED**

**Case II:**

You are expecting a patient with acute respiratory failure as a transfer from an outside hospital (OSH). The patient is going to be transferred to your facility by a critical care transport ambulance. The physician at the sending facility is asking you whether the patient is stable enough for transfer in a critical care ambulance.

1. If in doubt, who determines whether a patient can be accepted for transport via critical care ambulance?

* The attending physician at the sending facility
* The attending physician at the receiving facility
* **The EMS/ambulance on-call physician**
* Any physician involved in the patient’s care at the sending facility

The patient is intubated and mechanically ventilated. The current ventilator settings are notable for a positive end-expiratory pressure (PEEP) of 18. The patient had multiple changes made to his ventilator setting within the last hour, due to significant difficulties with ventilation.

1. Are the patient’s current ventilator settings within the acceptable range as defined in the our Medical Control Authority’s critical care transport protocols?

* No, patients can be hand-bagged only in the ambulance
* **Only if the patient is “stable” on the current ventilator settings**
* The PEEP is acceptable, only PEEP greater than 20 requires review by the EMS/ambulance on-call physician prior to transfer
* **The PEEP is greater than 10 and requires review by the EMS/ambulance on-call physician prior to transfer**

1. The patient has several indwelling lines. Which of the following lines will need to be removed prior to transfer, per our Medical Control Authority’s critical care transport protocols?

* Arterial Line
* Femoral triple lumen catheter
* Femoral Cordis catheter
* **None**

1. The patient is currently on several drips. If this patient was accepted, which of the following drips are not pre-approved (i.e., covered by standard protocols) for critical care ambulance transport *or* will need to be provided by the sending facility?

* Midazolam
* Morphine
* **Cisatracurium**
* **Epinephrine**

**Case III:**

You are transferring a patient with septic shock from your single-coverage rural emergency department to a large community hospital. The patient has urosepsis and is being treated per Early Goal Directed Therapy. She tells you that she is allergic to cephalosporins. The patient is currently receiving a dose of vancomycin and you ask the paramedics to start a dose of cefepime and metronidazole, provided by your pharmacy, en-route to the hospital. The patient has an anaphylactic reaction to cefepime, goes into cardiac arrest and dies despite resuscitation attempts by the paramedics.

1. Who is most responsible, legally, for the administration of the antibiotic despite the patient’s allergy?

* **You – you knew about the allergy and ordered the antibiotics**
* The paramedics who physically started the infusion
* The EMS Medical Director – the paramedics acted under his medical license
* The pharmacist who dispensed the antibiotics

1. The paramedics had already administered medications to treat the anaphylactic shock and cardiac arrest. They were authorized to do so by…

* **Standard EMS protocol**
* Verbal order from the EMS/ambulance on-call physician
* You will have to sign off on it
* The receiving facility’s physician will have to approve it

***Non-case Based Questions***

***Please answer the following questions. Please mark the most appropriate choice(s) for each question. There may be more than one correct answer per question.***

1. You are transferring a patient from your ICU to a tertiary care center by ground ambulance. The patient is septic and his blood pressure is borderline low. You wonder if the patient needs a central line and vasopressors.

* Patients with central lines cannot be transported by ground ambulance
* The paramedics will monitor the patient closely, should he require a central line, they can place one en route to the receiving hospital
* **If in doubt, it would be a good idea to place the central line now, as the paramedics are not trained to perform this procedure**
* Patients can be on a maximum of one vasopressor when transported by ground ambulance

1. When is the right time to transfer a patient, from a transportation medicine perspective?

* Patients should only be transferred if absolutely necessary and after all therapy options have been exhausted, as the risks associated with transfers usually outweigh the benefits
* **Transfer should be considered even before all other therapeutic options available have been exhausted, as most transporting agencies are unable to provide the same level of care as a hospital ICU**
* **The patient should be as stable as possible**
* Transfers lead to fragmentation of care, therefore, every critically ill patient should be transferred to a tertiary care center as early as possible

1. You would like to transfer a patient from your Emergency Department to a tertiary care facility. The patient’s condition requires review by the EMS/ambulance on-call physician who thinks that the patient is too unstable for transport in a critical care ambulance. What are your options?

* **The patient could be transferred by helicopter**
* **You or another qualified member of you hospital staff could accompany the patient in the ambulance**
* The patient will need to be completely stabilized prior to any transfer attempts
* You determine whether a patient is stable enough and you should override the EMS/ambulance on-call physician decision

1. You would like to transfer a patient with rapid atrial fibrillation to another hospital and you wonder whether you can send this patient on a diltiazem drip. You are waiting for a call back from the EMS/ambulance on-call physician, where could you find this information in the meantime?

* Printed copy of local EMS protocols that is available in your local Emergency Department, as required by state law
* **EMS protocols on the Medical Control Authority’s website**
* Website of the State EMS Medical Director
* Website of the American College of Emergency Physicians