109-2-11 Standards for type V air ambulance vehicles and equipment.

(a) The operator shall ensure that the patient compartment is configured in such a way that air medical personnel have adequate access to the patient in order to begin and maintain both basic and advanced life support. The operator shall ensure that the air ambulance has adequate access and necessary space to maintain the patient's airway and to provide adequate ventilatory support by an attendant from the secured, seat-belted position within the air ambulance.

(b) Each air ambulance operator shall have a policy that addresses climate control of the aircraft for the comfort and safety of both the patient and air medical personnel. The air medical crew shall take precautions to prevent temperature extremes that could adversely affect patient care.

~~(a) Each type V ground ambulance shall meet the vehicle and equipment standards which are applicable to that class of ambulance.~~

~~(b) The patient compartment size shall meet or exceed the following minimum specifications:~~

~~(1) headroom: 60 inches; and~~

~~(2) length: 116 inches.~~

~~(c) Each ambulance shall have a heating and cooling system which is controlled separately for the patient and the driver compartments. The air conditioners for each compartment shall have separate evaporators.~~

~~(d) Each ambulance shall have separate ventilation systems for the driver and patient compartments. These systems shall be separately controlled within each~~

~~compartment. Fresh air intakes shall be located in the most practical, contaminant-free air space on the ambulance. The patient compartment shall be ventilated through the heating and cooling systems.~~

~~(e) The patient compartment in each ambulance shall have adequate lighting so that patient care can be given and the patient's status monitored without the need for portable or hand-held lighting. A reduced lighting level shall also be provided. A patient compartment light and step-well light shall be automatically activated by opening the entrance doors. Interior light fixtures shall be recessed and shall not protrude more than 11 2 inches.~~

~~(f) Each ambulance shall have a at least two 80-amp/hr batteries and a 165-amp alternator. All conversion equipment shall have individual fusing which is separate from the chassis fuse system. Each ambulance shall have a 110-volt power source adequate to power all equipment which may be carried.~~

~~(g) Each ambulance shall have lights and sirens as required by K.S.A. 8-1720 and K.S.A. 8-1738.~~

~~(h) Each ambulance shall have an exterior patient loading light over the door which shall be activated both manually by an inside switch and automatically when the door is opened.~~

~~(i) The operator shall mark each ambulance licensed by the board as follows:~~

~~(1) The name of the ambulance service shall be in block letters, not less than four inches in height, and in a color that contrasts with the background color. The service name shall be located on both sides of the ambulance, and shall be placed in such a manner that it is readily identifiable to other motor vehicle operators.~~

~~(2) Any operator may use a decal or logo which identifies the ambulance service in place of lettering. A decal or logo shall not be less than 10 inches in height, and in a color that contrasts with the background color. The decal or logo shall be located on both sides of the ambulance and shall be placed in such a manner that it is readily identifiable to other motor vehicle operators.~~

~~(3) Any ambulance licensed by the board before January 1, 1995 which is identified either by letters or a logo on both sides of the ambulance shall be exempt from the minimum size requirements as indicated in paragraphs (1) and (2) of this subsection.~~

~~(j) The operator shall equip each type V ground ambulance with a direct, two-way radio communications system which is readily accessible to both the attendant and the driver. This system shall be capable of providing direct communications between dispatch and medical control at a hospital.~~

(c) ~~(k)~~ The operator shall equip each type V ~~ground~~ air ambulance with the following:

~~(1) a Halon or ABC fire extinguisher with at least five pounds of dry chemical, which shall be in the driver compartment and shall be easily accessible from an outside door;~~

~~(2) a second fire extinguisher which is either a halon, a CO2 or an ABC fire extinguisher with at least five pounds of dry chemical. The fire extinguisher shall be placed in the patient compartment or in an outside compartment and shall be easily accessible to an attendant;~~

(1) ~~(3)~~ Two portable functioning flashlights or one spotlight;

(2) ~~(4)~~ ~~one four or six-wheeled, all purpose,~~ multi-level cot with an elevating head and at least ~~two~~ three safety straps with locking mechanisms or an isolette;

~~(5) one urinal;~~

~~(6) one bedpan;~~

(3) ~~(7)~~ one emesis basin or convenience bag;

(4) ~~(8)~~ one complete change of linen;

(5) ~~(9) two~~ one ~~blankets~~ blanket;

(6) ~~(10)~~ one waterproof cot cover; and

(7) ~~(11)~~ a “no smoking” sign posted in the patient compartment and cockpit ~~driver compartments; and~~

~~(12) one pillow~~.

(d) ~~(l)~~ The operator shall equip each type V ~~ground~~ air ambulance with an internal medical system which includes:

(1) an internal oxygen system with at least two outlets located inside the patient compartment and with at least 2,500 ~~3,000~~ liters of storage capacity with a minimum of 200 psi. ~~The cylinder shall be in a compartment which is vented to the outside.~~ The pressure gauge and regulator control valve shall be readily accessible to the attendant from inside the patient compartment; ~~and~~

(2) The air ambulance operator shall ensure that the oxygen delivery system, all necessary regulators, gauges and humidifying accessories are available to the air medical personnel during in-flight operations~~.~~;

~~(2)~~ (3) an electrically-powered suction aspirator system with an airflow of at least ~~28~~ 30 liters per minute and a vacuum of at least 300 millimeters of mercury. The unit shall be equipped with large bore, non-kinking suction tubing and a semi-rigid, non-metallic oropharyngeal suction tip; and

(4) The air ambulance operator shall ensure that oxygen flow meters and outlets are padded, flush mounted, or located to prevent injury to air medical personnel, unless helmets are worn by all crew members during all phases of flight operations.

(e) ~~(m)~~ The operator shall equip each type V ~~ground~~ air ambulance with the following:

(1) a portable oxygen unit of at least 300-liter storage capacity complete with yoke, pressure gauge, and flowmeter with a minimum of 200 psi. The unit shall be readily accessible from inside the patient compartment;

(2) a portable, self-contained battery or manual suction aspirator with an airflow of at least 28 liters per minute and a vacuum of at least 300 millimeters of mercury. The unit shall be fitted with large bore, non-kinking suction tubing and semi-rigid, non-metallic, oropharyngeal suction tip;

(3) medical supplies and equipment which includes:

(A) airway management equipment, including tracheal intubation equipment, adult ~~and~~ , pediatric and infant bag-valve mask, and ventilatory support equipment;

(B) a cardiac monitor/defibrillator and an extra battery or power source;

(C) advanced cardiac life support drugs and therapeutic modalities, as indicated by the service's medical protocols;

(D) neonate specialty equipment and supplies for neonatal missions and as indicated by the service's medical protocols;

(E) advanced trauma life support supplies and treatment modalities, as indicated in the service's medical protocols; and

(F) a pulse oximeter and an intravenous infusion pump; and

(4) blood borne and body fluid pathogen protection equipment as described in K.A.R. 109-2-8.

~~(n) Each type V ground ambulance operator shall develop a list of supplies and equipment which is either carried on the ambulance or immediately available for use as each mission requires. This list shall include the supplies and equipment required by the board and any additional supplies or equipment necessary to carry out the patient care activities as indicated in the service's medical protocols.~~

~~(1) Each operator shall receive annual written approval from the emergency committee of the county medical society for the list of supplies and equipment carried on each ambulance.~~

~~(2) In those counties where there is no emergency committee of the county medical society, the operator shall receive approval for the list of supplies and equipment carried on each ambulance by the medical staff of the hospital to which the ambulance service primarily transports patients.~~

~~(3) Each operator shall submit the list of supplies and equipment carried on each ambulance to the board each year with the service's application for an ambulance service permit.~~

(f) ~~(o)~~ If an operator's medical protocols ~~or equipment list~~ are amended, the operator shall submit these changes to the board with a letter of approval pursuant to K.S.A. 65-6112 (n) and amendments to within 15 days of implementation of the change.

(g) ~~(p)~~ Equipment and supplies obtained on a trial basis or for temporary use by the operator need not be reported to the board by the operator. If the operator's medical equipment is amended, the operator shall submit these changes to the board within 15 days with a letter of approval from the service medical director.

(h) Each air ambulance operator shall ensure that each air ambulance shall have on board, at all times, appropriate survival equipment for the mission and terrain of the service's geographic area of operations

(i) Each air ambulance operator shall ensure the aircraft has an adequate interior lighting system so that patient care can be provided and the patient's status monitored without interfering with the pilot's vision. The air ambulance operator shall ensure the aircraft cockpit is capable of being shielded from light in the patient care area during night operations or red lighting or a reduced lighting level shall also be provided for the pilot and air ambulance personnel.

(j) Each aircraft shall have at least one stretcher which meets the following requirements:

(1) accommodates a patient who is six ft. tall, 212 pounds;

(2) is capable of elevating the patient's head at least 30 degrees for patient care and comfort; and

(3) (A) has three securing straps for adult patients; or

(B) has been specifically designed for pediatric patients.

(k) ~~(t)~~ Each air ambulance operator shall ensure that all equipment, stretchers, and seating are so arranged as not to block rapid egress by air medical personnel or patients from the aircraft. The operator shall ensure that all equipment on board the aircraft is affixed or secured in either approved racks or compartments or by strap restraint while the aircraft is in operation.

(l) The aircraft shall have an electric inverter or appropriate power source which is sufficient to power patient specific medical equipment without compromising the operation of any electrical aircraft equipment.

(m) When an isolette is used during patient transport, the operator shall ensure that the isolette is able to be opened from its secured in-flight position in order to provide full access to the infant.

(n) The aircraft shall have an external search light which shall be:

(1) at least 400,000 candlepower illumination at 200 feet;

(2) separate from the aircraft landing lights;

(3) moveable 90 degrees longitudinally and 180 degrees laterally; and

(4) capable of being controlled from inside the aircraft.

(w) Each air ambulance operator shall ensure that each air ambulance has on board, at all times, appropriate survival equipment for the mission and terrain of the service's geographic area of operations.

(o)Each air ambulance operator shall equip each rotorwing air ambulance with medical supplies and equipment which includes the following:

(1) airway management equipment including tracheal intubation equipment, adult and pediatric bag-valve masks and ventilatory support equipment;

(2) a cardiac monitor/defibrillator and an extra battery or power source;

(3) advanced cardiac life support drugs and therapeutic modalities as indicated by the air ambulance operator's medical protocols;

(4) neonate specialty equipment and supplies for neonatal missions as indicated in the service's medical protocols;

(5) advanced trauma life support treatment modalities as indicated in the service's medical protocols;

(6) a pulse oximeter and an intravenous infusion pump; and

(7) blood borne and body fluid pathogen protection equipment as described in K.A.R. 109-2-8.

(p) Each air ambulance operator shall ensure that all medical equipment is maintained according to the manufacturer's recommendations and does not interfere with the aircraft's navigation or on-board systems.

(q) Each type V service operator shall staff each type V ambulance with a driver or pilot, an attendant, or at least two allied health care personnel, one of whom shall be a physician, or a licensed professional nurse. Additional staffing shall be commensurate

with the patients care needs as determined by the services medical advisor or as described in the services medical protocols. The medical personnel shall remain in the patient compartment during patient transport.

(1) At least one of the medical personnel on each type V ambulance shall have completed and be current in Advanced Cardiac Life Support (ACLS) as in effect on January 1, 2011 which is adopted herein by reference, or the equivalent, as approved by the board.

(2) When performing neonatal or pediatric missions, at least one of the medical personnel on each type V ambulance shall have completed and be current in Pediatric Advanced Life Support (PALS) as in effect on January 1, 2011 which is adopted herein by reference, or the equivalent as approved by the board.

(3) When responding to the scene of an accident or medical emergency, not including transports between medical facilities, at least one of the medical personnel on each type V ambulance shall have completed and be current in one of the following programs as in effect on January 1, 2011;

(A) Advanced Trauma Life Support (ATLS)

(B) Flight Nurse Advanced Trauma Course (FNATC)

(C) Trauma Nurse Core Course (TNCC)

(D) Pre-Hospital Trauma Life Support (PHTLS) or

(Authorized by and implementing K.S.A. 1995 Supp. 65-6110; effective May 1, 1987; amended July 17, 1989; amended Jan. 31, 1997.)