

**City of Waukesha  
Paratransit Bus Supply Contract**

This Contract is by and between the City of Waukesha, a Wisconsin municipal corporation, 201 Delafield Street, Waukesha, Wisconsin 53188, referred to herein as the City; and North Central Bus & Equipment, Inc., 333 2629 Clearwater Road, St. Cloud, Minnesota 56301; referred to herein as the Supplier. Together, City and Supplier are referred to as the Parties.

Authorized Representative of Supplier:..... Paul Gauerke  
Supplier Telephone: ..... 877.485.9595  
Supplier Email: ..... paulg@northcentralinc.com

**Recitals**

The City published a Request for Proposals, referred to as the RFP, for a supplier of paratransit buses that would sell to the City up to eight paratransit buses of a certain specification at an agreed-upon price.

The City selected the Supplier as the winning bidder, and the Parties wish to enter into a supply contract whereby the Supplier will sell to the City paratransit buses as the City opts to purchase them.

Now, therefore, the City and the Supplier agree and contract as follows:

- 1. Agreement to Supply.** Supplier agrees that during the Term of this Contract, it will sell to the City up to eight paratransit buses (Buses), meeting the requirements and specifications stated in section 2, or as otherwise agreed upon in writing by the Parties in written purchase orders, at the Purchase Price determined according to section 3, below. The number of Buses to be purchased is in the City's sole discretion, up to a maximum of eight under the terms of this Contract, but the City may opt to purchase fewer than eight. Any purchases in excess of eight will be according to new terms and conditions negotiated by the Parties at that time. The City shall notify the Supplier of its intention to purchase Buses under this Contract by submitting written purchase orders to Supplier at the physical or email addresses shown above. Upon receipt of such purchase orders, Supplier shall process them promptly and in the usual and customary manner. The Supplier shall furnish the City with an estimated delivery schedule within 30 calendar days from date of order. The Supplier must be a motor vehicle dealer licensed to sell the vehicles throughout the life of this Contract, as the vehicles will be titled in the State of Wisconsin.
- 2. Requirements and Specifications.** All Buses supplied under this Contract shall meet the requirements shown in Schedule A. The initial Bus purchased under this Contract shall meet the specifications shown in Schedule B, and those specifications shall be the Base Specifications for all subsequent Buses purchased under this Contract, unless modified in the purchase orders issued by the City for subsequent Buses. Supplier will also abide by the terms of Schedule C, the Required Federal Provisions. Schedules A, B, and C are incorporated into this Contract by reference.

All Buses purchased under this Contract must comply with Federal Motor Vehicle Safety Standards and state standards listed in TRANS 301 of the Wisconsin Administrative Code. Secondary manufacturer shall affix a sticker certifying compliance in accordance with FMVSS rules. Supplier will incorporate in all Buses the latest technological advancements in the art of manufacturing to achieve maximum service life and superior appearance.

All materials used in the construction of Buses shall conform to ASTM, SAE, or similar association published standards. Manufactures standards that exceed any of the specification requirements shall be construed as acceptable. All materials and parts shall remain heavy duty-first quality to the maximum available and never downgraded to a lesser quality to meet the minimum needs of these specification requirements.

The body shall be built with suitable and easily accessible compartments provided for all apparatus, sound-deadening insulation wherever needed, and all operating devices so mounted as to reduce and keep all noises and vibrations to an absolute minimum, inside and outside the vehicle.

The Supplier will allow a City inspector to be on-site during vehicle production.

All Buses shall at a minimum meet requirements of C.F.R. Part 38 Subpart B - Americans with Disabilities Act (ADA) Accessibility Specifications for Transportation Vehicles; <https://www.govinfo.gov/content/pkg/CFR-2017-title49vol1/xml/CFR-2017-title49-vol1-part38.xml>.

3. **Purchase Price.** The Purchase Price of the Initial Bus shall be \$151,070.25/each, and the Purchase Price for subsequent bus purchases shall be adjusted according to changes in the Producer Price Index, and for changes in specifications and features that differ from those of the Initial Bus. The Purchase Price of buses purchased subsequent to the Initial Bus shall be calculated as follows:
  - a. **Adjustment of Base Purchase Price.** As of the date of the purchase order, the Producer Price Index for commodity code 1413, Truck and Bus Bodies, , shall be obtained from the most-recent Producer Price Index Detailed Report (Dec 1982 = 100, Unadjusted Index, Not Seasonally Adjusted) published by the US Department of Labor, Bureau of Labor Statistics ([https://www.bls.gov/ppi/ppi\\_dr.htm](https://www.bls.gov/ppi/ppi_dr.htm)). That index shall be divided by 256.1 (the index for June, 2019), and the resulting quotient shall be multiplied by \$151,070.25. The resulting figure shall be the base Purchase Price of the bus.
  - b. **Adjustment for Differing Specifications.** If the City specifies features or options in a bus that differ materially from the features and options of the Initial Bus, then the base Purchase Price shall be further adjusted, either to increase or to decrease, to account for the difference in price between the features and options in the Initial Bus and the features and options specified in subsequent buses, as agreed upon by the Parties in the purchase order.
4. **Delivery and Acceptance.** Vehicles are to be delivered to the Waukesha Transit Commission headquarters at 2311 Badger Drive, Waukesha, WI 53188. Delivery of vehicles must occur on weekdays from 8 am – 4 pm Central time. Each vehicle shall be delivered in new condition, ready for operation, and the vendor shall assume all responsibility and liability incident to said delivery. Transit Commission staff shall have authority to inspect all materials, equipment and workmanship and shall have the authority to reject all materials, equipment and workmanship that does not conform to the specifications or that is defective.

A vehicle shall be considered delivered and accepted when it has been determined that the vehicle meets or exceeds all contract specifications. A vehicle which does not meet specifications or is found to have flaws or damage will not be accepted, and it shall be the responsibility of the proposer/manufacture to put the vehicle into acceptable condition. Recipient will notify the dealer/manufacture of non-acceptance.

Acceptance of delivery or placement in operation of any vehicle shall not release the proposer/manufacture from liability for and repair or replacement of faulty design, workmanship or materials appearing even after final payment has been made.
5. **Warranty.** The entire OEM vehicle (bumper to bumper) shall be warranted for a minimum of three (3) years or 36,000 miles. The power train warranty (engine, transmission and alternator) shall be for a minimum 5 years or 60,000 miles and chassis shall be for a minimum of 3 years or 36,000 miles.

The entire vehicle shall be warranted to be free of corrosion for five years or 100,000 miles. (This requirement does not apply to superficial corrosion to undercarriage components.) The body structure shall be warranted for a minimum of 5 years or 100,000 miles.

6. **Non-OEM Component Warranties.** The following non-OEM components, if provided, shall be warranted to be free from defects as follows:
- a. Exterior LED Lights - three (3) years or 50,000 miles
  - b. HVAC System – two (2) years
  - c. Wheelchair Ramp - three years or 10,000 cycles for parts and (1) year or 3,000 cycles for labor.
  - d. All other equipment furnished under this contract shall be warranted for a minimum period of one (1) year, regardless of mileage. This warranty shall include defective materials and workmanship. Where accessories are to be supplied, they must be compatible with the rest of the product warranties.
  - e. All warranty work must be performed within fifteen (15) calendar days after the Supplier or its designated dealer receives the vehicle. If the Supplier fails to abide by these warranty terms, the City may have all necessary warranty work performed by a local service facility or have its staff perform the work, and charge the Supplier for the work.
7. **Term.** The term of this Contract shall be for five (5) years commencing from the date of execution.
8. **Integration.** This Contract constitutes the entire Agreement of the Parties. All other agreements and understandings of the parties with respect to the subject matter expressed in this Contract are unenforceable.
9. **Financial Assistance Contract.** Supplier shall comply with all terms and conditions required of third-party contractors by current contracts between the City, the Federal Transit Administration, and the Wisconsin Department of Transportation, as shown in Appendix C, which is incorporated into this Contract.
10. **Termination.** The City may terminate this Contract before its termination date in accordance with the Federal Termination Clauses in Appendix C in this Contract without cause by giving written notice to North Central Bus & Equipment, Inc. at any time.
11. **Assignment Prohibited.** This Contract may not be assigned by the Supplier without the City's written consent.
12. **Notices.** Notices to the Supplier shall be mailed to the address shown in the preamble to this Contract. Notices to the City shall be mailed or personally delivered to the attention of Brian Engelking, Transit Manager, Waukesha Transit Commission, 2311 Badger Drive, Waukesha, Wisconsin 53188.
13. **Audit and Inspection of Records.** The Supplier shall permit an authorized representative of the City to inspect and audit all data and records of the Supplier relating to its performance under this Agreement. The right of audit and inspections shall extend to authorized representatives of the U.S. Department of Transportation, the Wisconsin Department of Transportation, and the Comptroller General of the United States. The right to audit and inspect records shall extend until the expiration of three (3) years after the final payment under this agreement.

The Supplier further agrees to include in all subcontracts hereunder a provision to the effect that the subcontractor agrees that the City, the Wisconsin Department of Transportation, the U.S. Department of Transportation, and the Comptroller General of the United States or any of their duly authorized representatives shall, until the expiration of three (3) years after final payment under the subcontracts, have access to and the right to examine any directly pertinent books, documents, papers, and records of such subcontractor, involving transactions related to the subcontractor.

The periods of access and examination described above, for records which relate to appeals, litigation of the settlement of claims arising out of the performance of this Agreement, or costs and expenses of this Contract as

to which exception has been taken by the Comptroller General or any of his duly authorized representatives, shall continue until such appeals, litigation, claims, or exceptions have been disposed of.

- 14. Corporate Authorization.** The person executing this Contract on behalf of the Supplier represents and warrants that he or she is duly authorized to do so, and that this Contract is a binding obligation of the Supplier.
- 15. Costs of Enforcement.** The parties agree that in the event legal action is necessary to enforce any term or condition of this Contract, then the breaching party will pay the non-breaching party's costs incurred in such legal action, including actual attorney fees. If judgment is taken against the breaching party, then such actual costs of enforcement will be added to the non-breaching party's judgment.
- 16. Amendments.** No amendments, additions, or changes of any kind to this Contract will be valid unless in writing and signed by all of the parties to this Contract.
- 17. Severability.** If any term of this Contract is unenforceable under law for any reason, then to the extent the unenforceable term can be severed from the remainder of this Contract without affecting the enforceability of the remainder of this Contract or substantially frustrating its purpose, it shall be so severed, and the remainder of this Contract shall remain in effect and enforceable.
- 18. Governing Law and Jurisdiction.** This Contract will be construed and enforced according to the laws of Wisconsin. The parties agree that if a lawsuit is necessary with respect to this Contract, it will be filed in the Circuit Court for Waukesha County, Wisconsin. The parties consent to personal jurisdiction in Wisconsin, and waive all jurisdictional defenses.

**North Central Bus & Equipment, Inc.**

\_\_\_\_\_  
Name(Print): \_\_\_\_\_  
Title: \_\_\_\_\_  
Date: \_\_\_\_\_

**City of Waukesha**

\_\_\_\_\_  
Shawn N. Reilly, Mayor  
Date: \_\_\_\_\_

\_\_\_\_\_  
Attest: Gina L. Kozlik, City Clerk  
Date: \_\_\_\_\_

\_\_\_\_\_  
Richard L. Abbott, Finance Director  
Date: \_\_\_\_\_

**SCHEDULE A**  
**PARATRANSIT BUS**  
**TECHINICAL SPECIFICATION**

**0.0 Size and Weight**

With the exception of exterior mirrors, marker lights, roof vent, flexible portions of the bumpers, fender, skirts, and rub-rail the coach shall have the following overall dimensions:

Length 30 feet maximum

Width 102 inches maximum

Height 128 inches maximum

**0.1 Underbody Clearance**

The coach will maintain the minimum clearance dimensions regardless of load up to the gross vehicle weight rating.

Ramp Clearances:

Approach angle will be no less than 9.0 degrees

Break-over angle will be no less than 18.0 degrees

Departure angle will be no less than 9.0 degrees

**0.2 Ground Clearance**

Ground clearance will be no less than 9 inches.

**0.3 Turning Radius**

Coach turning radius measured over bumpers shall not exceed 31 feet.

**0.4 Service Life and Maintenance**

The coach shall be designed to operate in paratransit service for at least seven (7) years or 200,000 miles.

Routine scheduled maintenance will not be required at intervals of less than 3,000 miles or monthly, except for routine daily service performed during fueling operations.

**1. Axles**

1.1 OEM axles shall be provided. Front and rear air spring suspension with constant ride height control, kneeling capability, and an engine mounted air compressor shall be provided.

1.2 GVWR shall be a minimum of 14,200 pounds.

### **1.3 Drive Shaft**

Drive shaft shall be dynamically balanced, and provide adequate grease fittings for proper lubrication of slip joint and universal joints. Drive shaft shall be guarded to prevent it from striking the floor of the coach or ground in case of a tube or universal joint failure.

## **2. Suspension**

### **2.1 General**

Air suspension system shall be capable of withstanding the maximum loaded vehicle weight. In the event of an air spring failure, no part of the understructure shall come in contact with any components of the front or rear axle assemblies. Air suspension is to be self compensating for load variations, and may not vary more than plus or minus one-half (1/2) inch regardless of vehicle load.

### **2.2 Shock Absorbers**

Vertical damping of the vehicle suspension system shall be controlled by heavy-duty hydraulic shock absorbers, with a minimum piston diameter of 1-5/8 inches. Damping shall be sufficient to control coach motion to two (2) cycles or less after hitting road perturbations. Shock absorbers shall maintain their effectiveness for at least 100,000 miles in normal coach service. Shock absorber mounting pins shall be of replaceable, non-welded design. A minimum of two (2) shock absorbers for the rear and a minimum of two (2) shock absorbers for the front suspension.

### **2.3 Front Suspension**

Front air suspension shall consist of two (2) rolling lobe air bellows, two (2) heavy-duty shock absorbers and one (1) automatic leveling valve. Radius and transverse rods with replaceable bushings shall control lateral, longitudinal and torsion movement.

### **2.4 Rear Suspension**

Rear air suspension shall consist off minimum two (2) rolling lobe air bellows, and two (2) heavy-duty shock absorbers, and two (2) automatic leveling valve. Valves shall control lateral, longitudinal and torsion movement. All radius rods, including ends, bushings and anchor brackets are of adequate construction so as to avoid any possibility of breakage or loosening in service.

### **2.5 Kneeling**

A driver actuated kneeling device shall lower the bus four (4) inches from a ride height of eleven (11) inches from ground. The brake and throttle interlock will prevent movement when the bus is kneeled. After kneeling, the bus will rise within two (2) seconds to a height permitting the bus to resume service and will rise to the correct operating height within ten (10) seconds. During the lowering and raising operation,

the maximum acceleration will not exceed 0.2g and the jerk will not exceed 0.3g/sec., measured on the front door step tread. An indicator mounted on the instrument panel will be illuminated during the kneeling operation and will remain illuminated until the bus is raised to a height adequate for safe street travel. An audible alarm will sound when the bus is in either its upward or downward kneeling sequence.

## **3. Steering**

OEM Power steering shall be standard.

#### **4. Brakes**

OEM service brakes shall be all wheel disc with a four-wheel anti-lock system. The braking system shall be the heaviest duty available for the GVWR of the vehicle. The brakes shall be capable of stopping a fully loaded vehicle at a deceleration rate equivalent to a 2- foot stop from a speed of 20 miles per hour. They must be capable of this type of stop 3 times in a rapid succession from a speed of 20 miles per hour without brake fade. Braking system shall comply with FMVSS 121 or FMVSS 105 as applicable.

The parking brake shall be internal rear disc type. The parking brake shall be capable of holding a fully loaded vehicle on a 15% incline. The system shall incorporate a warning light on the instrument panel to indicate to the driver when the parking brake is on.

The vehicle shall be equipped with an operator controlled power assist ramp. The controls for the ramp shall be interlocked with the vehicle emergency brakes and transmission to ensure the vehicle cannot be moved when the ramp is not stowed and the ramp cannot be deployed unless the interlocks are engaged.

#### **5. Air Compressor**

The air compressor shall be engine mounted, with a minimum capacity of 5CFM @ 100 PSI & 1750 RPM's.

#### **6. Engine**

##### **6.1 Type**

The engine shall be a minimum 6.0L, V8 gasoline.

##### **6.2 Fast Idle**

The engine shall be equipped with a driver controlled fast idle device. The fast idle shall only be activated with the transmission in neutral and the parking brake applied.

##### **6.3 Engine Filters**

The engine shall be equipped with fuel filters and "spin-on" lubricating oil filters, mounted in a location which is easily accessible for servicing. Engine air filter shall be equipped with a restriction indicator calibrated to twenty-five (25) inches of water vacuum.

#### **7. Transmission**

The transmission shall be a six (6) speed automatic. The transmission shall have a minimum of five (5) forward speeds and one (1) reverse speed.

#### **8. Cooling System**

##### **8.1 General**

The OEM cooling system shall be the highest capacity available for the specified chassis. The system shall be adequate to prevent engine overheating while operating in stop and go transit operation in ambient temperatures as high as 110 degrees Fahrenheit. The fan shall be thermostatically controlled, fluid drive type, or clutch belt driven as to be effectively power driven only above the minimum efficient engine temperature. The coolant shall be permanent type antifreeze with rust inhibitor, mixed to protect from freezing down to -24 degrees Fahrenheit. The cooling system and heater hoses shall be silicone with constant torque clamps or an approved equal.

## **9. Fuel System**

### **9.1 Fuel Tank**

The fuel tank shall have a usable capacity of not less than 50 U.S. gallons. Fuel tank shall be internally baffled and be equipped with a drain cock located on the lowest portion of the tank. Fuel tank shall have a hinged or screw on fuel filler cap.

### **9.2 Certification**

The fuel tank shall have a permanently affixed plaque stating manufacturer, certification, capacity, and date of manufacture. The plaque shall be clean and legible after the undercoating process, and shall comply with E.P.A. requirements. The plaque shall be visible when the fuel fill door is opened.

## **10. Exhaust System**

### **10.1 Requirements**

The coach exhaust system shall conform to all Federal Clean Air Act, State of Wisconsin and local standards for emissions and noise levels in effect at time of coach delivery. Coach shall meet the CAA standards by use of an engine exhaust catalyst.

### **10.2 Construction**

Muffler shall be of high capacity aluminized steel and properly routed and installed with heat shields, baffles and vibration mounts. Any flex tube needed to connect engine turbocharger to the muffler shall be of stainless steel construction. Length of flexible tubing shall be minimized. The engine exhaust pipe and muffler shall be encapsulated with a high temperature thermo blanket to lower dbA exterior sound level and to protect associated components while providing maintenance safety.

## **11. Electrical**

The electrical system provides and distributes power for all electrical components in the bus. The system shall supply a nominal 12 volts to incandescent lights and instruments and 12 volts to all remaining circuits. Except for the engine starter circuit, all circuits are to be protected by circuit breakers or fuses. There shall be separate battery shut off switch, easily accessible for working on the chassis and for emergency use.

### **11.1 Wiring**

All general purpose wiring shall be cross linked polyethylene insulated, color coded for positive identification, and meets the requirements of SAE Recommended Practice J878a, Type SXL. Battery wiring conforms to the specification requirements of SAE Standard J558a, Type SGR, SAE Recommended Practice J878a, Type SXL, or combination thereof. Precautions should be taken to avoid damage from heat, water, solvents or chafing. Grommets, cushions or suitable elastomeric materials are provided where wiring penetrates metal structure. All exterior wiring harnesses are corrugated plastic loom covered. All wiring harness clamps are insulated. All connectors outside coach interior to be triple sealed WEATHER-PAC CONNECTORS.

### **11.2 Junction Boxes**

All relays, controllers, flashers, pressure switches, circuit breakers and other similar electrical components shall be mounted in easily accessible junction boxes. All components are to be clearly marked for identification. The junction boxes shall be sealed to prevent moisture from reaching the electrical components, and will prevent fire that may occur inside the box to propagate outside the box. The components and circuits in each box will be identified and their



locations recorded on a schematic drawing, laminated in plastic, permanently glued to or printed on the inside of the box cover or door.

### 11.3 Battery

The battery shall be of premium construction; with threaded side terminals shall be provided. The battery shall be 12 volts, with at least 750 cold cranking amps. Positive and negative terminals will have different size studs, or the battery cables shall be arranged to prevent incorrect installation. Battery cables are to be color coded with red for primary positive, black for negative, and another color for any intermediate cables.

### 11.4 Alternator

The engine shall have dual 110 amp alternators or single 200 amp add-on alternator output rating to meet the electrical load requirements and maintain a charged battery system.

### 11.5 Exterior Lights

All exterior lights shall conform to FMVSS and ADA requirements, and State of Wisconsin regulations. All exterior lighting shall be of the sealed type to prevent entry and accumulation of moisture or dust. All exterior lamps must be 12 volt DC.

Round four inch diameter LED lights shall be mounted on the rear of the bus. Red LED lights for stop and taillights. Amber LED lights for turn signals and white LED for back up lights. Reflectors shall be mounted two per side of the bus, amber in center, red in rear, along the lower body panels. Two red reflectors shall be mounted in rear of bus. One (1) LED white lamp shall be provided to illuminate the license plate.

LED lights shall be mounted to illuminate the loading and exit areas. These lights will be located below the window line, shielded to protect passenger's eyes from glare, and also be totally enclosed, splash proof, and protected from damage caused by passengers kicking the lenses or fixtures. Loading area and front door lights shall be wired to light when the front doors are opened and the master switch is in the night run position.

Flasher shall be a heavy duty electronic type, rated for 500 hours continuous service. Flasher shall be on a single circuit to operate all front, side and rear directional lights for use as an emergency flasher.

### 11.6 Interior Lights

An overhead LED lighting system shall provide general illumination in the passenger compartment, and will be controlled independently with a switch.

LED lighting shall be furnished at or near the ceiling juncture, and provide full lighting of passenger area of coach.

### 11.7 Instrument Panel

A dust and waterproof instrument panel located directly in front of the operator shall contain an electronic speedometer calibrated in MPH with odometer, volt meter, engine oil pressure gauge, engine water temperature gauge, and fuel level gauge. The indicator and tell tale light panel shall include the following lamps at a minimum:

right turn	left turn	ramp-power on	particulate filter
high beam	no charge	wait to start	
coolant-temp	aid passenger	parking brake on	
stop request	kneel	check engine	

## **11.8 Chime System**

The passenger assist chime signal shall be audible to the operator and passengers throughout the bus. The chime shall sound only once, when the button is first pushed. A red "STOP REQUESTED" sign meeting ADA Requirements shall be installed in the front of the bus, in sight of all seated passengers. Installation of "STOP REQUESTED" sign shall not interfere with destination sign door operation. The "STOP REQUESTED" words shall be printed in bold white letters and shall remain illuminated when the signal is activated until the passenger door is opened. The words "STOP REQUESTED" shall not be visible until the sign is illuminated.

## **12. Interior Climate Control**

The A/C system shall be a roof mounted. The system shall integrate with OEM, in-dash, driver's area evaporator unit with essentially comparable standards of design and performance. The driver's in-dash A/C unit shall be separately controlled from the passenger area system. It shall include off/low/medium/high fan speed control. Passenger area air conditioning system shall be separately controlled from a control station at the driver's position with an off/low/high (minimum) blower switch. All electronic relays, fuses and circuit breakers shall be located in accessible location within the driver's area for reliability and ease of repair. The climate control shall be a central unit with heater and air conditioning. The A/C shall have a rating of at least 80,000 BTU's and the heating system shall have a rating of 35,000 to 65,000 BTU's. A/C filters shall be easily accessible for service.

All controls shall be located within easy reach of the operator and shall be located on a control panel. All hoses shall be routed and secured in such a way that they will not rub or chaff. Routing of these hoses shall not interfere with the access of routing maintenance items such as dipsticks, air filters, or access doors. Refrigerant hoses shall be a refrigerant type double braided barrier construction.

The Contractor shall describe the air conditioning unit and the related components that he intends to furnish to meet the temperature requirements described herein. The system shall be designed so that when the passenger door is open, the air discharge shall not be directed towards the door, but past it. The loss of cool air must be kept to a minimum.

The heating system shall be hot water forced air. The driver shall thermostatically control the heater with a multi-speed fan. Air circulation shall be high volume and engineered so there are no "cold pockets" at the rear row of seats or rear wheelchair stations. The system shall be designed so that when the passenger door is open, the air discharge shall not be directed towards the door but past it. The loss of hot air must be at a minimum when passenger door is open. The heater shall not be installed under passenger seats.

## **13. Wheelchair Ramp**

### **13.1 General**

Space and body provisions shall accommodate an active wheelchair ramp in a location approved by the City of Waukesha. The ramp must meet all ADA requirements. The wheelchair ramp must meet Waukesha Metro Transit Commissions standards and approval. The ramp shall be a bi-fold style design. The ramp shall permit the entering of a wheelchair in both the inboard and outboard facing direction. Maximum safety for all ramp users and increased accessibility are of primary concern. The ramp shall have a minimum width of thirty-four (34) inches and a length of sixty-two (62) inches to give it a one to six (1:6) slope. The ramp shall have a load capacity of 800 pounds.

### **13.2 Operating Environment**

The ramp shall operate in temperature ranges of -10 F to 115 F, at relative humidity between 5 percent and 100 percent, and at altitudes up to 5,000 feet above sea level. Degradation of performance due to atmospheric conditions should be minimized at temperatures below -10 F, above 115 F, or at altitudes above 5,000 feet.

### **13.3 Operating Constraints**

The ramp shall operate on level ground and on road grades of up to seven (7) percent or four (4) degrees. The ramp shall also operate when the bus is at an angle of plus or minus 8.7 percent or five (5) degrees due to road crowns, depressions, or curb geographics.

## **14. Wheelchair Restraint System**

### **14.1 General**

The contractor shall provide a minimum of four (4) wheelchair or mobility aid securement devices or systems meeting all ADA, SAE J-2449, and ANSI/RESNA WC 18 requirements. The securement devices shall secure the wheelchair or mobility aid facing toward the front of the coach. When properly used and maintained in accordance with manufacturer recommended procedures, a wheelchair or mobility aid securement device should be designed to have a useful life equal to the useful life of the vehicle on which it is used. The securement system shall secure the most common wheelchairs and mobility aids and shall be easily attached. When not in use, all belts shall retract or be removed so as to give a neat appearance and not be a tripping or catching hazard.

### **14.2 Location and Size**

The securement system shall be placed as near to the accessible entrance as practicable and shall have clear floor area of at least thirty (30) inches by forty-eight (48) inches. Such space shall adjoin, and may overlap an access path. A vertical clearance of twelve (12) inches above the floor surface should be provided on the outside of turning areas for wheelchair foot rest clearance. Not more than six (6) inches of the required floor space may be accommodated for footrests under another seat provided there is a minimum of nine (9) inches from the floor to the lowest part of the seat overhanging the space. Each wheelchair location shall have hooks to hang slide and click restraints when not in use.

Maneuvering room inside the coach shall accommodate easy travel for a passenger in a wheelchair from the loading device through the coach to the designated parking area, and back out. Any wheelchair shall be able to enter or exit without moving the other wheelchairs. As a guide, no aisle width dimension should be less than forty (40) inches, areas requiring ninety (90) degree turns of wheelchairs should have a clearance arc dimension of no less than forty-five (45) inches, and in the parking area where 180 degree turns are expected, space should be clear in a full sixty (60) inch diameter circle. No portion of the wheelchair or its occupant shall protrude into the normal aisle of the coach when parked in the designated parking spaces. The exit signal shall be no higher than four (4) feet above the floor in this area and shall notify the vehicle operator that a wheelchair passenger has made a stop request or needing assistance.

### **14.3 Restraint Requirements**

When the wheelchair or mobility aid is secured in accordance with the manufacturers instructions, the securement system shall limit the movement of an occupied wheelchair or mobility aid to no more than two (2) inches in any direction under normal vehicle operating conditions. Securement systems shall restrain a force in the forward longitudinal direction of up to 2,000 pounds per securement leg, and a minimum of 4,000 pounds for each mobility aid. For each wheelchair or mobility aid securement device provided, a passenger seat belt and shoulder harness shall also be provided. Such seat belt and shoulder harness shall not be used in lieu of a device which secures the wheelchair itself.

## **15. External Body**

### **15.1 General**

The coach shall have a clean, smooth, simple design. The exterior and body features including grilles and louvers, will be shaped to allow complete and easy cleaning by automatic bus washers without snagging washer brushes. Body and windows shall be sealed to prevent leaking of air, dust or water under normal operating conditions and during cleaning in automatic bus washers during the service life of the coach. Accumulation of road splash on any window or mirror of the coach shall be minimized.

## **15.2 Strength and Fatigue Life**

The basic structure shall withstand fatigue damage throughout the intended service life of the coach. The structure shall also withstand impact and inertial loads due to normal street travel throughout the coach's service life without permanent deformation or damage.

## **15.3 Distortion**

The coach at GVWR and under static conditions shall not exhibit deformation or deflection that impairs operation of doors, windows or other mechanical elements. Static conditions include the vehicle at rest with any one (1) wheel or dual set of wheels on a six (6) inch curb or in a six (6) inch hole.

## **15.4 Body and Understructure**

The body and understructure shall be of durable construction with special bolted joints. The bolts shall be precision torqued and coated with a thread-locking compound. Where stress concentration may occur, proper reinforcement shall be provided so the vehicle will carry the required loads and properly withstand road shocks.

## **15.5 Posts, Side and Roof**

All posts in the body side and roof sections are to be steel construction, bolted to the underframe structure so that the entire assembly acts as one unit without any movement at the joints. The end posts are to be designed with special profiles to resist shear. The steel cage must be Electro-coated after fabrication, prior to final assembly; no welding is permitted after E-coating of the structure to prevent the structure from corrosion.

## **15.6 Exterior Body Panels**

(a) The exterior body must be FRP Composite skin Laminated to a moisture resistant substrate and attached to the steel cage with urethane adhesive. Luan or other wood products are not permitted in the exterior sidewalls or rear wall structure.

(b) Rivet spacing to be as in accordance with the best practice of bus industry standard.

## **15.7 Exterior Roof Panel**

Roof is one piece fiber reinforced plastic (FRP) sheet with sufficient strength and stiffness to prevent vibration, drumming or flexing in service.

## **15.8 Rain Gutters**

Gutters shall be provided to prevent water flowing from the roof onto the side windows and passenger doors. When the coach is decelerated, the gutters shall not drain onto the windshield, driver's side window, or into the door boarding area. The cross section of the gutter will not be less than 0.20 inches. The gutters may be of molded rubber construction.

## **15.9 Engine Bulkhead**

The passenger and engine compartments shall be separated by a bulkhead which shall, by incorporation of fireproof materials in its construction, be a firewall. This firewall shall preclude or retard propagation of an engine compartment fire into passenger compartment. Only necessary openings shall be allowed in the firewall, and these shall be fireproofed. Any passageways for the climate control system air shall be separated from the engine compartment by fireproof material. Piping through the bulkhead shall have copper, brass or fireproof fittings sealed at the firewall with copper or steel piping on the forward side. Wiring may pass through the bulkhead only if connectors or other means are provided to prevent or retard fire propagation through the firewall. The conduit and bulkhead connectors shall be sealed with fireproof material at the firewall. Engine access panels in the firewall shall be fabricated of fireproof material and

secured with fireproof fasteners. These panels, their fasteners, and the firewall shall be constructed and reinforced to minimize warping of the panels during a fire.

#### **15.10 Crashworthiness**

The coach body and roof structure shall withstand a static load equal to 150 percent of the curb weight evenly distributed on the roof with no more than a six (6) inch reduction in any interior dimension. Windows will remain in place and not open under such load.

Exterior panels below the rubrail and their support structural members will withstand a static load of 2,000 pounds applied perpendicular to the coach anywhere below the rubrail by a pad no larger than five (5) inches square. This load will not result in deformation that prevents the installation of new exterior panels to restore the original appearance of the bus.

#### **15.11 Corrosion**

All metal panels and structural members that are not aluminum or stainless steel shall be protected from rust and corrosion by thorough pre-treatment prior to assembly operations. This includes chemical treatment and prime painting as required to insure this protection for the life of the coach. The metal panels and structural members shall resist corrosion from atmospheric and road salts. They shall maintain structural integrity and nearly original appearance throughout their service life. Caulking compound shall be used to seal interior body seams, joints and overlapping panels against water, dust, moisture and foreign matter. The sealant shall also be suitable for protection against electrolyte corrosion between dissimilar metals. A sealant containing a chromate inhibitor is required. Prior to final painting and detailing of the surface, the body shall be cleaned and primed to protect bare spots and a surface sealant applied to insure finish paint adhesion.

#### **15.12 Miscellaneous Fasteners**

All bolts, nuts, washers, clamps, clips and like parts shall be zinc or cadmium plated or phosphate coated or stainless steel to prevent corrosion.

#### **15.13 License Plate**

Provisions shall be made to mount a standard size Wisconsin license plate to the rear of the coach. This provision shall flush mount or recess the license plate so that it can be cleaned by an automatic bus washer without snagging the brushes. License plate recess shall not allow a toe or hand hold by unauthorized riders. Requirement for a front license plate shall be deleted.

#### **15.14 Driver side Running Board**

There shall be a driver side running board to assist driver into the vehicle.

### **16. Passenger and Driver Door, Rear Emergency Door**

All entrance and exit doors shall conform to ADA requirements.

#### **16.1 Materials**

Structure of the doors, their attachments, inside and outside trim panels, and any mechanism exposed to the elements shall be durable and corrosion resistant. Door construction shall be of corrosion resistant metal or aluminum. The doors, when fully opened, shall provide a firm support and shall not be damaged if used as an assist by passengers during ingress or egress.

## **16.2 Front Door**

The front door shall be a two-section outward opening "swing out" type of metal and glass construction. Front door opening width shall meet or exceed ADA width requirements and a height of not less than seventy-five (75) inches to accommodate the wheelchair ramp.

Each section shall contain single density tempered glass full-length as large as available. Door shafts shall be splined to operating levers at door tops.

The front door shall be electric operated. The door shall also have a manual release.

## **16.3 Driver Door**

The driver shall have a dedicated entrance door and shall also be able to enter the driver area from the inside of the passenger area with ease.

## **16.4 Rear Emergency Door**

There shall be a rear emergency door. Door shall be equipped with audible alarm for door ajar. Door shall have an adequate window for driver viewing. Also there shall be windows on each side of the rear door.

## **17. Windows**

### **17.1 Compliance**

Windows, sashes and fittings specified herein shall be in compliance with the applicable provisions of FMVSS #217. Window configuration is subject to approval of the City.

### **17.2 Windshield**

Windshield shall be OEM standard.

### **17.3 Side Windows**

Windows on each side of the coach are to include upper slider with a fixed transom. All glazing is to be one-eighth (1/8) inch thick tempered safety glass, thirty-one (31%) percent dark tint to minimum alterable percent light transmissivity. Sash is to be black anodized aluminum, and glazing is to be easily replaced without removing sash from the coach. The lower section is to be sealed, and the upper section is to be a minimum of six (6) inches high with an aluminum hinge at the bottom, and opening inward at the top. A positive locking device is to hold the upper section in a closed position.

All emergency exits shall conform to FMVSS #217. Each emergency exit window must have a permanent decal describing emergency window operation procedures.

### **17.4 Front and Ramp Access Door Glass**

The door windows shall be one-quarter (1/4) inch laminated tempered single density safety glass, with the access door window(s) tinted.

### **17.5 Rear Door Glass Convex inlay**

The center rear glass shall have a convex inlay for better visibility.

## **18. Steps and Stepwells**

Note: There shall be no interior steps.

## **19. Wheel Housing**

Wheel housings shall be constructed of steel. Sufficient clearance and air circulation shall be provided around the tires, wheels and brakes to prevent overheating when the coach is operating. Molded rubber fenders shall be installed at front and rear wheelhouses.

## **20. Bumpers**

Front bumper shall be OEM chassis type bumper. Rear bumper shall be steel painted black.

## **21. Towing**

Vehicle shall have appropriate tie down areas for having the vehicle towed by a flatbed tow truck.

## **22. Undercoating/Rustproofing**

Contractor shall submit information on all phases of the proposed undercoating/rustproofing process, including the materials used. All parts that should not be undercoated, including but not limited to all lubrication fittings and all mechanical devices, shall be masked. Particular attention shall be directed to areas of water, salt and foreign matter collection and compaction on the underside of the coach.

## **23. Splash Aprons**

Splash aprons, composed of rubberized fabric, shall be installed behind each wheel and shall extend downward to within three (3) inches of the road surface. Apron widths shall be no less than tire widths. Splash aprons shall be bolted to the coach understructure. Splash aprons and their attachments shall be inherently weaker than the structure to which they are attached. Other splash aprons shall be installed where necessary to protect coach equipment. One (1) ground strap shall be provided under each bus.

## **24. Hoisting**

The coach axles or jacking plates shall accommodate the lifting pads of a two (2) post hoist system. Jacking plates, if used as hoisting pads, shall be approximately five (5) inches square, with a turned-down flange not less than one (1) inch deep on each side to prevent the coach from falling off the hoist. Other pads or the coach structure shall support the coach on jack stands independent of the hoist.

## **25. Jacking**

It shall be possible to safely jack up the coach with a common ten (10) inch high hand jack or a ten (10) ton floor jack when a tire or dual set is completely flat and the coach is on a level hard surface without crawling under any portion of the coach. Jacking from a single point shall permit raising the coach sufficiently high to remove and reinstall a wheel and tire assembly.

Jacking pads located on the axle or suspension near the wheels shall permit easy and safe jacking with a flat tire or dual set on a six (6) inch high run-up block not wider than a single tire. The coach shall withstand such jacking at any one or any combination of wheel locations without permanent deformation or damage.

## **26. Floor**

### **26.1 Height**

Height of the floor above the street shall be no more than fourteen (14) inches, measured at the center of the front door.  
Note: The coach floor shall be flat. Only exception shall be by rear wheel wells.

## **26.2 Material**

Engineered wood flooring shall be five-eighths inch (5/8") single piece, with moisture barrier laminated to bottom surface, with moisture sealed edges.

## **26.3 Floor Covering**

The interior floor and lower side wall covering shall be a non-slip vinyl or equivalent material.

## **26.4 Trim Moldings**

Cove moldings shall be installed in body to floor corners to aid in floor cleaning.

## **27. Insulation**

Insulation shall be Polystyrene Foam in sidewalls, roof and rear cap. Front cap shall be insulated to minimize heat gain in the front evaporator area. All insulation shall be waterproof and fire retardant.

## **28. Interior Trim**

Interior walls and ceiling are to be fiberglass over plywood to provide washable surfaces. Samples of the proposed material shall be submitted with the proposal.

## **29. Roof Escape Hatch/Ventilator**

One (1) ventilator/escape hatch shall be provided in the roof of each coach, approximately over the rear axle. The ventilator shall be easily opened and closed manually by one (1) person. When open with the coach in motion, the ventilator shall provide fresh air inside the coach. The ventilator shall cover an opening no less than 425 square inches and shall be capable of being positioned as a scoop with either the leading or trailing edge open no less than four (4) inches, or with all four (4) edges raised simultaneously to a height no less than three and one-half (3 1/2) inches.

## **30. Passenger Seating**

All passenger seats shall be equipped with lap belts for each occupant. Fabric and color shall be determined by the City. Aisle seat position shall have a folding arm rest. The seating arrangement shall be determined by the floor plans and four (4) secured wheelchairs. With four (4) wheelchairs secured, there shall be seating for at least 3 ambulatory passengers. With three (3) wheelchairs secured, there shall be seating for up to eleven (11) ambulatory passengers. Any wheelchair shall be able to be removed from the bus without moving any other wheelchairs. Seat spacing must provide a twenty-eight (28) inch hip to knee room. The seating shall be two (2) seat transverse type seat where applicable with single seats only in areas necessary. Locations of side seating must be approved by the City.

The City will approve in writing the final seating layout proposed by the Contractor which meets the above layout requirements and seats. All seats must meet or exceed federal safety standards.

## **31. Driver's Seat**

A driver's seat shall be the OEM seat.

## **32. Headroom**

The headroom along the bus centerline shall be at least seventy-five (75) inches between the entrance door and the back of the far rear seat.



### **33. Fire Extinguisher**

A compartment shall be provided in the driver area for the storage of a fire extinguisher and other mandatory U.S. DOT safety equipment. A five (5) pound dry type chemical fire extinguisher and a reflector kit meeting Federal U.S. DOT requirements shall be installed on each bus. Fire extinguisher shall be equipped with a gauge type charge indicator that is readily visible (not on base) for inspection without removing extinguisher from mounting bracket.

### **34. Paint and Lettering**

#### **34.1 Exterior Paint**

The bus shall be painted with a three to four color paint scheme. The paint codes and drawings shall be given to the contractor at the preproduction meeting.

#### **34.2 Lettering**

Lettering and numbers shall be applied to each coach as follows:

Interior of coaches are to be numbered consecutively beginning with the number 701. Interior numbers are to be two (2) inches high, white, located on the right side of front bulkhead.

Exterior numbers shall be four (4) inch high Helvetica medium type, black in color and located in the following areas:

Front of coach, immediately above right headlight

Rear of coach, above right side brake and tail lights

Right side of coach, immediately below rear window

Left side of coach, immediately below rear window

#### **34.3 Decals**

All coach lettering and decals shall conform to ADA Requirements. The following decals/signs shall be provided in each coach:

1. "EMERGENCY EXIT" decal on roof hatches and appropriate windows with the appropriate operating instructions. Color shall be red letters on clear background.
2. "Gasoline FUEL ONLY" on fuel door. Color shall be black lettering on white background.
3. "RIGHT TURN IN FRONT OF BUS IS ILLEGAL" on rear engine door.
4. International symbol of accessibility near front door per ADA Requirements. Symbol color shall be blue on white background.

### **35. Stanchions and Grabrails**

All stanchions and grabrails shall be one and one-quarter (1 1/4) inch diameter stainless steel clad tubing and yellow in color. Stainless clad shall be a minimum of .020 inch thick. Fittings shall be stainless steel, cast aluminum, cast zinc or an equally corrosion resistant material.

Full length ceiling grabrail, one (1) each side of aisle, with stainless steel fabricated brackets shall be provided. Grabrail ends shall terminate at ceiling connections or in elbows; no exposed ends shall be allowed.

Vertical stanchions shall be mounted from floor to ceiling at right rear of driver's seat, and at the rear of the front door.

Contractor shall detail the stanchion layout in the floor plan and seat chart.

### **36. Modesty Panels**

All modesty panels shall be firmly attached to prevent vibration during operation. Modesty panels shall be constructed of a City approved material.

### **37. Mirrors**

#### **37.1 Interior Mirrors**

A driver's rear view mirror shall be six (6) inches by nine (9) inches and shall be mounted on the windshield header panel above and in front of the driver to afford the driver full view of coach interior. Non-reflective black finish steel rim and safety finish black mounting brackets shall be provided.

#### **37.2 Exterior Mirrors**

The outside mirrors shall be electrically remote controlled from the driver's seat by the operator and have electric defrost. The mirrors shall be black and contrast with the body. The mirrors are to be collapsible so that the bus can go through automatic bus wash without damage. Each assembly shall have a flat and a convex mirror.

### **38. Windshield Wipers and Washer**

The coach shall be equipped with OEM wipers and windshield washer nozzles and reservoir.

### **39. Farebox**

The City will supply and install the farebox after delivery.

### **40. Radio, Security Camera, and AVL Equipment**

#### **40.1 Storage Box**

The bus shall be equipped with a locked storage box large enough to house radio, security camera DVR, and other technical equipment. The location of the storage box will be determined during negotiations.

#### **40.2 2-Way Radio, AVL and Security Cameras**

The City will supply and install the 2-Way Radio, AVL and Security Cameras after delivery.

#### **40.3 Public Address System**

A public address (PA) compliant with ADA regulations shall be installed in the coach. PA system shall be operated by a driver controlled on/off switch located on the microphone. Microphone shall be attached to the base by a flexible gooseneck approximately two (2) feet long. Gooseneck shall be chrome plated, matte black or black rubber coated. Gooseneck base shall be constructed of steel and have a matte black finish. Base shall be mounted on the driver's switch panel, located to the left, and in front of the driver. Base shall be located so the gooseneck will not interfere with the normal operation of the bus. Interior speakers shall be located in the ceiling of the coach. An exterior speaker shall be located outside the front door. PA system shall have separate interior and exterior on/off switches and volume controls.

## **41. Noise Level**

All vehicle generated noise levels experienced by the passenger must conform to the more stringent regulation if in conflict to established guidelines whether by state, local government or federal regulations.

### **41.1 Interior Noise Level**

The vehicle generated noise level experienced by a passenger at any seat location in the bus shall not exceed eighty-three (83) dBA, with a seated load and with all systems operating on a smooth, level urban arterial road or highway. An exterior sound source having a eighty-five (85) dBA measured at the outside shall have a sound level of seventy (70) dBA or less with doors and windows closed and vehicle shut down.

### **41.2 Exterior Noise Level**

Airborne noise generated by the coach and measured from either side shall not exceed eighty (80) dBA under full load power acceleration when operated at or below thirty-five (35) miles per hour at curb weight and before transmission upshift. The maximum noise level generated by the coach pulling away from a stop at full power will not exceed eighty (80) dBA. The coach generated noise at curb idle will not exceed sixty-five (65) dBA. If the noise contains an audible discrete frequency, a penalty of five (5) dBA will be added to the sound level measured. All noise levels will be taken fifty (50) feet from, and perpendicular to, the centerline of the bus with all accessories operating. Instrumentation, test sites, and other general requirements shall be in accordance with SAE J366. The pull away test shall begin with the front bumper even with the microphone. The curb idle test shall begin with the rear bumper even with the microphone.

## **42. Horn**

Provide heavy-duty 12 volt horn that will meet FMVSS codes.

## **43. Back-Up Alarm**

Provide back-up alarm that will meet FMVSS codes.

## **44. Wheels And Tires**

The tires will be installed by the contractor at the factory. All wheels shall be interchangeable and shall be removed without a puller. Wheels shall be heavy duty tubeless type, suitable for use with radial or biased ply tires. Tire size must be compatible with the vehicle. Rear inner tire valve stems shall be accessible for checking tire pressure. Contractor shall mount and install all tires, all tires shall be balanced. Two spare wheels with tires mounted and balanced shall be shipped with each coach. Contractor shall perform a wheel alignment of each coach prior to delivery to assure proper tire wear.

Schedule B

Base Bus Specification



www.ARBOCsv.com Telephone: 574-825-4880 Fax: 574-825-1755

## Spirit of Mobility - Chevy



Photos Shown with Optional Equipment

**ARBOC Specialty Vehicles, LLC. 2019**  
**Construction Specifications**

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# ARBOC SPECIALTY VEHICLES, LLC

## ® Low Floor Commercial Bus

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### 1.0 SCOPE: MID-SIZE LOW FLOOR BUS

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- 1.1 This specification describes a steel cage, low floor, commercial bus designed for use in Tour, Charter, Shuttle, and other Commercial or Transit applications that meets all the requirements of ADA and the FMVSS Safety Standards in effect at the time of manufacture.
- 1.2 The proposed bus must have been tested at the Federal Bus Testing center at Altoona, PA in the 7 year/200,000 mile category.
- 1.3 The bus provided must be built on a General Motors "G Bus" Cut-Away (GMT 610) 4500 Chassis of the current model year with a Driver position only. Other chassis' will not be accepted.
- 1.4 The bus must meet all the chassis specifications listed in Section 9.1.

### 2.0 PURPOSE

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- 2.1 The purpose of these specifications is to describe a Mid-size bus suitable for transporting both ambulatory and non-ambulatory passengers in both rural and urban areas.
- 2.2 This vehicle is not a School Bus and is not intended to transport children to or from school.
- 2.3 The bus will be of a "Steel Cage" type construction with FRP (Fiber Reinforced Plastic) Composite skin laminated to a moisture resistant (less than 1%) substrate (not Luan) attached to the steel cage with urethane adhesive. The roof will consist of a single piece FRP skin laminated to the substrate and roof steel with urethane adhesive. The bus body is constructed of welded walls, sub floors, roof framing, and rear steel structure which are bonded and bolted together, forming an integrated steel cage around the passenger area.

### 3.0 CLASSIFICATION: MID-SIZE LOW FLOOR BUS

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- 3.1 This specification is for a Mid-Size Low Floor Commercial bus of the "Body-on- Chassis" type.

- 3.2 The bus shall meet all requirements of the Americans with Disabilities Act even though the specific items may not be listed in detail in this specification.
- 3.3 The bus shall be of the Low Floor type with air suspension both front and rear.
- 3.4 The bus shall have a kneeling feature to lower the bus to meet 1:6 angle when ramp is deployed.

#### 4.0 EXCEPTIONS TO SPECIFICATIONS:

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- 4.1 Manufacturers of similar equipment of the type specified may submit requests for approved equals provided that the bus is built on the identical chassis specified and that they have produced this model in commercial quantities. Manufacturers of similar buses must be able to provide a list of current users of the proposed bus as references.
- 4.2 Manufacturers requesting any deviation from these specifications must provide actual test results supporting their claim.
- 4.3 Such requests must be accompanied by test reports and other evidence showing that the proposed product meets or exceeds the requirements of these specifications.
- 4.4 Any tests submitted to support a request for approved equal must have been performed by an Independent Professional Engineering Company and certified by a Licensed Professional Engineer.
- 4.5 This specification reflects the specific needs of this organization/agency. In order to standardize certain components, therefore, we have named specific brands of equipment. This has been done to establish a certain standard of quality and to standardize inventory of replacement parts.
- 4.6 Other brands will not be considered, as the brands specified are readily available and have been proven in Transit/Shuttle service.

#### 5.0 ITEMS NOT ELIGIBLE FOR EXCEPTIONS:

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- 5.1 There are several items in the specification that will not be considered for any deviation:
  - 5.1.1 The chassis must be a General Motors "G Bus" Cut-Away Chassis with a Driver only Position in accordance with the chassis specifications listed.



- 5.1.2 The Passenger door must be dual panel, electrically operated and have two windows. The windows shall be a minimum of 14.5" wide and 69" high.
- 5.1.3 The entry door must be configured for ease of access for wheelchair loading and unloading.
- 5.1.4 The entry door must be forward to assist driver in seeing the passenger entry.
- 5.1.5 The Exterior skin must be FRP (Fiber Reinforced Plastic) Composite skin Laminated to a moisture resistant substrate (less than 1% absorption) attached to the steel cage with urethane adhesive. No Luan is permitted in the sidewalls or rear end wall of the bus. Laminated constructions with Luan or other wood materials are not allowed as they can lead to corrosion of the skin due to the wicking of moisture into the wood material.
- 5.1.6 The steel cage must be Powder Coated (minimum of 500 hour salt spray test) after fabrication, prior to final assembly.
- 5.1.7 The steel structure of the walls must extend below the floor level and continue to the lowest part of the bus. Separate skirting that only serves a decorative purpose is not allowed; every part of the sidewall must have the steel cage structure behind the exterior skin.
- 5.1.8 The overall width, excluding mirrors, of the bus must be a nominal 96" wide as narrower buses do not allow sufficient space for wheelchair maneuverability.
- 5.2 Any exceptions approved will be in writing and will be distributed to all prospective bidders and other interested parties. The approval, if granted, shall extend to all bidders and not just to the bidder who made the request.
- 5.3 Vehicle Manufacturer must carry at least \$215,000,000 liability insurance.
- 5.4 The vehicle must have passed all applicable FMVSS including FMVSS 214 and FMVSS 301 and test results must be submitted with bid proposal.
- 5.5 Chassis starting from the back of the cab to the rear of the bus must be purpose- built using minimum 50,000 psi steel frame rails. All frame components must be Powder Coated (minimum of 500 hour salt spray test) after fabrication, prior to final assembly

## 6.0 MATERIALS

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- 6.1** All materials used in conversion of the bus shall be new and unused; returned or reconditioned components will not be accepted. Brand names and part/model numbers of the major components will be listed and must comply with the brands and models specified in these specifications.
- 6.2** Major components include but are not limited to Seats, Windows, W/C ramps, W/C Tie downs, Air Conditioning/ Heat, Flooring, Floor Covering, Entry Door, and Chassis.

## 7.0 WARRANTY

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- 7.1 STANDARD WARRANTY COVERAGE:** The basic components originally built, installed, or modified by ARBOC, which a Customer does not get a choice in supplier option such as the windows, floor covering, suspension, interior ABS, stanchions, and electrical system including lights, switches, entry door are warranted free from defects in workmanship or materials for a period of 36 months or 50,000 miles, whichever occurs first.
- 7.2 STRUCTURAL WARRANTY COVERAGE:** The basic structural components originally built, installed, or modified by ARBOC, such as the exterior sidewall structure, rear wall structure, roof structure, floor structure, and chassis frame sections are warranted free from defects in workmanship or materials for a period of 60 months or 100,000 miles, whichever occurs first.
- 7.3 MANUFACTURER SUPPLIED COVERAGE:** The optional accessories and/or components covered by separate manufacturer warranties and originally installed by ARBOC including, but not limited to electronic components (alternators, batteries, TVs, radios, PA systems, destination signs, camera systems), air conditioning/heating (not related to chassis system), paint, wheelchair ramps, safety equipment, and seating equipment. Warranty terms on these items will be subject to separate manufacturer warranties and may be administered separately by the component manufacturer.
- 7.4 CHASSIS COVERAGE:** Chassis Warranty provided by GM for 3 years or 36,000 miles whichever comes first and 5 years or 60,000 on the drivetrain whichever comes first. (Refer to GM Manual for complete coverage.)

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## 8.0 GENERAL INFORMATION

### 8.1. DIMENSIONS

- 8.1.1 Exterior Width: 96" maximum excluding mirrors

- 8.1.2 Interior Width: 91.5" minimum
- 8.1.3 Interior Height: 77" minimum at the rear of bus/85" at the front of bus when measured at center aisle (Rear interior height varies with bus length)
- 8.1.4 Exterior Height: 110" maximum excluding roof hatch or roof mounted A/C units
- 8.1.5 Rear Overhang: Less than 33% of the overall bus length

## **8.2.0 BASE MODELS**

- 8.2.1 SOM 23 165" WB/24'-1" Overall Length Gas 14,200 GVWR
- 8.2.2 SOM 26 191" WB/26'-3" Overall Length Gas 14,200 GVWR
- 8.2.3 SOM 28 210" WB/27'-10" Overall Length Gas 14,200 GVWR
- 8.2.4 SOM 23 165" WB/24'-1" Overall Length Diesel 14,200 GVWR
- 8.2.5 SOM 23 165" WB/24'-1" Overall Length LP (3-Tank) 14,200 GVWR
- 8.2.6 SOM 26 191" WB/26'-3" Overall Length LP (3-Tank) 14,200 GVWR
- 8.2.7 SOM 28 210" WB/27'-10" Overall Length LP (3-Tank) 14,200 GVWR

## **8.3.0 PASSENGER SEATS AND CAPACITY**

- 8.3.1 Seating Capacity: 1-23 passengers (Passenger weight based on Federal Guidelines)
- 8.3.2 Wheelchair Positions: 1-8 (dependent upon wheelbase and seat configuration)
- 8.3.3 Seated Knee Room Forward: 27" minimum
- 8.3.4 Seated Width per Seat: 17" (wider seats optional)
- 8.3.5 Cushion Height above finished floor: 17-1/2" minimum/18-1/2" maximum
- 8.3.6 Minimum Aisle: 16" standard (options may affect aisle width)

## **9.0 CONSTRUCTION AND SPECIFICATIONS:**

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### **9.1.0 CHEVY CHASSIS SPECIFICATIONS**

- 9.1.1** Engine: Vortec 6.0L Gas
- 9.1.2** Base Transmission: Heavy Duty 6-Speed Automatic (MYD) with Auxiliary Transmission Cooler
- 9.1.3** Horsepower at RPM: 342 at 5,400
- 9.1.4** Torque FT/LBS at RPM: 373 at 4,400
- 9.1.5** Standard Axle Ratio: 4.10
- 9.1.6** Fuel Injection: Electric Fuel Injection
- 9.1.7** Battery: Heavy Duty 770 & 600 CCA Batteries
- 9.1.8** Alternator: 220-Amp
- 9.1.9** GVWR Standard: 14, 200
- 9.1.10** GVWR Front Axle: 4,600 on 14,200
- 9.1.11** GVWR Rear Axle: 9,600 on 14,200
- 9.1.12** Fuel Tank Capacity: 57 Gallons
- 9.1.13** Tires: LT225/75RX16E on White Steel Rims
- 9.1.14** Dual Rear Wheels
- 9.1.15** Brakes: Heavy Duty Disc Brakes with four-wheel anti-lock system
- 9.1.16** Park Brake: Internal Rear Disc
- 9.1.17** Shuttle Bus Package (Includes): Chrome Appearance Package (Chrome grille with dual composite halogen headlamps), Tilt/Cruise Convenience Package, Soft Mount Donuts (mounting upfit body to chassis), Aux Rear Heat provisions, Stop/Turn Signal Circuits (stop and turn signals to be operated separately), 110-Volt Outlet and USB Port in driver cab
- 9.1.18** Air Bag: Driver Side Only
- 9.1.19** Driver Seat: Cloth, High Back, Adjustable Fore and Aft, and Three Point Seat Belts
- 9.1.20** Passenger Seat: Omitted

- 9.1.21 Mirror: Inside Rearview Day/Night
- 9.1.22 Horn: Dual Note Tone
- 9.1.23 Air Cleaner: Heavy Duty type with a replaceable element
- 9.1.24 Radio: Radio provisions only
- 9.1.25 Doors: Driver Door (Passenger Door Omitted)
- 9.1.26 Driver Side Sun Visor
- 9.1.27 50 State Emissions
- 9.1.28 Power Ports: (2) 12 Volt
- 9.1.29 Daytime Running Lights
- 9.1.30 Medium Dark Pewter Vinyl Color Scheme
- 9.1.31 Black Vinyl Cab Floor Covering with Insulation
- 9.1.32 Factory Dash A/C, Defroster, and Heat
- 9.1.33 Low Oil Pressure Light
- 9.1.34 Full-Flow Oil Filter (Disposable Type)
- 9.1.35 High Engine Coolant Temperature
- 9.1.36 Power Steering
- 9.1.37 Driver Dome Light

## **9.2.0 RUNNING BOARD**

- 9.2.1 The vehicle shall be equipped with a Driver's Running Board without Wing.

## **9.3.0 BUMPERS**

- 9.3.1 Bumpers shall be provided at both front and rear. The front bumper shall be the OEM Chrome Bumper. The rear bumper shall be steel and painted black. Optional Rear Bumpers are available.

## **9.4.0 EXHAUST**

- 9.4.1** Exhaust system shall be equipped with a heavy duty, corrosion resistant exhaust system which meets or exceeds FMVSS and EPA noise level and exhaust emission (smoke and noxious gas) requirements.
- 9.4.2** Exhaust hangers shall be standard equipment and shall be welded to the frame.
- 9.4.3** Exhaust U-bolts shall be used in connections with thread orientation must be directed upwards.

## **9.5.0 SUSPENSION**

- 9.5.1** All chassis shall be equipped with a 4-Corner Air Spring Suspension System powered by an electric single twin cylinder 3.5 CFM compressor.
- 9.5.2** The pump pressurizes air and stores it in a tank for use in the air springs while the vehicle is operational. If the vehicle is not operated for an extended period of time, the springs will gradually decrease pressure as the compressed air escapes to the atmosphere. Once the vehicle is powered up the suspension controller will level the vehicle automatically. The system is equipped with a factory programmable controller. The vehicle should not react to load or road inputs for 20 seconds.
- 9.5.3** System is equipped with a status light as part of the kneel switch which will flash to indicate an error in the system.
- 9.5.4** When stopping for non-wheelchair passengers, operators may choose to maintain the vehicle at its normal ride height.
- 9.5.5** Kneel sequence operation is as follows:

### **9.5.5.1 Front Kneel**

- 9.5.5.1A** Driver pulls into position, places the vehicle transmission shifter in the park position and press the momentary kneel switch.
- 9.5.5.1B** Driver opens door by pressing and holding open door switch until door is fully opened.
- 9.5.5.1C** Driver depresses the momentary kneel switch and the door open limit switch sends signal to the suspension controller to kneel the front.
- 9.5.5.1D** Front of the vehicle kneels.

9.5.5.1 E When the door is closed, the door closed limit switch activates the kneel recovery to ride height.

#### 9.5.5.2 Full Kneel

9.5.5.2A Driver pulls into position, places the vehicle transmission shifter in the park position.

9.5.5.2B Driver engages the park brake.

9.5.5.2C Driver opens door by pressing and holding open door switch until door is fully opened.

9.5.5.2D Driver depresses the momentary kneel switch and the door open limit switch sends signal to the suspension controller to kneel the front.

9.5.5.2E Front of vehicle kneels.

9.5.5.2F Driver then deploys the ramp by pressing and holding Ramp deploy switch until ramp is fully deployed

9.5.5.2G Ramp deploy switch sends a signal to the Suspension controller to kneel the rear of the vehicle.

9.5.5.2H Rear of vehicle kneels.

9.5.5.2I Once the Ramp is stowed and the door is closed the suspension controller will raise the vehicle to the normal ride height.

## 9.6.0 FLOOR CONSTRUCTION

9.6.1 Structural steel floor is comprised of 14 gauge material.

9.6.2 Steel sub floor structure must be isolated from the chassis by means of OEM rubber isolation mounts and bolted through these mounts to the chassis frame rails.

9.6.3 Except for the 210" wheel base, the floor decking shall be a 5/8" thick single piece of engineered wood with moisture barrier laminated to lower surface and moisture sealed edges.

9.6.4 A sealant shall be used in body to floor corners to provide a water resistant seal as an aid in floor cleaning.

- 9.6.5 Ramp area & interior floor will be covered with Altro Storm Grey floor covering.
- 9.6.6 The cab floor shall have the OEM insulated floor covering.
- 9.6.7 The cab cockpit floor will include a 16 gauge plate welded in place for future fare box installation.

#### **9.7.0 WHEEL HOUSINGS**

- 9.7.1 Rear wheel housing shall be constructed of 14 gauge (minimum) one- piece steel constructed and adequately reinforced to prevent deflection.
- 9.7.2 Ample clearance shall be provided for tires under load and operating on both smooth and rough terrain.
- 9.7.3 Black rubber wheel flares will be installed.
- 9.7.4 Front wheel housings are to be provided with the chassis cab section.
- 9.7.5 Front and rear mud flaps are standard.
- 9.7.6 Underside of wheel housings shall be coated with Poly Urea for corrosion and sound.

#### **9.8.0 CURB SIDE WALL, DRIVER SIDE WALL, AND REAR WALL**

- 9.8.1 Wall structure which ends at the floor line is not acceptable and lower skirts that are not an integral part of the side wall are not permitted. Steel structure must extend below the floor level to the lowest point in side wall.
- 9.8.2 Structural steel walls are comprised of 16 gauge material.
- 9.8.3 The entire steel structure must be bonded (structural bonding adhesive) and bolted together. Any other method of assembly will not be accepted.
- 9.8.4 Exterior wall surface is White FRP Composite laminated to a moisture resistant (less than 1% absorption) substrate (not Luan) attached to the steel cage with urethane adhesive.
- 9.8.5 Interior wall surface is Grey FRP Composite laminated to a moisture resistant (less than 1% absorption) substrate (not Luan) attached to the steel cage with urethane adhesive. Options to replace include Nanocide (Grey or Tan), Auto Cloth (Grey), or Vinyl Soft Touch (Grey)



- 9.8.6** Luan used as a substrate is not permitted in the exterior or interior of the of the wall construction. Experience has shown that construction using Luan can lead to moisture wicking into the walls causing corrosion of the exterior skin.

## **9.9.0 ROOF CONSTRUCTION**

- 9.9.1** Structural steel roofs are comprised of 16 gauge material.
- 9.9.2** The entire steel structure must be bonded (structural bonding adhesive) and bolted together. Any other method of assembly will not be accepted. The bottom tube of the roof assembly will be bonded and bolted into the rivnuts of the side wall upper C-Channel.
- 9.9.3** Exterior roof surface is White FRP (Fiber Reinforced Plastic) Composite laminated to a moisture resistant (less than 1% absorption) substrate (not Luan) attached to the steel cage with urethane adhesive.
- 9.9.4** Exterior FRP (Fiber Reinforced Plastic) Composite will be secured to the side walls with the seam being covered by a rain gutter.
- 9.9.5** Exterior seams are only allowed at the junction of the front cap and rear cap. Any other seams on the exterior of the roof are not permitted.
- 9.9.6** Interior ceiling surface is Grey FRP composite laminated to a moisture resistant (less than 1% absorption) substrate (not Luan) attached to the steel cage with urethane adhesive. Options to replace include Nanocide (Grey or Tan), Auto Cloth (Grey), or Vinyl Soft Touch (Grey)

## **9.10.0 PASSENGER ENTRY DOOR**

- 9.10.1** Entry Door shall be a dual panel swing out type door with two glass windows.
- 9.10.2** Door Opening: 35" minimum clear opening with entry assist handles
- 9.10.3** Door Windows Dimensions: 14.5" x 69" minimum
- 9.10.4** Clear Entry Dimensions: 39" wide by 75" high
- 9.10.5** Entry doors shall incorporate gaskets and/or seals to provide a barrier against intrusion by wind, water, and dust around the perimeter. The seal at the center of the door shall be by means of full height overlapping rubber seals, and shall include a barrier or sweep at the bottom of both doors.

- 9.10.6 Passenger entry door shall function through the use of an electric door mechanism and be equipped with sensitive edges for safety.
- 9.10.7 For emergency situations, a manual door release control shall be provided over the top of the door, and shall be designed to permit simple operations to override the electric door operator.
- 9.10.8 Standard operating for the passenger entry door will not allow the door to be opened when vehicle is traveling faster than 2 mph for safety.

#### **9.11.0 MIRRORS**

- 9.11.1 Exterior rear view heated/remote mirrors shall be provided: one at the driver's left side mounted in the OEM position and one on the right/curb side in the OEM position.

#### **9.12.0 WINDOWS**

- 9.12.1 Solid windows are standard (Options include T-Slider Windows)
- 9.12.2 Window frames will be anodized black as standard.
- 9.12.3 Passenger windows shall be a minimum of 18-1/2", 36", or 45" wide and 36" high. (Body length will dictate sizes)
- 9.12.4 Side view transition window behind the driver (approximately 200square inches of viewing glass)
- 9.12.5 Large curb side viewing window (approximately 550 square inches of viewing glass)
- 9.12.6 Rear egress window is standard on the rear wall.
- 9.12.7 Extra egress window for the front driver side is standard for 183", 191" and 210" wheel bases.

#### **9.13.0 EMERGENCY EXITS**

- 9.13.1 Hinge-out windows shall be installed for emergency escape and shall comply with FMVSS-217.
- 9.13.2 Emergency Escape windows shall be clearly labeled and operation instructions shall be clearly visible at each escape window. The emergency release handle will meet FMVSS-217 requirements and shall not return to the locked position automatically; it shall require the driver or

other authorized person to manually re-lock it. All emergency exits shall comply with F.A.C. 14-90.

**9.13.3** Each emergency exit shall be identified with a 12 volt red LED lamp assembly, with a 10,000 hour life bulb, wired to the vehicle ignition circuit. Next to or immediately below each LED light fixture shall be a decal, one inch white letters on red background, stating "Emergency Exit".

**9.13.4** Roof Hatch Option is required when rear egress window/door is not available with CNG or Rear Luggage Compartment.

**9.13.5** Rear Egress Door Option: Rear door w/2 windows (upper and lower), two side windows in rear wall, and door alarm.

#### **9.14.0 ELECTRICAL**

**9.14.1** The vehicle shall be equipped with a heavy-duty (12 volt) Multiplex controlled electrical system. All components are to be selected and integrated to function in an environment characterized by low engine (alternator) speeds and high amperage draws due to lights, air compressor, wheelchair ramp, 4-way flashers, air conditioning/heater, and other accessories in constant operation.

**9.14.2** Bus systems to be controlled by a multiplex system with programmable inputs and outputs, system shall be capable of communicating to the chassis control modules to provide interlock functionality. Communications shall be via J1939 network. System to include diagnostic LED's for troubleshooting.

**9.14.3** The vehicle shall be equipped with an OEM 220-Amp Alternator.

**9.14.4** The vehicle shall be equipped with (1) 770 & (1) 600 CCA battery. The first battery is located under the hood at curbside, and the second is located under the curb side viewing window in a readily accessible area on a pullout tray.

**9.14.5** The vehicle shall be equipped with a rotary disconnect switch that removes 12V battery power from all bodybuilder loads while not interfering with OEM chassis electrical circuits.

**9.14.6** A fast idle system shall be installed which will automatically increase the engine speed (RPM) to approximately 1500 RPM. The fast idle shall be controlled by I/O Controls and capability of being actuated by either a voltage sensor, an air conditioner, an air compressor command, or a low coolant temperature command.

- 9.14.7** The vehicle shall be equipped with a backup alarm.
- 9.14.8** The vehicle shall be equipped with a single 12V Electric Air Suspension Compressor System with an Air Pressure Gauge mounted on the switch panel with a desiccant filter in the air supply line to the manifold.
- 9.14.9** The vehicle shall be equipped with an Exterior Door Toggle Switch. Optional Key Door Switch is available.
- 9.14.10** The vehicle shall be equipped with a Ramp Activation System that includes Exterior Ramp Toggle Switch. Optional Key Ramp Switch is available.
- 9.14.11** The vehicle shall be equipped with a driver console with switch panel that includes (10) available spaces for switches that includes but not limited to entry door, ramp, and interior lights. Switches to be multiplex type with J1939 network communications to the vehicle controller.
- 9.14.12** The interior passenger area shall be equipped with LED Surface Lights. There will be 6 lights (3 driver/3 passenger) on all units except for optional additional lights. The SOM 28 (210" WB) will have 8 lights (4 driver/4 passenger). These lights shall activate when the entrance doors are opened and turn off when the doors are closed.
- 9.14.13** The ramp area shall be equipped with (1) exterior overhead door light and (2) LED Stepwell Lights to illuminate the entry floor/ramp platform meeting ADA specs. These lights shall activate when the door is opened and or the ramp is deployed and turn off when the ramp is stowed or the door closed.
- 9.14.14** The driver's seat and instrument panel area shall have an OEM flush- mounted ceiling light to provide general illumination. The light shall be controlled by the operator through OEM switch on the front console and shall illuminate without ignition activation.
- 9.14.15** The vehicle shall be equipped with center-top mounted third brake light, tail brake lights, rear turn signals, back-up lights, and state license tag lights shall be LED fixtures. All rear exterior lights integrated into rear ABS Cap.
- 9.14.16** All wiring shall be SXL/GXL and be sized to minimize voltage drop at full load.
- 9.14.17** Entire harness system and mating electrical components are plug- connected with lock tab connectors; all terminals are machine crimped; all harnesses shall be covered in high temp conduit; all exterior under body/under hood connectors are IP67 rated sealed connectors and all

wiring shall be color coded and function labeled every 6 inches without having to use a legend.

**9.14.18** All body wiring shall be run inside the body in a protected area. All wiring shall be in a loom and secured for maximum protection. Clamps shall be rubber or plastic coated to prevent them from cutting the wiring insulation.

**9.14.19** When routing wiring under vehicle all wiring shall be encased in a loom and attached to the frame and sub-floor structure with proper fasteners and shall not be bundled with hoses. The harness shall run in straight lines as close to chassis frame rails as possible. Any harness that goes over the rear suspension shall be encased in a conduit fixture securely fastened to the sub-floor rails or routed inside the frame rails.

**9.14.20** All fuses and relays (other than chassis OEM) shall be placed in an Electrical Panel. The panel shall be accessible through a non-locking door. Connection to OEM electrical system shall be accomplished through connectors supplied by chassis manufacturer using locking mating connectors. A legend shall be provided on the circuit panel door that displays circuit fusing and identification information.

#### **9.15.0 GRAB RAILS AND STANCHIONS**

**9.15.1** Handrails and stanchions shall be provided in the entrance of the vehicle including:

9.15.1A LH Entry Stanchion Stainless Steel with modesty panel. Fastening of the panel shall be by bolts - screws will not be acceptable. The front side of the stanchion shall include a handle for boarding and aligned with entry door grab handles.

9.15.1B Entry Door Handles Stainless Steel mounted parallel to interior handles.

9.15.1C RH Entry Stanchion Stainless Steel.

#### **9.16.0 SEATING**

**9.16.1** Seats shall be installed utilizing wall and floor tracking to provide flexibility and easy movement.

#### **9.17.0 PASSENGER ENTRY RAMP**

**9.17.1** The entry ramp shall either be a Braun ramp or approved equal that is designed to let wheelchair and ambulatory passengers enter the bus once the ramp is fully deployed.

9.17.2 Entry ramp shall be rated at 1000 lbs.

9.17.3 Entry ramp shall be 62 inches minimum and provide a 1:6 angle when deployed to the ground.

9.17.4 Steps are not allowed and all passengers shall enter by way of passenger door.

#### 9.18.0 SAFETY

9.18.1 Every unit to include a White Standee Line with a sign.

#### Additional Equipment

##### Mobility Lift

Brand ..... Braun  
Model ..... RA3000  
Weight Capacity ..... 1,000 pounds  
Position in Vehicle ..... Passenger side door

##### Mobility Wheelchair Securement

Brand ..... Q'straint Retractable with 4 points  
seatbelt  
Model ..... QRT-360 (4), Q3000ASC3 (1)

##### Vehicle Modifications

Passenger Seats ..... Freedman Mid High Seats Level 1  
Covering with lap style seatbelts  
Floor Covering ..... Altro Rubber flooring (Storm Gray)  
Climate Control.....ThermoKing TropiCool SLR65-1004  
Roof Mounted Heat/Cool Combo  
Seating Capacity.....11 Passenger, 5 Wheelchair

## **Schedule C**

### **Required Federal Certifications and Clauses**

#### **1. Notification of Federal Participation**

This project is expected to be funded in part by the Federal Transit Administration (FTA) as authorized under 49 U.S.C. § 5307, 5337 and/or 5339. This notification of federal participation will be included in each subcontract financed in whole or in part with federal assistance provided by FTA.

#### **2. Full and Open Competition**

In accordance with 49 U.S.C. § 5325(h), all procurement transactions shall be conducted in a manner that provides full and open competition.

#### **3. Prohibition Against Exclusionary or Discriminatory Specifications**

Apart from inconsistent requirements imposed by Federal statute or regulations, the Supplier shall comply with the requirements of 49 USC 5323(h)(2) by refraining from using any FTA assistance to support procurements using exclusionary or discriminatory specifications.

#### **4. Compliance with Federal Regulations**

Any contract entered pursuant to this solicitation shall contain the following provisions: All USDOT-required contractual provisions, as set forth in FTA Circular 4220.1F, are incorporated by reference. Anything to the contrary herein notwithstanding, FTA mandated terms shall control in the event of a conflict with other provisions contained in this Agreement. Supplier shall not perform any act, fail to perform any act, or refuse to comply with any grantee request that would cause the municipal corporation to be in violation of FTA terms and conditions. Supplier shall comply with all applicable FTA regulations, policies, procedures and directives, including, without limitation, those listed directly or incorporated by reference in the Master Agreement between the municipal corporation and FTA, as may be amended or promulgated from time to time during the term of this contract. Supplier's failure to so comply shall constitute a material breach of this contract.

#### **5. No Obligation by the Federal Government**

The Purchaser and Supplier acknowledge and agree that, notwithstanding any concurrence by the Federal Government in or approval of the solicitation or award of the underlying contract, absent the express written consent by the Federal Government, the Federal Government is not a party to this contract and shall not be subject to any obligations or liabilities to the Purchaser, Supplier, or any other party (whether or not a party to that contract) pertaining to any matter resulting from the underlying contract.

The Supplier agrees to include the above clause in each subcontract financed in whole or in part with Federal assistance provided by FTA. It is further agreed that the clause shall not be modified, except to identify the Subcontractor who will be subject to its provisions.

#### **6. Program Fraud and False or Fraudulent Statements or Related Acts**

The Supplier acknowledges that the provisions of the Program Fraud Civil Remedies Act of 1986, as amended, 31 U.S.C. § 3801 et seq. and U.S. DOT regulations, "Program Fraud Civil Remedies," 49 C.F.R. Part 31, apply to its actions pertaining to this procurement. Upon execution of the underlying contract, the Supplier certifies or affirms the

truthfulness and accuracy of any statement it has made, it makes, it may make, or causes to be made, pertaining to the underlying contract or the FTA assisted project for which this contract work is being performed. In addition to other penalties that may be applicable, the Supplier further acknowledges that if it makes, or causes to be made, a false, fictitious, or fraudulent claim, statement, submission, or certification, the Federal Government reserves the right to impose the penalties of the Program Fraud Civil Remedies Act of 1986 on the Supplier to the extent the Federal Government deems appropriate.

The Supplier also acknowledges that if it makes, or causes to be made, a false, fictitious, or fraudulent claim, statement, submission, or certification to the Federal Government under a contract connected with a project that is financed in whole or in part with Federal assistance originally awarded by FTA under the authority of 49 U.S.C. § 5307, the Government reserves the right to impose the penalties of 18 U.S.C. § 1001 and 49 U.S.C. § 5307(n)(1) on the Supplier, to the extent the Federal Government deems appropriate.

The Supplier agrees to include the above two clauses in each subcontract financed in whole or in part with Federal assistance provided by FTA. It is further agreed that the clauses shall not be modified, except to identify the Subcontractor who will be subject to the provisions.

## **7. Access to Records**

The following access to records requirements apply to this Contract:

Where the Purchaser is not a State but a local government and is the FTA Recipient or a Subgrantee of the FTA Recipient in accordance with 49 C. F. R. 18.36(i), the Supplier agrees to provide the Purchaser, the FTA Administrator, the Comptroller General of the United States or any of their authorized representatives access to any books, documents, papers and records of the Supplier which are directly pertinent to this contract for the purposes of making audits, examinations, excerpts and transcriptions. Supplier also agrees, pursuant to 49 C. F. R. 633.17 to provide the FTA Administrator or his authorized representatives including any PMO Supplier access to Supplier's records and construction sites pertaining to a major capital project, defined at 49 U.S.C. 5302(a)1, which is receiving federal financial assistance through the programs described at 49 U.S.C. 5307, 5309 or 5311.

Where the Purchaser is a State and is the FTA Recipient or a Subgrantee of the FTA Recipient in accordance with 49 C.F.R. 633.17, Supplier agrees to provide the Purchaser, the FTA Administrator or his authorized representatives, including any PMO Supplier, access to the Supplier's records and construction sites pertaining to a major capital project, defined at 49 U.S.C. 5302(a)1, which is receiving federal financial assistance through the programs described at 49 U.S.C. 5307, 5309 or 5311. By definition, a major capital project excludes contracts of less than the simplified acquisition threshold currently set at \$100,000.

Where the Purchaser enters into a negotiated contract for other than a small purchase or under the simplified acquisition threshold and is an institution of higher education, a hospital or other non-profit organization and is the FTA Recipient or a subgrantee of the FTA Recipient in accordance with 49 C.F.R. 19.48, Supplier agrees to provide the Purchaser, FTA Administrator, the Comptroller General of the United States or any of their duly authorized representatives with access to any books, documents, papers and record of the Supplier which are directly pertinent to this contract for the purposes of making audits, examinations, excerpts and transcriptions.

Where any Purchaser which is the FTA Recipient or a Subgrantee of the FTA Recipient in accordance with 49 U.S.C. 5325(a) enters into a contract for a capital project or improvement (defined at 49 U.S.C. 5302(a)1) through other than competitive bidding, the Supplier shall make available records related to the contract to the Purchaser, the Secretary of Transportation and the Comptroller General or any authorized officer or employee of any of them for the purposes of conducting an audit and inspection.



The Supplier agrees to permit any of the foregoing parties to reproduce by any means whatsoever or to copy excerpts and transcriptions as reasonably needed.

The Supplier agrees to maintain all books, records, accounts and reports required under this contract for a period of not less than three years after the date of termination or expiration of this contract, except in the event of litigation or settlement of claims arising from the performance of this contract, in which case Supplier agrees to maintain same until the Purchaser, the FTA Administrator, the Comptroller General, or any of their duly authorized representatives, have disposed of all such litigation, appeals, claims or exceptions related thereto. Reference 49 CFR 18.39(i)(11).

FTA does not require the inclusion of these requirements in subcontracts.

## **8. Federal Changes**

Supplier shall at all times comply with all applicable FTA regulations, policies, procedures and directives, including without limitation those listed directly or by reference in the Master Agreement between Purchaser and FTA, as they may be amended or promulgated from time to time during the term of this contract. Supplier's failure to so comply shall constitute a material breach of this contract.

## **9. Disadvantaged Business Enterprise**

This contract is subject to the requirements of Title 49, Code of Federal Regulations, Part 26, Participation by Disadvantaged Business Enterprises in Department of Transportation Financial Assistance Programs. The Waukesha Transit Commission's goal for participation of Disadvantaged Business Enterprises (DBE) is 1.5%.

The Supplier shall not discriminate on the basis of race, color, national origin or sex in the performance of this contract. The Supplier shall carry out applicable requirements of 49 CFR Part 26 in the award and administration of this contract. Failure by the Supplier to carry out these requirements is a material breach of this contract, which may result in the termination of this contract or such other remedy as the municipal corporation deems appropriate. Each subcontract the Supplier signs with a Subcontractor must include the assurance in this paragraph (see 49 CFR 26.13(b)).

If a separate contract goal has been established, Bidders/Offerors are required to document sufficient DBE participation to meet these goals or, alternatively, document adequate good faith efforts to do so, as provided for in 49 CFR 26.53.

If no separate contract goal has been established, the successful Bidder/Offeror will be required to report its DBE participation obtained through race-neutral means throughout the period of performance.

The Supplier must promptly notify the Recipient whenever a DBE Subcontractor performing work related to this contract is terminated or fails to complete its work, and must make good faith efforts to engage another DBE Subcontractor to perform at least the same amount of work. The Supplier may not terminate any DBE Subcontractor and perform that work through its own forces or those of an affiliate without prior written consent of the Recipient.

## **10. Prompt Payment and Return of Retainage**

The Supplier is required to pay its Subcontractors performing work related to this contract for satisfactory performance of that work no later than 30 days after the Supplier's receipt of payment for that work from the Recipient. In addition, the Supplier may not hold retainage from its Subcontractors or must return any retainage payments to those Subcontractors within 30 days after the Subcontractor's work related to this contract is satisfactorily completed or must return any retainage payments to those Subcontractors within 30 days after

incremental acceptance of the Subcontractor's work by the Recipient and Supplier's receipt of the partial retainage payment related to the Subcontractor's work.

#### **11. Incorporation of Federal Transit Administration (FTA) Terms**

The preceding provisions include, in part, certain Standard Terms & Conditions required by USDOT, whether or not expressly stated in the preceding contract provisions. All USDOT-required contractual provisions, as stated in FTA Circular 4220.1F, are hereby incorporated by reference. Anything to the contrary herein notwithstanding, all FTA mandated terms shall be deemed to control in the event of a conflict with other provisions contained in this Agreement. The Supplier shall not perform any act, fail to perform any act, or refuse to comply with any request that would cause the Recipient to be in violation of FTA terms and conditions.

#### **12. Energy Conservation**

The Supplier agrees to comply with mandatory standards and policies relating to energy efficiency which are contained in the state energy conservation plan issued in compliance with the Energy Policy and Conservation Act.

#### **13. Recycled Products**

All contracts for items designated by the EPA, when the Purchaser or Supplier procures \$10,000 or more of one of these items during the current or previous fiscal year using Federal funds. The Supplier agrees to comply with all the requirements of Section 6002 of the Resource Conservation and Recovery Act (RCRA), as amended (42 U.S.C. 6962), including but not limited to the regulatory provisions of 40 CFR Part 247, and Executive Order 12873, as they apply to the procurement of the items designated in Subpart B of 40 CFR Part 247.

#### **14. Clean Water Requirements**

Pursuant to 33 U.S.C. 1251, Supplier shall comply with all applicable standards, orders or regulations issued pursuant to the Federal Water Pollution Control Act, as amended, 33 USC 1251 et seq. Supplier shall report each violation to the municipal corporation and understands and agrees that the municipal corporation shall, in turn, report each violation as required to FTA and the appropriate EPA Regional Office. Supplier shall include these requirements in each subcontract exceeding \$100,000 financed in whole or in part with FTA assistance.

#### **15. Clean Air**

Pursuant to 42 U.S.C. 7401 et seq, 40 CFR 15.61, 49 CFR Part 18, Supplier shall comply with all applicable standards, orders or regulations pursuant to the Clean Air Act, 42 USC 7401 et seq. Supplier shall report each violation to the municipal corporation and understands and agrees that the municipal corporation will, in turn, report each violation as required to FTA and the appropriate EPA Regional Office. Supplier shall include these requirements in each subcontract exceeding \$100,000 financed in whole or in part with FTA assistance.

#### **16. Access Requirements for Persons with Disabilities**

Supplier shall comply with 49 USC 5301(d), stating Federal policy that the elderly and persons with disabilities have the same rights as other persons to use mass transportation services and facilities and that special efforts shall be made in planning and designing those services and facilities to implement that policy. Supplier shall also comply with all applicable requirements of Sec. 504 of the Rehabilitation Act (1973), as amended, 29 USC 794, which prohibits discrimination on the basis of handicaps, and the Americans with Disabilities Act of 1990 (ADA), as amended, 42 USC 12101 et seq., which requires that accessible facilities and services be made available to persons with disabilities, including any subsequent amendments thereto.

## **17. Breaches and Dispute Resolution**

Pursuant to 49 CFR Part 18, FTA Circular 4220.1F, disputes arising in the performance of this contract which are not resolved by agreement of the parties shall be decided in writing by the municipal corporation's authorized representative. This decision shall be final and conclusive unless within ten (10) days from the date of receipt of its copy, Supplier mails or otherwise furnishes a written appeal to the municipal corporation's CEO. In connection with such appeal, Supplier shall be afforded an opportunity to be heard and to offer evidence in support of its position. The decision of the municipal corporation's CEO shall be binding upon Supplier and Supplier shall abide by the decision.

Performance During Dispute - Unless otherwise directed by the municipal corporation, Supplier shall continue performance under this contract while matters in dispute are being resolved.

Claims for Damages - Should either party to the contract suffer injury or damage to person or property because of any act or omission of the party or of any of his employees, agents or others for whose acts he is legally liable, a claim for damages therefore shall be made in writing to such other party within ten days after the first observance of such injury or damage.

Remedies - Unless this contract provides otherwise, all claims, counterclaims, disputes and other matters in question between the municipal corporation and Supplier arising out of or relating to this agreement or its breach will be decided by arbitration if the parties mutually agree, or in a court of competent jurisdiction within the residing State.

Rights and Remedies - Duties and obligations imposed by the contract documents and the rights and remedies available there under shall be in addition to and not a limitation of any duties, obligations, rights and remedies otherwise imposed or available by law. No action or failure to act by the municipal corporation or Supplier shall constitute a waiver of any right or duty afforded any of them under the contract, nor shall any such action or failure to act constitute an approval of or acquiescence in any breach there under, except as may be specifically agreed in writing.

## **18. Termination**

- (a) Termination for Convenience. The Recipient may terminate this contract, in whole or in part, at any time by written notice to Supplier when it is in the Recipient's best interest. Supplier shall be paid its costs, including contract close-out costs, and profit on work performed up to the time of termination. Supplier shall promptly submit its termination claim to the Recipient. If Supplier is in possession of any of the Recipient's property, Supplier shall account for same, and dispose of it as the Recipient directs.
- (b) Termination for Default [Breach or Cause]. If Supplier does not deliver items in accordance with the contract delivery schedule, or, if the contract is for services, and Supplier fails to perform in the manner called for in the contract, or if Supplier fails to comply with any other provisions of the contract, the Recipient may terminate this contract for default. Termination shall be effected by serving a notice of termination to Supplier setting forth the manner in which Supplier is in default. Supplier shall only be paid the contract price for supplies delivered and accepted, or for services performed in accordance with the manner of performance set forth in the contract. If it is later determined by the Recipient that Supplier had an excusable reason for not performing, such as a strike, fire, or flood, events which are not the fault of or are beyond the control of Supplier, the Recipient, after setting up a new delivery or performance schedule, may allow Supplier to continue work, or treat the termination as a termination for convenience.

- (c) Opportunity to Cure. The Recipient in its sole discretion may, in the case of a termination for breach or default, allow Supplier an appropriately short period of time in which to cure the defect. In such case, the notice of termination shall state the time period in which cure is permitted and other appropriate conditions. If Supplier fails to remedy to the Recipient's satisfaction the breach or default or any of the terms, covenants, or conditions of this Contract within ten (10) days after receipt by Supplier or written notice from the Recipient setting forth the nature of said breach or default, the Recipient shall have the right to terminate the Contract without any further obligation to Supplier. Any such termination for default shall not in any way operate to preclude the Recipient from also pursuing all available remedies against Supplier and its sureties for said breach or default.
- (d) Waiver of Remedies for any Breach. In the event that the Recipient elects to waive its remedies for any breach by Supplier of any covenant, term or condition of this Contract, such waiver by the Recipient shall not limit its remedies for any succeeding breach of that or of any other term, covenant, or condition of this Contract.
- (e) Termination for Convenience (Professional or Transit Service Contracts). The Recipient, by written notice, may terminate this contract, in whole or in part, when it is in the Recipient's interest. If the contract is terminated, the Recipient shall be liable only for payment under the payment provisions of this contract for services rendered before the effective date of termination.
- (f) Termination for Default (Supplies and Service). If Supplier fails to deliver supplies or to perform the services within the time specified in this contract or any extension or if the Supplier fails to comply with any other provisions of this contract, the Recipient may terminate this contract for default. The Recipient shall deliver to Supplier a notice of termination specifying the nature of default. Supplier shall only be paid the contract price for supplies delivered and accepted, or services performed in accordance with the manner or performance set forth in this contract. If, after termination for failure to fulfill contract obligations, it is determined that Supplier was not in default, the rights and obligations of the parties shall be the same as if termination had been issued for the Recipient's convenience.
- (g) Termination for Default (Transportation Services). If Supplier fails to pick up the commodities or to perform the services, including delivery services, within the time specified in this contract or any extension or if Supplier fails to comply with any other provisions of this contract, the Recipient may terminate this contract for default. The Recipient shall terminate by delivering to Supplier a notice of termination specifying the nature of default. Supplier shall only be paid the contract price for services performed in accordance with the manner of performance set forth in this contract. If this contract is terminated while Supplier has possession of the Recipient goods, Supplier shall, as directed by the Recipient, protect and preserve the goods until surrendered to the Recipient or its agent. Supplier and the Recipient shall agree on payment for the preservation and protection of goods. Failure to agree on an amount shall be resolved under the Dispute clause. If, after termination for failure to fulfill contract obligations, it is determined that Supplier was not in default, the rights and obligations of the parties shall be the same as if termination had been issued for the Recipient's convenience.
- (h) Termination for Default (Construction). If Supplier refuses or fails to prosecute the work or any separable part, with the diligence that will insure its completion within the time specified, or any extension, or fails to complete the work within this time, or if Supplier fails to comply with any other provisions of this contract, the Recipient may terminate this contract for default. The Recipient shall terminate by delivering to Supplier a notice of termination specifying the nature of default. In this event, the Recipient may take over the work and compete it by contract or otherwise, and may take possession of and use any materials, appliances, and plant on the work site necessary for completing the work. Supplier and its sureties shall be liable for any damage to the

Recipient resulting from Supplier's refusal or failure to complete the work within specified time, whether or not Supplier's right to proceed with the work is terminated. This liability includes any increased costs incurred by the Recipient in completing the work.

Supplier's right to proceed shall not be terminated nor shall Supplier be charged with damages under this clause if:

- (1) Delay in completing the work arises from unforeseeable causes beyond the control and without the fault or negligence of Supplier. Examples of such causes include: acts of God, acts of the Recipient, acts of another Supplier in the performance of a contract with the Recipient, epidemics, quarantine restrictions, strikes, freight embargoes; and
  - (2) Supplier, within 10 days from the beginning of any delay, notifies the Recipient in writing of the causes of delay. If in the Recipient's judgment, delay is excusable, the time for completing the work shall be extended. The Recipient's judgment shall be final and conclusive on the parties, but subject to appeal under the Disputes clauses. If, after termination of Supplier's right to proceed, it is determined that Supplier was not in default, or that the delay was excusable, the rights and obligations of the parties will be the same as if termination had been issued for the Recipient's convenience.
- (i) Termination for Convenience or Default (Architect & Engineering). The Recipient may terminate this contract in whole or in part, for the Recipient's convenience or because of Supplier's failure to fulfill contract obligations. The Recipient shall terminate by delivering to Supplier a notice of termination specifying the nature, extent, and effective date of termination. Upon receipt of the notice, Supplier shall (1) immediately discontinue all services affected (unless the notice directs otherwise), and (2) deliver to the Recipient all data, drawings, specifications, reports, estimates, summaries, and other information and materials accumulated in performing this contract, whether completed or in process. If termination is for the Recipient's convenience, it shall make an equitable adjustment in the contract price but shall allow no anticipated profit on unperformed services. If termination is for Supplier's failure to fulfill contract obligations, the Recipient may complete the work by contract or otherwise and Supplier shall be liable for any additional cost incurred by the Recipient. If, after termination for failure to fulfill contract obligations, it is determined that Supplier was not in default, the rights and obligations of the parties shall be the same as if termination had been issued for the Recipient's convenience.
- (j) Termination for Convenience or Default (Cost-Type Contracts). The Recipient may terminate this contract, or any portion of it, by serving a notice of termination on Supplier. The notice shall state whether termination is for convenience of the Recipient or for default of Supplier. If termination is for default, the notice shall state the manner in which Supplier has failed to perform the requirements of the contract. Supplier shall account for any property in its possession paid for from funds received from the Recipient, or property supplied to Supplier by the Recipient. If termination is for default, the Recipient may fix the fee, if the contract provides for a fee, to be paid to Supplier in proportion to the value, if any, of work performed up to the time of termination. Supplier shall promptly submit its termination claim to the Recipient and the parties shall negotiate the termination settlement to be paid to Supplier. If termination is for the Recipient's convenience, Supplier shall be paid its contract close-out costs, and a fee, if the contract provided for payment of a fee, in proportion to the work performed up to the time of termination. If, after serving a notice of termination for default, the Recipient determines that Supplier has an excusable reason for not performing, such as strike, fire, flood, events which are not the fault of and are beyond the control of Supplier, the Recipient, after setting up a new work schedule, may allow Supplier to continue work, or treat the termination as a termination for convenience.

## **19. Civil Rights Requirements**

- (a) Nondiscrimination - In accordance with Title VI of the Civil Rights Act, as amended, 42 USC 2000d, Sec. 303 of the Age Discrimination Act (1975), as amended, 42 USC 6102, Sec. 202 of the Americans with Disabilities Act (1990), 42 USC 12132, and 49 USC 5332, Supplier shall not discriminate against any employee or applicant for employment because of race, color, creed, national origin, sex, age or disability. Supplier shall also comply with applicable Federal implementing regulations and other requirements.
- (b) Equal Employment Opportunity - The following equal employment opportunity requirements apply to the underlying contract:
  - (i.) Race, Color, Creed, National Origin, Sex - In accordance with Title VII of the Civil Rights Act, as amended, 42 USC 2000e, and 49 USC 5332, Supplier shall comply with all applicable equal employment opportunity requirements of USDOL, "Office of Federal Contract Compliance Programs, Equal Employment Opportunity, USDOL," 41 CFR 60 et seq., (implementing Executive Order No. 11246, "Equal Employment Opportunity," as amended by Executive Order No. 11375, "Amending Executive Order 11246 Relating to Equal Employment Opportunity," 42 USC 2000e), and any applicable Federal statutes, executive orders, regulations, and policies that may in the future affect construction activities undertaken in the course of the project. Supplier shall take affirmative action to ensure that applicants are employed, and that employees are treated during employment, without regard to their race, color, creed, national origin, sex or age. Such action shall include, but not be limited to, the following: employment, upgrading, demotion or transfer, recruitment or recruitment advertising, layoff or termination; rates of pay or other forms of compensation; and selection for training, including apprenticeship. In addition, Supplier shall comply with any implementing requirements FTA may issue.
  - (ii.) Age - In accordance with Sec. 4 of the Age Discrimination in Employment Act (1967), as amended, 29 USC 623 and 49 USC 5332, Supplier shall refrain from discrimination against present and prospective employees for reason of age. Supplier shall also comply with any implementing requirements FTA may issue.
  - (iii.) Disabilities - In accordance with Sec. 102 of the Americans with Disabilities Act (ADA), as amended, 42 USC 12112, Supplier shall comply with the requirements of US Equal Employment Opportunity Commission (EEOC), Regulations to Implement Equal Employment Provisions of the Americans with Disabilities Act, 29 CFR 1630, pertaining to employment of persons with disabilities. Supplier shall also comply with any implementing requirements FTA may issue.
- (c) Supplier shall include these requirements in each subcontract financed in whole or in part with FTA assistance, modified only if necessary to identify the affected parties.

## **20. Real Property**

Supplier shall at all times comply with all applicable statutes and USDOT regulations, policies, procedures and directives governing the acquisition, use and disposal of real property, including, but not limited to, 29 CFR 18.31, 49 CFR 24 Subpart B, FTA Circular 5010.1D, and FTA Master Agreement, as they may be amended or promulgated during the term of this contract. Supplier's failure to so comply shall constitute a material breach of this contract.

## **21. Interest of Members or Delegates to Congress**

No members of, or delegates to, the US Congress shall be admitted to any share or part of this contract nor to any benefit arising therefrom.

## **22. Cargo Preference - Use of United States Flag Vessels**

The Supplier agrees to:

- (a) Use privately owned United States-Flag commercial vessels to ship at least 50 percent of the gross tonnage (computed separately for dry bulk carriers, dry cargo liners, and tankers) involved, whenever shipping any equipment, material, or commodities pursuant to the underlying contract to the extent such vessels are available at fair and reasonable rates for United States-Flag commercial vessels;
- (b) Furnish within 20 working days following the date of loading for shipments originating within the United States or within 30 working days following the date of loading for shipments originating outside the United States, a legible copy of a rated, "on-board" commercial ocean bill-of-lading in English for each shipment of cargo described in the preceding paragraph to the Division of National Cargo, Office of Market Development, Maritime Administration, Washington, DC 20590 and to the FTA Recipient (through the Supplier in the case of a Subcontractor's bill-of-lading.); and
- (c) Include these requirements in all subcontracts issued pursuant to this contract when the subcontract may involve the transport of equipment, material, or commodities by ocean vessel.

## **23. Fly America Requirements**

The Supplier agrees to comply with 49 U.S.C. 40118 (the "Fly America" Act) in accordance with the General Services Administration's regulations at 41 CFR Part 301-10, which provide that Recipients and Subrecipients of Federal funds and their Suppliers are required to use U.S. Flag air carriers for U.S. Government-financed international air travel and transportation of their personal effects or property, to the extent such service is available, unless travel by foreign air carrier is a matter of necessity, as defined by the Fly America Act. The Supplier shall submit, if a foreign air carrier was used, an appropriate certification or memorandum adequately explaining why service by a U.S. flag air carrier was not available or why it was necessary to use a foreign air carrier and shall, in any event, provide a certificate of compliance with the Fly America requirements. The Supplier agrees to include the requirements of this section in all subcontracts that may involve international air transportation.

## **24. Conformance with ITS National Architecture**

Supplier shall conform, to the extent applicable, to the National Intelligent Transportation Standards architecture as required by SAFETEA-LU Section 5307(c), 23 U.S.C. Section 512 note and follow the provisions of FTA Notice, "FTA National Architecture Policy on Transit Projects," 66 Fed. Reg. 1455 et seq., January 8, 2001, and any other implementing directives FTA may issue at a later date, except to the extent FTA determines otherwise in writing.

## **25. Ineligible Suppliers and Subcontractors**

Any name appearing upon the Comptroller General's list of ineligible Suppliers for federally-assisted contracts shall be ineligible to act as a subcontractor for Supplier pursuant to this contract. If Supplier is on the Comptroller General's list of ineligible Suppliers for federally financed or assisted construction, the municipal corporation shall cancel, terminate or suspend this contract.

## **26. Transit Vehicle Manufacturer (TVM) Certification**

This procurement is subject to the provisions of 49 CFR Section 26.49.

The Supplier, if a transit vehicle manufacturer, hereby certifies that it has complied with the requirements of 49 CFR Section 26.49 by submitting a current annual DBE goal to the Federal Transit Administration, and that it is eligible to bid on federally funded transit procurements.

The Supplier, if a non-vehicle manufacturer supplier, hereby certifies that the manufacturer of the transit vehicle to be supplied has complied with the above-referenced requirements of 49 CFR Section 26.49 and is eligible to bid on federally funded transit procurements.

## **27. Buy America**

This procurement is subject to Federal law which makes the purchase of American made products a requirement. The law is found under 49 U.S.C. 5323(j), and the related regulations are written under Title 49 of the Code of Federal Regulations, Part 661. The law and regulations establish a general requirement as well as certain exceptions.

The Supplier agrees to comply with 49 U.S.C. 5323(j) and 49 C.F.R. Part 661, which provide that Federal funds may be obligated unless steel, iron, and manufactured products used in FTA-funded projects are produced in the United States, unless a waiver has been granted by FTA or the product is subject to a general waiver. General waivers are listed in 49 C.F.R. 661.7, include microcomputer equipment, software, and small purchases (currently less than \$150,000) made with capital, operating, or planning funds. Separate requirements for rolling stock are set out at 5323(j)(2)(C) and 49 C.F.R. 661.11. Rolling stock not subject to a general waiver must be manufactured in the United States and have a 65 percent domestic content.

The Supplier hereby certifies that it will comply with the requirements of Section 49 U.S.C. Section 5323(j)(2)(C), Section 165(b)(3) of the Surface Transportation Assistance Act of 1982, as amended, and the regulations of 49 C.F.R. 661.11:

The Supplier will also provide a detailed list of all the major components and subassemblies (see list below) of the vehicle and the calculated percentage for each item of total manufacturer's cost that was made in the United States. The Supplier will make available to the Contracting Officer, upon request, any and all costs and other documentation to support this listing in order to comply with 49 C.F.R. Part 661. The list of items is as follows: Engines, transmissions, front axle assemblies, rear suspension assemblies, air compressor and pneumatic systems, generator/alternator and electrical systems, steering system assemblies, front and rear air brake assemblies, heating systems, passenger seats, driver's seat assemblies, window assemblies, entrance and exit door assemblies, door control systems, destination sign assemblies, interior lighting assemblies, front and rear end cap assemblies, front and rear bumper assemblies, specialty steel (structural steel tubing, etc.), aluminum extrusions, aluminum, steel or fiberglass exterior panels, interior trim, flooring, floor coverings, fire hoses, and wheelchair assemblies.

The manufacturer's information must also include the proposed final assembly location; a list of activities that will take place during final assembly; and the proposed total cost of final assembly.

This list will be requested at least two times during the procurement process: (1) Prior to award of the contract; and, (2) within thirty (30) days following the manufacturer's assembly of the first vehicle awarded in the base contract. Subsequent post-delivery "Buy America" audit listings for the contract options will be provided by the proposer awarded the contract, if requested.



## **28. Purchaser's Requirements**

49 C.F.R 663 - Subpart B requires that the products bid are the same as described in the bid solicitation specifications and that the proposed manufacturer is a responsible manufacturer with the capability to produce a bus that meets the specifications.

## **29. Federal Motor Vehicle Safety Standards (FMVSS)**

49 C.F.R. 663 - Subpart D requires that the vehicles to be provided will comply with the relevant Federal Motor Vehicle Safety Standards issued by the National Highway Traffic Safety Administration in Title 49 of the Code of Federal Regulations, Part 571 or that the vehicles will not be subject to FMVSS regulations.

## **30. Pre-Award FMVSS**

The Supplier certifies that the vehicles to be provided under this Contract will comply with the relevant Federal Motor Vehicle Safety Standards issued by the National Highway Traffic Safety Administration in Title 49 of the Code of Federal Regulations, part 571 and that it has submitted the manufacturer's self-certification information with the bid.

## **31. Government-Wide Debarment and Suspension**

Background and Applicability: In conjunction with the Office of Management and Budget and other affected Federal agencies, DOT published an update to 49 CFR Part 29 on November 26, 2003. This government-wide regulation implements Executive Order 12549, Debarment and Suspension, Executive Order 12689, Debarment and Suspension, and 31 U.S.C. 6101 note (Section 2455, Public Law 103-355, 108 Stat. 3327).

The provisions of Part 29 apply to all grantee contracts and subcontracts at any level expected to equal or exceed \$25,000 as well as any contract or subcontract (at any level) for Federally required auditing services. 49 CFR 29.220(b). This represents a change from prior practice in that the dollar threshold for application of these rules has been lowered from \$100,000 to \$25,000. These are contracts and subcontracts referred to in the regulation as "covered transactions." Grantees, Suppliers, and Subcontractors (at any level) that enter into covered transactions are required to verify that the entity (as well as its principals and affiliates) they propose to contract or subcontract with is not excluded or disqualified.

They do this by (1) Checking the Excluded Parties List System, (2) Collecting a certification from that person, or (3) Adding a clause or condition to the contract or subcontract. This represents a change from prior practice in that certification is still acceptable but is no longer required;

Grantees, Suppliers, and Subcontractors who enter into covered transactions also must require the entities they contract with to comply with 49 CFR 29, subpart C and include this requirement in their own subsequent covered transactions (i.e., the requirement flows down to subcontracts at all levels).

Instructions for Certification: By signing and submitting this bid or proposal, the prospective lower tier participant is providing the signed certification set out below.

This Contract is a covered transaction for purposes of 49 CFR Part 29. As such, the Supplier verifies that none of the Supplier, its principals, as defined at 49 CFR 29.995, or affiliates, as defined at 49 CFR 29.905, are excluded or disqualified as defined at 49 CFR 29.940 and 29.945.

The Supplier is required to comply with 49 CFR 29, Subpart C and must include the requirement to comply with 49 CFR 29, Subpart C in any lower tier covered transaction it enters into. By executing this Contract, the Supplier certifies as follows:

The certification in this clause is a material representation of fact relied upon by the Recipient. If it is later determined that the bidder or proposer knowingly rendered an erroneous certification, in addition to remedies available to the Recipient, the Federal Government may pursue available remedies, including but not limited to suspension and/or debarment. The bidder or proposer agrees to comply with the requirements of 49 CFR 29, Subpart C while this offer is valid and throughout the period of any contract that may arise from this offer. The bidder or proposer further agrees to include a provision requiring such compliance in its lower tier covered transactions.

### **32. Lobbying**

Pursuant to 31 U.S.C. 1352, 49 CFR Part 19, 49 CFR Part 20, Byrd Anti-Lobbying Amendment, 31 U.S.C. 1352, as amended by the Lobbying Disclosure Act of 1995, P.L. 104-65 [to be codified at 2 U.S.C. § 1601, et seq.] - Suppliers who apply or bid for an award of \$100,000 or more shall file the certification required by 49 CFR part 20, "New Restrictions on Lobbying." Each tier certifies to the tier above that it will not and has not used Federal appropriated funds to pay any person or organization for influencing or attempting to influence an officer or employee of any agency, a member of Congress, officer or employee of Congress, or an employee of a member of Congress in connection with obtaining any Federal contract, grant or any other award covered by 31 U.S.C. 1352. Each tier shall also disclose the name of any registrant under the Lobbying Disclosure Act of 1995 who has made lobbying contacts on its behalf with non-Federal funds with respect to that Federal contract, grant or award covered by 31 U.S.C. 1352. Such disclosures are forwarded from tier to tier up to the recipient.

Supplier certifies that:

- ☐ No federal appropriated funds have been paid or will be paid, by or on behalf of the undersigned, to any person for influencing or attempting to influence an officer or employee of any agency, a Member of Congress, and officer or employee of Congress, or an employee of a Member of Congress in connection with the awarding of any federal contract, the making of any federal grant, the making of any federal loan, the entering into of any cooperative agreement, and the extension, continuation, renewal, amendment, or modification of any federal contract, grant, loan, or cooperative agreement.
- ☐ If any funds other than federal appropriated funds have been paid or will be paid to any person influencing or attempting to influence an officer or employee of any agency, a Member of Congress, and officer or employee of Congress, or an employee of a Member of Congress in connection with the federal contract, grant, loan, or cooperative agreement, the undersigned shall complete and submit Standard Form – LLL, "Disclosure Form to Report Lobbying," in accordance with its instructions.
- ☐ The Supplier shall require that the language of this certification be included in the award documents for all sub-awards at all tiers (including sub-contracts, subgrants and contracts under grants, loans, and cooperative agreements) and that all sub-recipients shall certify and disclose accordingly.

*This certification is a material representation of fact upon which reliance was placed when this transaction was made or entered into. Submission of this certification is a prerequisite for making or entering into this transaction imposed by 31 U.S.C. § 1352 (as amended by the Lobbying Disclosure Act of 1995). Any person who fails to file the required certification shall be subject to a civil penalty of not less than \$10,000 and not more than \$100,000 for each such failure. The undersigned certifies or affirms the truthfulness and accuracy of the contents of the statements submitted*

*on or with this certification and understands that the provisions of 31 U.S.C. Section 3801, et seq., are applicable thereto.*