



TITLE

**SECURING EMS STAFF, PATIENTS, PASSENGERS AND EQUIPMENT IN GROUND VEHICLES**

SCOPE

Provincial: Emergency Medical Services

DOCUMENT #

PS-EMS-01-05

APPROVAL AUTHORITY

Associate Executive Director, EMS Clinical Compliance,  
Training & Standards

INITIAL EFFECTIVE DATE

September 27, 2016

SPONSOR

Associate Executive Director, EMS Business Standards  
& Operations Support

REVISION EFFECTIVE DATE

Not applicable

PARENT DOCUMENT TITLE, TYPE, AND NUMBER

Operating EMS Vehicle Policy (#PS-EMS-01)

SCHEDULED REVIEW DATE

September 27, 2019

**NOTE:** The first appearance of terms in bold in the body of this document (except titles) are defined terms – please refer to the Definitions section.

If you have any questions or comments regarding the information in this document, please contact Policy Services at [policy@ahs.ca](mailto:policy@ahs.ca). The Policy Services website is the official source of current approved policies, procedures, directives, standards, protocols, and guidelines.

## OBJECTIVES

- To outline expectations for Alberta Health Services (AHS) **Emergency Medical Services (EMS) staff** in regard to securing EMS staff, patients, passengers and equipment within ground based emergency response and non-response **vehicles**.
- To support EMS staff in safely and consistently securing staff, patients, passengers and equipment within vehicles.
- To heighten awareness around the importance of always securing EMS staff, patients, passengers and equipment.
- To comply with organizational policy and accreditation requirements as well as Legislation. Legislation includes *Emergency Health Services Act and Regulations, Motor Vehicle Safety Act, Service Dogs Act, Vehicle Equipment Regulation of the Traffic Safety Act and Canadian Motor Vehicle Safety Act*.

## APPLICABILITY

Compliance with this document is required by all Alberta Health Services employees, members of the medical and midwifery staffs, students, volunteers, and other persons acting on behalf of Alberta Health Services (including contracted service providers as necessary).

## ELEMENTS

### 1. Securing EMS staff and Belongings in Vehicles

- 1.1 EMS staff will use proper safety restraints any time a vehicle is moving.
  - a) In the patient compartment of an ambulance, EMS staff will use either the 3 point lap\shoulder belt or the 2-point lap belt, depending on what is available based on the make and model of the ambulance.
  - b) In the cab of the ambulance and other vehicles, EMS staff will use the lap and shoulder belt.
- 1.2 EMS staff and **Specialty Medical Team** members are exempt from the use of safety restraints for the purpose of providing patient care in the patient compartment for the duration of the patient care duties. Once these duties are completed EMS staff and Specialty Medical Team members must use the proper safety restraints.
- 1.3 EMS staff and Specialty Medical Team members will maintain **three points of contact** at all times when moving about the patient compartment while the ambulance is in motion.
- 1.4 EMS staff will ensure personal belongings are properly secured in designated storage areas on the ambulance. Personal belongings must not sit loose within the patient compartment or cab of the ambulance/vehicle as they may create a safety hazard in the event of a sudden stop, collision, or rollover.

### 2. Securing Patients and Belongings in Vehicles

- 2.1 EMS staff attending the patient will ensure the patient is secured appropriately.
  - a) Patients transported on a stretcher will be secured using two shoulder straps and three cross straps at all times unless access to a patient's upper torso is required for medical or resuscitative procedures.
    - (i) Bariatric patients will be secured in accordance with *the Bariatric Response for Ground and Air Ambulance Policy and Procedure*.
    - (ii) Combative patients will be secured in accordance with the Adult Combative Behavior Medical Control Protocol (MCP).
  - b) Most supervisor vehicles have the capability to transport a single patient short distances on a scoop stretcher or backboard. Patients being transported in the back of a supervisor's vehicle on a scoop stretcher or backboard will be secured to it firmly. The scoop stretcher or backboard will then be secured to the vehicle using the straps and mounting hardware based on the make and model of the vehicle.

- (i) Patients are only to be transported in this way when located in an inaccessible area. The patient will be transferred from the supervisor's vehicle to an appropriate ambulance and stretcher as soon as they are transported to the nearest ambulance access point.
  - (ii) Some older ambulances have the capability to secure a second patient on a scoop stretcher or backboard that is in turn secured to the bench seat of the ambulance. In these ambulances, if you are securing a second patient, make sure the scoop stretcher or backboard is properly secured to the hardware designed for it based on the make and model of the ambulance. If you have any questions, contact your supervisor for guidance.
- c) Patients being transported on an Air Ambulance stretcher will secure the stretcher to the vehicle stretcher system using the air ambulance stretcher clip deck. The clip deck must have a minimum of two straps to be secured to the vehicle stretcher system. If not, the patient will be transferred from the Air Ambulance stretcher to the appropriate ground based EMS stretcher.
  - d) Patients not transported on a stretcher will use either the 3 point lap\shoulder belt or the 2-point lap belt, based on the make and model of the ambulance.
  - e) Some makes and models of Non-Ambulance Transport (NAT) vans have the ability to safely secure wheelchairs while the patient is seated in them. Before attempting to use one of these NAT vans, ensure you have had the proper training. If you are unsure of how to use this feature, contact your supervisor for assistance.
  - f) Patients in multi-patient vehicles will be secured to the stretchers or seats in the same manner as patients in the patient compartment of an ambulance.
  - g) At no time will a patient be transported in the cab area of an ambulance.

- 2.2 Pediatric patients, including neonates, will be transported in the safest manner possible using an appropriate restraint system where available.
- a) Neonates may be transported in a separate ambulance from the parent, if appropriate.
  - b) Avoid transporting pediatric patients, including neonates, in the arms of the parents/caregivers.
  - c) Appropriate pediatric patient restraint systems should have the *Canadian Motor Vehicle Safety Act* National Safety Mark on them with the date of manufacture and the date of expiry (Appendix A). If there is visible damage to the restraint system or it is expired look for a suitable alternative. Pediatric restraint systems may include, but are not limited to:
    - (i) A Pedi-mate
    - (ii) A child seat built into the ambulance airway seat (if applicable)
    - (iii) A convertible car seat if it can be properly secured in the patient compartment
- 2.3 When encountering a patient with a **Service or Guide Dog**, EMS staff should transport the dog in compliance with the *Service Dogs Act* (Alberta) and the *Guide Dogs Act* (Alberta), whenever possible.
- a) To date, regulations do not exist to specify where a service or guide dog should be placed during transport. EMS staff should ask the patient about the most appropriate method of transporting their service or guide dog.
  - b) The service or guide dog should not be transported in the driver compartment. Use a **dog vehicle restraint device** to tether the dog to a stationary object. For example, a secured stretcher or fastened seat belt.
  - c) Place leash on the appropriate collar ring to prevent injury or asphyxiation when securing the service or guide dog.
  - d) Cover sharp surfaces in perforated running boards to prevent lacerations to paws.
  - e) If in a non-emergent situation, consider applying a cloth isolation or cloth patient gown to the dog in order to contain hair and dander and to protect the dog while in the medical or non-medical facility.

- 2.4 Patient belongings will be stored in a storage area that does not interfere with patient care. Patient belongings will not be left loose in the patient compartment of an ambulance where they can become a projectile in the event of a sudden stop, collision, or rollover.
- a) Encourage patients to leave non-essential items at home or in the care of relatives, guardians or close friends.
  - b) Large items such as wheelchairs or walkers can be stored in an outside cabinet of a ground based vehicle if the make and model permits. If it is not possible to transport the equipment securely, equipment will be left with relatives, guardians, close friends or EMS staff will contact a Supervisor to discuss alternative arrangements.
  - c) If the patient will be transported by Air Ambulance, leave all large items such as wheelchairs and walkers at home.

### 3. Securing Passengers in Vehicles

- 3.1 EMS staff driving will ensure any passenger in the cab of an ambulance, or any other EMS vehicle, is secured using the lap and shoulder belt.
- 3.2 EMS staff attending will ensure any passenger transported in the patient compartment is secured accordingly.
- a) Passengers will use either the 3 point lap\shoulder belt or the 2-point lap belt, depending on what is available based on the make and model of the vehicle.

### 4. Securing Equipment in Vehicles

- 4.1 All equipment and supplies must be stored in their designated cabinets or holders when the vehicle is stationary and response ready and while the vehicle is in motion. For example, oxygen tanks will be stored either in the aluminum storage rack in the patient compartment or in the black oxygen crash rated bag that is affixed the foot of the Stryker brand stretchers.
- a) If a piece of equipment that does not have a designated holder is required during transport, it will be used and promptly returned to the proper cabinet for storage.
  - b) If a weight capacity has been identified and labelled on cabinet shelves or netting it is not be exceeded.
- 4.2 Equipment will not be attached or placed on the stretcher while the ambulance is in motion unless it is using a specifically designed and crash rated holder.
- a) Aviation approved Air Ambulance arches or bridges for securing equipment (e.g. pumps, monitors) are specifically designed to withstand

aircraft crash forces and are appropriate for use in a ground vehicle when transporting an air ambulance patient.

- 4.3 All equipment in a Paramedic Response Unit (PRU) will be stored in the designated areas within the equipment tree. If it does not have an equipment tree, utilize the rear most compartment with a safety net.
- 4.4 Specialty Medical Team equipment must be secured in available cabinets or compartments and must not be left unsecured in the patient compartment of the ambulance.
- a) When storing Specialty Medical Team equipment in outside cabinets, discuss and request that team members remove any equipment they may need during transport and secure it inside the ambulance where it is readily accessible. If you are unable to secure the equipment properly within the ambulance, contact your supervisor to make alternate arrangements.

## DEFINITIONS

**Dog Vehicle Restraint Device** means a dog leash/harness type device that connects to the seatbelt ensuring that the dog is safely restrained.

**EMS staff** means all AHS EMS direct delivery providers and contract service providers, including casual, part-time employees as well as volunteers of EMS.

**Guide Dog** means a dog trained as a guide for a blind person and having the qualifications prescribed by the regulations.

**Service Dog** means a dog trained as a guide for a disabled person and having the qualifications prescribed by the regulations.

**Specialty Medical Team** means a team of medically trained AHS employees that may accompany high-risk patients while they are being transported via ambulance. For example, a Neonatal Intensive Care Unit (NICU) team might accompany a premature neonate on an inter-facility transfer.

**Three points of contact** means having both feet and one hand in constant contact with floor and handles or both hands and one foot in constant contact with floor and handles.

**Vehicle** means any motorized or wheeled mode of transport requiring licensing to operate on public highways including, but not limited to, ambulances, cars, buses, vans, sport utility vehicles and trailers. This definition includes both emergency response vehicles and non-emergency response vehicles.

## REFERENCES

- Appendix A: *Canadian Motor Vehicle Safety Act*
- Alberta Health Services Governance Documents:
  - *Bariatric Response for Ground and Air Ambulance Policy (#PS-EMS-06)*
  - *Operating Emergency Medical Services Vehicles Policy (#PS-EMS-01 )*
- Alberta Health Services Resources:
  - *Emergency Medical Services Service and Guide Dogs Practice Support Guideline*
- Non-Alberta Health Services Documents:
  - Algoma District Services Administration Board (ADSAB, Ontario, Canada) Transportation of Passengers, Service Animals and Personal Items policies and procedures
  - *Canadian Motor Vehicle Safety Act*, Motor Vehicle Restraint Systems and Booster Seats Safety Regulations, Schedule 2 (SOR/2010-90)
  - *Emergency Health Services Act and Regulations (Alberta)*
  - Guide Dogs Act (Alberta)
  - *Motor Vehicle Safety Act (Canada)*
  - *Service Dogs Act (Alberta)*
  - *Vehicle Equipment Regulation of the Traffic Safety Act (Alberta)*

© 2020, Alberta Health Services, Policy Services



This work is licensed under a Creative Commons Attribution-Non-commercial-Share Alike 4.0 International license. The licence does not apply to AHS trademarks, logos or content for which Alberta Health Services is not the copyright owner. This material is intended for general information only and is provided on an "as is", "where is" basis. Although reasonable efforts were made to confirm the accuracy of the information, Alberta Health Services does not make any representation or warranty, express, implied or statutory, as to the accuracy, reliability, completeness, applicability or fitness for a particular purpose of such information. This material is not a substitute for the advice of a qualified health professional. Alberta Health Services expressly disclaims all liability for the use of these materials, and for any claims, actions, demands or suits arising from such use.

## APPENDIX A

## Canadian Motor Vehicle Safety Act

## 1. The National Safety Mark

- a. The Canadian Motor Vehicle Safety Standard (CMVSS) will be located on all approved car beds (e.g. Pedi-mate), booster seats, infant car seats and convertible car seats.



- b. The 'xxxx' should be replaced with either 213, 213.1, 213.2 or 213.5.
  - i. 213 in the case of a child restraint system.
  - ii. 213.1 in the case of an infant restraint system.
  - iii. 213.2 in the case of a booster seat.
  - iv. 213.5 in the case of a restraint system for infants with special needs.
- c. The 'YYY' should be replaced with an authorization number that is provided to the manufacturer. The exact number is not relevant in this context.