APPENDIX E

DEFINITION OF HIGHER PRIORITY USER SERVICES

User Services Suited for Manitoba

ID	User Service	Description
1.1	Traveller Information	Provides travellers with information prior to their departure to assist them in making mode choices, travel time estimates, and route decisions
2.1	Traffic Control	Manages the movement of traffic on streets and highways. It includes surface street controls such as traffic signal systems, adaptive traffic control systems and freeway control techniques such as ramp metering and lane control.
2.2	Incident Management	Enhances existing capabilities to identify incidents, formulate response actions, and support initiation and ongoing co-ordination of those response actions.
2.4	Environmental Conditions Management	Provides government agencies with the capability to enhance their air quality control strategies. The function provides both wide area and roadside emissions monitoring as well as Road Weather Systems and Services. Information is used by Traffic Demand Management in the Traffic Management Centre to mitigate pollution and may be provided to enforcement agencies to compel offenders to comply with standards.
2.5	Operations and Maintenance	Provides government agencies, as well as contractors with the resources to manage the operations and maintenance of vehicle fleet and equipment assets, and monitor and manage traffic flow around work zone areas.
2.6	Automated Dynamic Warning and Enforcement	Provides systems which warn vehicles or motorists of imminent danger, and provide electronic enforcement of traffic control and regulations.
3.1	Public Transport Management	Applies advanced vehicle electronic systems to various public transportation modes and uses the data generated by these modes to improve service to the public. It includes operation of vehicles and facilities, planning and scheduling, and personnel management.
4.1	Electronic Payment Services	Allows travellers to pay for transportation services by electronic means. The following functionality is provided: Electronic Toll Collection, Electronic Fare Collection, Electronic Parking Payment, and Electronic Payment Services Integration. It may also serve broad non-transportation functions and may be integrated with credit and debit cards in banking and other financial transactions.
5.1	Commercial Vehicle Electronic Clearance	Consists of both domestic and international border electronic clearances. As a vehicle approaches an inspection station or checkpoint, vehicle to roadside communications take place that identify the vehicle and make available to authorities the necessary data about credentials, vehicle weight, safety status, cargo, and occupants. Enforcement personnel can select potentially unsafe vehicles for inspection and allow safe and legal vehicles to bypass the inspection.
5.2	Automated Roadside Inspection	Provides automated inspection capabilities that check safety requirements more quickly and accurately during a safety inspection that is performed when a vehicle has been pulled off the highway at a fixed or mobile inspection site.
5.4	Commercial Vehicle Administrative Processes	Consists of electronic purchase of credentials, automated mileage and fuel reporting and auditing, and international border electronic clearance.

ID	User Service	Description
6.2	Hazardous Material Planning and Incident Response	Focuses on providing information to emergency response agencies at the scene of an incident.
6.4	Emergency Vehicle Management	Oriented towards reducing the time from the receipt of notification of an incident by an emergency services dispatcher, and the arrival of emergency vehicles on the scene. It includes emergency vehicle fleet management, route guidance to the incident scene or a suitable hospital, and pre-emption of traffic signals on an emergency vehicle's route to receive more green displays.
7.2	Infrastructure-Based Collision Avoidance	Improves the driver's ability to avoid or decrease the severity of collisions that occur at intersections or merge areas. The function of this service is to track the position and state of vehicles within a defined area surrounding an intersection, and may involve roadside-to-vehicle or vehicle-to-vehicle communications.
8.1	Weather and Environmental Data	Provides system wide gathering, fusion, and dissemination of information on roadway weather conditions and forecasts.
8.2	Archived Data Management	Provides a data warehouse of historical transportation data. The sub-services of the Archived Data Management user service provide the functionality to warehouse data as well as co-ordinate the distribution of the data to users.