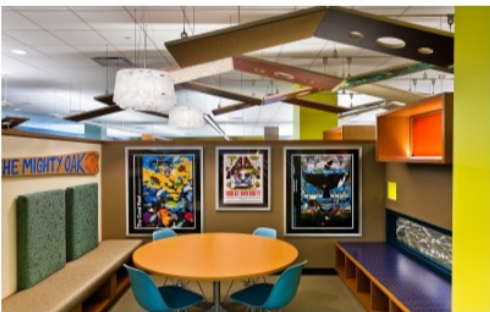


2019



Outreach Services Bookmobile Bid

Fountaindale Public Library District
300 W. Briarcliff Road, Bolingbrook, IL 60440

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Background

The Fountaindale Public Library District is seeking bids for an Outreach Services Bookmobile to serve its community. The District has been operating a bookmobile since 2002 and it is due to be replaced.

Timeline

- May 2, 2019 - Publish Notice in paper
- May 3, 2019 - Publish Bid on website
- May 28, 2019 - Last day to submit questions to Bid contact person
- June 4, 2019 - Questions and Answers published on District website
- June 17, 2019 - Respondent bids due by 4:00 p.m. CDT
- June 18, 2019 - Bids opened at Fountaindale Public Library District at 9:30 a.m. CDT
- July 18, 2019 - Bid awarded at Fountaindale Public Library District Board Meeting

Instructions

Bid Contact Person:

Paul Mills
Executive Director
Fountaindale Public Library District
300 West Briarcliff Road
Bolingbrook, IL 60440
pmills@fountaindale.org

Questions and Notifications

All inquiries, questions or notifications must be sent in writing via postal mail or email and marked "Outreach Services Bookmobile Bid 2019." Phone calls will not be accepted. All inquiries shall be directed only to the Bid contact person as shown above. Violations of this provision by respondent or interested parties may result in the rejection of the bid.

The District shall respond in writing to written communications and reserves the right, at its sole discretion, to determine appropriate and adequate responses to written comments, questions, and requests for clarification. Should any question or response require revision to the specifications as originally published, such revisions will be made in writing by formal addendum and will be posted on the Fountaindale Public Library District website at www.fountaindale.org.

Should the respondent suspect any error, omission, or discrepancy in the specifications or instructions, the respondent shall immediately notify Paul Mills in writing via postal mail or email. Paul Mills shall issue written instructions that are to be followed by each respondent. Updated instructions will be posted on the Fountaindale Public Library District website at www.fountaindale.org.

Bid Submission

Bids must be received no later than 4:00 p.m. CDT on June 17, 2019. Bids must be submitted electronically in PDF or Microsoft Word format. Files may not be password-protected or copy-protected. Print copies of the bid may be submitted in addition to the electronic version, but this is optional.

The bid must be inclusive of every item specified in this document. All substitutions shall be expressly accepted by the District prior to execution. Bids that do not include all of the items specified in this document will not be considered.

It is the respondent's responsibility to ensure bids are received by the closing date and time. Late bids will not receive consideration.

Bids must include the following sections in this order:

- A. Contact information. Name, address, FEIN number, phone number, and email address of the respondent.
- B. Corporate profile describing your company, including the number of employees and physical location of current operations offices. Also state whether the corporation or other entity is fully licensed and incorporated or otherwise legally qualified to do business in the State of Illinois.
- C. Key personnel. Identify persons who will assist with this contract. For each person, include the name, title, experience, and periods of service with your firm.
- D. Statement of qualifications. State your experience with similar projects.
- E. Bid must include financial stability documentation and certify that the company is able to be bonded.
- F. References. Five references from recent customers, including name, agency, phone number, and email address of persons to contact. At least two of the references must have purchased a bookmobile or similar District vehicle.
- G. Fully completed Additional Documents listed in the Additional Required Documents section.
- H. Complete answers of how all specifications and requirements will be met per this bid's requirements. Detailed exceptions/clarifications document detailing any and all variations from the specifications detailed herein. The document shall also specifically accept all other bid specifications as written unless detailed as an exception or clarification. No manufacturer specifications will be considered as a valid response.
- I. Local service facility list for chassis, conversion, and all major components.
- J. Extended warranty options including coverage and cost.
- K. Any company brochures, photos, or literature deemed beneficial in demonstrating company history and necessary experience required to successfully complete a project of this complexity.
- L. Proposed Delivery Time in calendar days including weekends and holidays.
- M. Stated lifetime of the proposed unit.

Bid Security

A five percent (5%) bid security in the form of a bid bond, postal money order, certified check, or cashier's check made payable to the District must accompany the bid. Failure to furnish a bid security in the proper form and amount, by the time set for opening of bids, may be cause for rejection of the bid, in the absolute discretion of the District.

Conditions of the Contract

All files, records, documents, and similar items relating to the business of the Fountaindale Public Library District whether they are prepared by the respondent or come into the respondent's possession in any other way, are and shall remain the exclusive property of the Fountaindale Public Library District. The respondent shall not misuse, misappropriate, or disclose any of the facts or materials described herein, directly or indirectly, either during the term of the contract or at any time thereafter.

The respondent's position is strictly contractual. The person fulfilling the specifications of this project will in no way assume an employer/employee relationship with the Fountaindale Public Library District. Benefits provided Fountaindale Public Library District employees will not be provided to the respondent for this contract.

The contents of the bid of the successful respondent (if any) shall become contractual obligations binding on the successful respondent if a contract is issued by the Fountaindale Public Library District.

Before submitting proposal, each bidder shall examine carefully all documents pertaining to the work. Submission of bid will be considered presumptive evidence that the Bidder is conversant with local facilities and difficulties, the requirements of the documents and of pertinent State or Local Codes, State of Labor and Material Markets, and has made due allowance in his bid for all contingencies. Include in bid all costs of labor, material, equipment, allowance, fees, permits, guarantees, applicable taxes, insurance and contingencies, with overhead and profit necessary to produce a complete project, or to complete those portions of the work covered by the specifications on which proposal is made, including all trades, without further cost to the District. Obtain all permits and arrange for all inspections. Pay all fees and costs incurred. No compensation will be allowed by reason of any difficulties which the Bidder could have discovered or reasonably should have discovered prior to bidding.

Certain conditions are unacceptable to the Fountaindale Public Library District, including, but not limited to, the following:

- Governing law other than the State of Illinois
- Clauses requiring the Fountaindale Public Library District to indemnify or hold harmless the successful respondent
- Clauses that unduly restrict or place unreasonable claims of ownership on data which are the subject of the agreement/contract
- Clauses relating to requiring the Fountaindale Public Library District to enter into reimbursement arrangements relative to attorney's fees
- Payment terms of less than thirty (30) days

Compliance with Requirements

Each respondent is responsible for the contents of its bid and for satisfying the requirements set forth in the bid. The respondent is expected to comply with the true

intent of this bid taken as a whole and shall not avail itself or take advantage of any errors or omissions in the description of the proposed equipment and services.

Each bid is subject to and is governed by the Equal Employment Opportunity Clause set forth in the Rules and Regulations of the Illinois Department of Human Rights. The successful respondent must comply with the applicable provisions of the federal Occupational Safety and Health Act, and any standards and regulations issued thereunder, and shall certify that all services furnished pursuant to its bid will conform to and comply with said standards and regulations. In addition, the successful respondent must comply with all other applicable laws.

These requirements also apply to all subcontractors hired by the primary respondent.

Cost of Preparing Bid

The cost of developing and submitting the bid is entirely the responsibility of the respondent. This includes costs to determine the nature of the engagement, preparation of the bid, submitting the bid, negotiating for the contract and other costs associated with this bid.

Preparation of Bid

The Fountaindale Public Library District has the right to rely on any information and price quotes provided by respondents. The respondent shall be responsible for any mathematical error in price quotes. The Fountaindale Public Library District reserves the right to reject bids which contain errors.

A bid shall not be considered for award if the price in the bid was not arrived at independently and without collusion, consultation, communication or agreement as to any matter related to price with any other respondent, competitor or interested party.

Before submitting a bid, each bidder shall examine carefully all documents pertaining to the work. Submission of bid will be considered presumptive evidence that the Bidder is conversant with local facilities and difficulties, the requirements of the documents and of pertinent State or Local Codes, State of Labor and Material Markets, and has made due allowance in his bid for all contingencies. Include in bid all costs of labor, material, equipment, allowance, fees, permits, guarantees, applicable taxes, insurance and contingencies, with overhead and profit necessary to produce a complete project, or to complete those portions of the work covered by the specifications on which proposal is made, including all trades, without further cost to the District. Obtain all permits and arrange for all inspections. Pay all fees and costs incurred. No compensation will be allowed by reason of any difficulties which the Bidder could have discovered or reasonably should have discovered prior to bidding.

Competition

The purpose of this bid is to seek competition. The respondent shall advise the Fountaindale Public Library District if any specification, language or other requirement inadvertently restricts or limits bidding to a single source. Notification shall be in writing

and must be received by the bid contact person no later than five (5) business days prior to the response due date.

Bid Disclosures

All information submitted is subject to the Illinois Freedom of Information Act (5 ILCS 140) and other applicable laws and rules. Respondents claiming exemption from disclosure of certain portions of the offer must do so in a separate section of the offer clearly labeled "Confidential Information." The District cannot guarantee confidentiality where Illinois law demands disclosure.

Bid Term

Prices, terms and conditions for the bid must be kept firm for at least 90 days after the deadline to submit bids. Bids for periods of less than 90 days may be considered nonresponsive and, therefore, may be rejected.

Sales Tax Exemption

The Fountaindale Public Library District is a tax exempt body. Proof of tax exempt status is available upon request. Taxes should not be reflected in the bid price.

Award Authority

The District shall be the sole judge of the quality, construction, and suitability of the equipment, materials, and craftsmanship offered in its determination of the successful bid.

Method of Award

Award of the contract will be made to the lowest responsive, responsible bidder, as determined by the District. The District may reject any or all of the bids on any basis and without disclosure of a reason. The failure to make such a disclosure shall not result in accrual of any right, claim, or cause of action by any unsuccessful bidder against the District.

Brand Names

Any reference to a specific manufacturer or make or model of product not followed by "or equivalent" may not be substituted. All proposed equivalents shall be expressly approved by the District. The particulars listed within this specification shall be considered minimal, and the respondent is expected to increase them where necessary to meet or exceed the general intent.

Contract Alterations and Integration

All documents including but not limited to this bid, specifications, drawings, change orders, or other pertinent documents created by either party in the performance of this agreement shall be incorporated in the Contract between the District and the successful respondent. No alteration or variation of the terms of this Contract shall be valid unless made in writing and signed by the parties hereto, and no oral understanding or agreement not incorporated herein, shall be binding on any of the parties hereto.

Contract Required

The successful respondent will be required to enter into a written contract with the District, setting forth the conditions specified in this bid, as well as other standard terms and conditions. The successful respondent shall be solely liable for compliance with all specifications contained herein.

Delivery

Bid shall state the time required for delivery in calendar days (including weekends and holidays) and/or firm calendar date. Extreme late delivery, determined by the District to be thirty (30) days after the agreed upon contract delivery date, shall be cause for liquidated damages of \$300 per calendar day and/or contract cancellation. Exceptions shall be considered for delays caused by; strike, work stoppage, act of God, or sole act or acts of third parties over which the successful respondent has no control or authority.

The completed vehicle shall be delivered to the following address:

Fountaindale Public Library District 300 West Briarcliff Road Bolingbrook, IL 60440

Evaluation Criteria

The District may contact and evaluate the respondent's and/or subcontractor's references; contact any respondent to clarify any response; contact any current users of a respondent's services; solicit information from any available source concerning any aspect of a bid; and seek and review any other information deemed pertinent to the evaluation process.

Indemnification

Respondent, at its own expense, shall indemnify and hold the District, its officers, employees, agents, customers, constituents, designees and assignees harmless from any loss, damage, liability or expense, on account of damage to property and injuries, including death, to all persons, arising from any occurrence caused by any act or omission of respondent, and at its expense, shall defend any suit or dispose of any claim or other proceedings brought against said indemnitees on account of such damage or injury, and shall pay all expenses, including attorney's fees, and satisfy all judgments which may be incurred by or rendered against said indemnitees. This obligation applies to all material under this contract, which will involve exposure to hazardous materials or items containing this material. To the fullest extent permitted by

Illinois law, neither the requirements of this clause nor any act or failure to act by District shall relieve the respondent of any responsibility or liability for the safety of District, respondent, or subcontractor personnel or property. The respondent shall comply with applicable Federal, State, and local laws, codes, ordinances and regulations (including the obtaining of licenses and permits) in conjunction with hazardous material.

Infringement

The respondent must save, keep, hold harmless and fully indemnify the District and its officers and employees and agents from all damages, or claims for damages, costs or expenses in law or equity that at any time arise or be set up for any infringement of patent rights, copyright or trademark on any person or persons in consequence of the use by the District, or by any of its officers, employees, or agents, of articles to be supplied under this bid, and of which the respondent is not the patentee or assignee or has not the lawful right to sell same.

Insurance

The respondent shall have in force or obtain Commercial General Liability insurance, including products and completed operations coverage, with general liability limits of at least One Million (\$1,000,000) per occurrence and umbrella coverage of at least Five Million (\$5,000,000) and Automobile Liability insurance in the amount not less than Two Million Five Dollars (\$2,000,000) per occurrence. Umbrella coverage shall be follow form. Workers compensation coverage shall be state mandated limits. If a general aggregate limit is used, either the general aggregate limit shall apply separately to this contract or the general aggregate limit shall be twice the required occurrence limit. The respondent's insurance coverage shall be written on an occurrence basis.

Insurance is to be placed with insurers with a current Best Rating of A:VII unless otherwise accepted by the District.

Insurance, deductibles or self-insurance retentions shall be subject to the District's approval. Original Certificates of Insurance with endorsements shall be received and approved by District before work commences, and insurance must be in effect for the duration of the contract. The absence of insurance or a reduction of stated limits shall cause all work on the project to cease. Any delays shall not increase costs to the District or increase the duration of the project.

The District, its officers, officials, employees and volunteers are to be covered as additional insured by Endorsement CG 20 10 11 85 for Commercial General and Automobile Liability coverage.

For any claims related to this project, the respondent's insurance coverage shall be primary and any insurance or self-insurance maintained by the District, its officers, officials, employees and volunteers shall not contribute to it.

Each insurance policy required shall be endorsed that a thirty (30) day notice be given to District in the event of cancellation or modification to the stipulated insurance coverage.

In the event the respondent employs subcontractors as part of the work covered by this Agreement, it shall be the responsibility of the respondent to ensure that all subcontractors comply with the same insurance requirements that are stated in this Agreement.

Payments, Discounts, and Invoices

The payment schedule for this contract shall be 50% down, 40% upon delivery, and 10% upon completion of loading, evaluation and acceptance (approximately 30-days after delivery).

Respondent shall detail acceptance of these terms, proposed alternate, and/or any discounts offered in the bid.

In connection with any discount offered, except when provision is made for testing period preceding acceptance by the District, time will be computed from the date of delivery of the unit as specified, or from the date correct invoices are received in the office specified by the District if the latter date is later than the date of delivery.

The respondent shall submit invoices to the District for payment of goods and services rendered. Unless otherwise specified, payments will be made in accordance with District protocol. The respondent's invoice must easily match the prices listed on their bid and must include the respondent's social security number or federal tax ID.

The bids to be made are F.O.B. Bolingbrook, IL and shall be valid for ninety (90) days from after date of bid opening. No "escalator" clauses or increase in bid price shall be accepted.

No charge for delivery, drayage, express, parcel post, packing, cartage, insurance, license fees, permits, cost of bonds, or for any other purpose will be paid by the District unless expressly included and itemized in the bid.

Abandonment

Should the Bidder abandon or neglect the work, or if the District at any time is convinced that the work is unreasonably delayed, or that the conditions of the contract are being willfully violated, or executed carelessly, or in bad faith, the District may notify the Bidder in writing, and if his notification be without effect within twenty- four (24) hours after the delivery hereof, then and in that case the contractor shall discontinue all work under the contract and the District shall have full authority to make arrangements for the completion of the contract at the expense of the Bidder.

Vehicle Lifetime

Respondent shall officially state the design lifetime of the vehicle with his or her bid. This is the amount of time, from the date of delivery, which the District can reasonably expect the vehicle, with routine and proper maintenance, to perform for the community before replacement is required.

1. GENERAL SPECIFICATIONS

1.1 Scope

- 1.1.1. The intent of this specification is to describe the construction of one (1) 32-foot (approximate) long front-engine forward control “cab chassis” style truck into a Bookmobile for use by the Fountaindale Public Library (“Library”). The unit shall be built on a 26,000 lb. GVWR (maximum) chassis for adequate support of the van body, conversion, and diversified collection of approximately 3,500 items.
- 1.1.2. The vehicle described herein is intended to provide contemporary mobile library services in an operationally efficient manner. The unit will operate within a suburban environment in northeastern Illinois and shall be designed and equipped to safely operate in an environment of relatively flat, paved roadways. The unit will be kept outside the library when not in service. The approximate temperature range of this area is 30°F to 80°F, with occasional winter temperatures falling to -10°F and occasional summer temperatures reaching 100°F.
- 1.1.3. It is the Library’s utmost goal to ensure that the Bookmobile is well-equipped to operate efficiently and safely in this environment.
- 1.1.4. Weight loading shall be of significant concern during the conversion of this vehicle for efficiency reasons. Substantial effort has been put into the interior design with this factor in mind. Vendor is cautioned to use the lightest materials and construction methods available that will meet all specifications as described herein and make recommendations as appropriate for lightening the static load of the conversion.
- 1.1.5. Renewable and/or recycled materials shall be used as practical during the conversion of this vehicle.
- 1.1.6. The successful vendor shall furnish all materials not specifically denoted as “customer supplied”, as well as the labor to complete the conversion of the Bookmobile specified herein, as shown on the attached drawings, or as required to complete and/or exceed the general intent of these specifications.
- 1.1.7. These specifications have been developed by Specialty Vehicle Services, LLC. (“SVS”) under contract with the Library.
- 1.1.8. Any reference to a specific manufacturer or make or model of product not followed by "or equivalent" or "or equal" may not be substituted.

1.2. Manuals and Documentation

1.2.1. The following shall be provided for each unit at the time the equipment is delivered:

- 1.2.1.1. One (1) each technical service manual sets for the chassis, body, generator, and each component installed. Vendor shall include all manufacturer updates for the first year of service.
- 1.2.1.2. One (1) each visual parts books or one (1) CD ROM sets if books are not available for the body, chassis, and generator.
- 1.2.1.3. One (1) line set for chassis.
- 1.2.1.4. One (1) certified IL weight ticket listing front axle, rear axle and total weights.
- 1.2.1.5. Three (3) complete key sets (ignition, doors, auxiliary locks, compartments, fuel); maximum keys per set shall be five (5).
- 1.2.1.6. One (1) complete dimensional layout drawing of interior front, rear, and both sides.

1.3. New Equipment

1.3.1. Equipment shall be new (unused), and of manufacturer's current model year production and shall comply with all applicable Federal environmental, motor vehicle, and safety regulations. The conversion shall be equipped with all features and accessories considered standard for the make and model vehicle/equipment provided as well as those specifically detailed within this specification.

1.4. Quality & Standards

1.4.1. Brand names and model numbers are used throughout this document to convey desired quality levels, with the option for equivalents. The library and/or its authorized agents shall be the sole judge of whether a manufacturer's offerings are deemed equivalent for the purpose of this project.

1.4.2. Conversion accessories shall be built and assembled in accordance with the specifications and shall conform to the best standard practices in the industry at the time of construction. All dimensions, weight, and performance values shall be in accordance to SAE J732c and J742b, as last revised. The vendor

will provide all systems integration and testing. All electronics will be installed, fully operational, and tested by the vendor. The vehicle shall be equipped with all features and accessories considered standard for the make and model vehicle/equipment provided.

- 1.4.3. All equipment and construction methods shall meet all applicable regulations of the Occupational Safety and Health Act (OSHA), Federal Motor Vehicle Safety Standards (FMVSS), Department of Transportation (DOT), National Electrical Code (NEC), Federal and State noise and pollution control restrictions, and all other applicable local, state and/or federal regulations in effect at the time of execution.
- 1.4.4. All workmanship, welding, and construction shall be in the best manner of the trade. Workmanship shall be subject to inspection and approval by the Library and/or its authorized representatives.
- 1.4.5. Welding fillets shall have good penetration, good fusion, good appearance, and shall show no cracks or undercutting.

1.5. Guarantee

- 1.5.1. The successful vendor shall furnish a warranty stating that the equipment is suitable for the service intended in accordance with the specifications. The vendor shall also furnish the Library with a minimum FULL ONE (1) YEAR BUMPER-TO-BUMPER WARRANTY and shall agree to replace and install without charge, within the warranty, any defective part or parts not suitable for the service intended or found to be defective due to poor workmanship. The proposal will be weighted toward longer warranties and vendor is encouraged to offer, as an option, any available extended warranties with related literature and their costs. Warranty period shall start on the date the unit is put into service by the Library.
- 1.5.2. All warranty work shall be completed by the vendor within a reasonable time, or repaired by the vendor at the Library facility. The Library reserves the right to schedule and complete warranty work at a local facility of its choice if requests for resolution are not satisfied in a reasonable time frame. Vendor shall be given proper notice of such intent prior to execution and an invoice shall be forwarded to the vendor for payment.
- 1.5.3. That the Library may be assured of being able to maintain and repair equipment purchased, there shall be a local service facility with a stock of repair parts identified with the vendor's proposal. These specifications also require that common wear parts such as filters and hoses be available within 24 hours and all other parts within 48 hours.

- 1.5.4. Proposal shall list names, locations, and contact information for the nearest authorized service, parts, and warranty facilities. This list shall include facilities related to chassis, body, generator, conversion, etc.
- 1.5.5. All extended warranty options applicable to this vehicle and its components shall be listed within vendor's proposal with associated costs.

1.6. Inspections

- 1.6.1. The Library may make inspection visits during the vehicle conversion to help ensure specification compliance and trouble-free delivery. If the equipment/vehicle(s) is inspected after delivery and rejected because of deficiencies, it shall be the vendor's responsibility to make the necessary corrections and re-deliver the vehicle for inspection and acceptance. Payment and/or the commencement of a discount period (if applicable) will not be made until the defects are corrected.
- 1.6.2. Library will make every endeavor to note deficiencies. However, if a variation or an omission between the vehicle and the written specifications is discovered, the contract's written specifications will prevail.
- 1.6.3. Equipment/vehicle(s) may be inspected at vendor's place of business at any time during the conversion process by authorized representatives of the Library. The cost of these trips shall be the responsibility of the Library.
- 1.6.4. Equipment/vehicle(s) may be inspected at vendor's place of business at least once before delivery by an authorized representative of SVS for workmanship, appearance, proper functioning of all equipment and systems, and conformance to all other requirements of this specification. If deficiencies are detected, the vehicle will be rejected, and the vendor will be required to make the necessary repairs, adjustments, or replacements. The costs of these trip(s) shall be the responsibility of SVS.

1.6.4.1. *Dependent on the severity of inspection discrepancies and/or the vehicle is not deemed adequately complete at the time of final (pre-delivery) inspection: vendor shall be responsible for all SVS costs and fees related to a re-inspection. The Library shall have the final decision regarding the need for a re-inspection.*

1.7. Training

- 1.7.1. Vendor shall provide in service training and familiarization for operators and maintenance personnel. Training shall be conducted

by factory-trained personnel and shall be comprehensive enough to allow Library staff to operate and maintain the equipment provided with maximum safety and design efficiencies.

1.7.1.1. Training shall occur at the library at delivery and last approximately 8 hours.

2. VEHICLE SPECIFICATIONS

2.1. Intent

2.1.1. It is the intent of the following section to describe the type of vehicle that shall be used for the Bookmobile. Accessories and construction techniques not specifically mentioned herein, but necessary to furnish a complete unit ready for immediate use shall also be included.

2.2. Type

2.2.1. The cab chassis shall be a 2020 or current model year Freightliner M2 106 low-profile day cab or equivalent, equipped with a parallel hybrid driveline system, 22' long aluminum dry freight van body with 44" cab-over and "crouch type" pass-through modification. The cab chassis, body and accessories shall be built and assembled in accordance with the specifications and shall conform to the best standard practices in the industry at the time of construction.

2.3. Capacities/Dimensions

| | | |
|---------|---------------------------|--------------------------|
| 2.3.1. | Overall exterior length: | 32.0' (approximate) |
| 2.3.2. | Overall exterior width: | 102" (excluding mirrors) |
| 2.3.3. | Overall exterior height: | 12.0' (approximate) |
| 2.3.4. | Interior length: | 258" (load space) |
| 2.3.5. | Interior height: | 84" |
| 2.3.6. | Floor height from ground: | 39" |
| 2.3.7. | Interior width: | 98" |
| 2.3.8. | Wheelbase: | 238" (approximate) |
| 2.3.9. | Ground Clearance: | 12" |
| 2.3.10. | Fuel tank capacity: | 40.00 gallons |

2.3.11. GVWR: 26,000 lbs (maximum)*

*Must not exceed 26,000lbs for non-CDL operation

2.4. Cab Chassis

2.4.1. Freightliner M2 106 low profile day cab chassis with setback axle and straight truck provisions, LH primary steering location, and low-profile wheels and tires.

2.4.1.1. Chassis shall be fully capable of an approved “crouch type” pass-through conversion by the manufacturer.

2.4.2. Engine

2.4.2.1. Cummins B6.7 diesel or equivalent, 260-hp minimum with 660 lb-ft torque at 1,600 RPM.

2.4.2.2. Engine shall be capable of running on ultra-low sulfur diesel or bio-diesel fuel (B20) at user’s discretion with no modifications.

2.4.2.3. Current model year EPA emission certification

2.4.2.4. Engine after treatment device, automatic over the road regeneration and dash-mounted regeneration switch

2.4.2.5. Engine idle shutdown system

2.4.2.6. Cold starting assistance system

2.4.2.7. Electronic cruise control

2.4.2.8. Engine oil drain plug, magnetic

2.4.2.9. Engine shutdown electric, key operated

2.4.2.10. Fuel/water separator with thermostatic fuel temperature controlled electric heater and filter restriction/change indicator. Shall include equipment water-in-fuel sensor.

2.4.2.11. Air cleaner restriction indicator, air cleaner mounted

2.4.2.12. Electronic road speed governor; set to 70MPH max

2.4.2.13. Cummins or equivalent exhaust brake integral with variable geometry turbo and on/off dash switch

- 2.4.2.14. Engine oil filter, spin-on type
- 2.4.2.15. Fuel filter, spin-on type
- 2.4.2.16. Borg Warner viscous fan drive
- 2.4.2.17. Aluminum radiator; 2-row, cross flow, over under system with charge air cooler. Includes low coolant audible indicator alarm
- 2.4.2.18. Single element air cleaner
- 2.4.2.19. Starting motor without thermal over crank protection
- 2.4.2.20. Gates Blue Stripe or equivalent hoses with constant-torque stainless steel hose clamps.
- 2.4.2.21. Switchback horizontal after-treatment device, frame-mounted under cab. Shall include horizontal tailpipe exiting forward of the LH rear tire.
 - 2.4.2.21.1. Tailpipe shall be long enough to fully exit body skirting.
- 2.4.2.22. Block heater, 120VAC, 750 watt, wired to main 120V electrical system

2.4.3. Transmission and Equipment

- 2.4.3.1. Allison 2200 RDS series transmission with park pawl and PTO provision
- 2.4.3.2. 6-speed, non-fire emergency, with overdrive; preference for lower gear ratios as available
- 2.4.3.3. No retarder
- 2.4.3.4. Synthetic transmission oil
- 2.4.3.5. Transmission-mounted oil filter and magnet in oil pan
- 2.4.3.6. T-handle type shift control, dash-mounted

2.4.4. Front Axle, Suspension and Equipment

- 2.4.4.1. 10,000lb capacity minimum single front axle, non-driving
- 2.4.4.2. Taper leaf, parabolic spring front suspension, 10,000lb. minimum capacity
- 2.4.4.3. Spring pins with rubber bushings, maintenance free
- 2.4.4.4. Two (2) front shock absorbers.
- 2.4.4.5. Tilt and telescoping steering column

2.4.4.6. 2-spoke, 18" diameter, black steering wheel

2.4.4.7. Power steering gear

2.4.4.8. Synthetic front axle lube

2.4.5. Rear Axle, Suspension and equipment

2.4.5.1. Single reduction rear axle, 17,500lb. minimum capacity

2.4.5.2. Gear ratio to meet performance requirements.

2.4.5.3. Rear axle drain plug; magnetic

2.4.5.4. Freightliner AirLiner or equivalent air suspension; 18,000lb. capacity, set to "mid" ride-height, with shock absorbers

2.4.5.5. Dual air rear suspension leveling valves

2.4.5.6. Synthetic rear axle lube

2.4.5.7. Heavy-duty driveshaft

2.4.6. Brake System

2.A.1.1. Dual air system, with automatic slack adjustment, dust shields and four channel ABS, with traction control

2.A.1.2. Wabco system saver HP with integral air governor and heater

2.A.1.3. Front – Air cam S-cam, including 20 sq. in. long stroke brake chambers

2.A.1.4. Rear – Air cam S-cam, including 24/30 spring long stroke brake chambers and spring actuated parking brake

2.A.1.5. Bendix AD-9 or equivalent air dryer

2.4.7. Frame and Equipment

2.4.7.1. High strength low alloy steel frame rails (80,000 PSI yield)

2.4.7.2. Maximum OAL; for LP chassis

2.4.7.3. Rear cross member, AF

2.4.7.4. Full width aerodynamic chrome front bumper, with license plate mount

2.4.7.5. Rear tow hooks, frame-mounted

2.4.8. Fuel Tank and Equipment

- 2.4.8.1. 40-gallon, polished aluminum construction, LH mount
- 2.4.8.2. Polished step finish, LH and RH mount
- 2.4.8.3. Fuel filter/water separator with temperature controlled electric heater and filter restriction/change indicator
- 2.4.8.4. Reinforced nylon fuel hose throughout
- 2.4.8.5. DEF tank, frame mounted, 6-gallon, LH mount flush to back of cab

2.4.9. Front Tires, Hubs & Wheels

- 2.4.9.1. Two (2) 19.5" polished aluminum, 8-stud, hub-piloted, flanged nut, metric mount, 7.50DC rims
- 2.4.9.2. Two (2) low-profile 245/70R19.5 steering tread, 16 ply radial tires
- 2.4.9.3. Oil-lubricated wheel bearings and seals.
- 2.4.9.4. 50W synthetic front lube oil

2.4.10. Rear Tires, Hubs & Wheels

- 2.4.10.1. 19.5" polished aluminum outer wheels and 7.50DC rim and steel inner wheel with 6.75DC rim, 8-stud, hub-piloted, flanged nut, metric mount.
- 2.4.10.2. Four (4) low-profile 245/70R19.5, mud and snow tread, 16-ply radial tires
- 2.4.10.3. Oil lubricated rear seals and wheel bearings.

2.4.11. Spare Tire

- 2.4.11.1. One (1) 19.5" steel rim with mounted 245/70R19.5 steer tire. Ship loose with completed vehicle.

2.4.12. Electrical System

- 2.4.12.1. 12-volt, negative grounded
- 2.4.12.2. 240A minimum, self-excited, pad mounted alternator
- 2.4.12.3. Two (2) maintenance free 12-volt batteries, 1300 CCA approximate
- 2.4.12.4. Battery box, steel with aluminum cover, easily serviceable
- 2.4.12.5. Data link connector for vehicle programming and diagnostics in cab

- 2.4.12.6. SAE blade type electrical fuses
- 2.4.12.7. Headlight dimmer switch integral with turn signal switch
- 2.4.12.8. Single electric horn
- 2.4.12.9. Air horn, single trumpet, air solenoid operated, mounted below cab
- 2.4.12.10. Master battery shutoff switch mounted outside battery box
- 2.4.12.11. Parking light integral with front turn signal and rear tail light
- 2.4.12.12. LED headlights, composite aero design for two-light system, including daytime running lights, with chrome bezel
- 2.4.12.13. Electric starter switch, key-operated
- 2.4.12.14. LED chassis lighting to meet FMVSS regulations
- 2.4.12.15. Five (5) amber LED lights mounted on sun visor
- 2.4.12.16. Dome light, door activated with timed dimming
- 2.4.12.17. Self-cancelling turn signal switch with headlight dimmer
- 2.4.12.18. 2-speed windshield wiper switch with wash and intermittent feature, integral to turn signal switch
- 2.4.12.19. Single motor windshield wipers, cowl mounted
- 2.4.12.20. One (1) 12V power receptacle
- 2.4.12.21. Back up alarm, auto-adjusting electric, 102 dBA
- 2.4.12.22. Body builder wiring, including sealed connectors for tail, turn, backup, accessory power, and ground
- 2.4.12.23. Manual reset SAE type III circuit breakers with trip indicators
- 2.4.12.24. Chassis wiring shall be color coded and continuously numbered

2.4.13. Cab Exterior

- 2.4.13.1. Day cab
- 2.4.13.2. Chrome grill
- 2.4.13.3. Under hood insulation for sound abatement

- 2.4.13.4. Splash panel insulation for sound abatement
- 2.4.13.5. Fiberglass, tilting front end, with 3-piece construction
- 2.4.13.6. Dual, motorized, heated, side-mounted, West-Coast style chrome finish rearview mirrors with integral convex spot mirrors and LED clearance lights
- 2.4.13.7. Auxiliary 7.5" sq. (approx.) hood-mounted cross view convex mirror, right hand side
- 2.4.13.8. Composite exterior sun visor
- 2.4.13.9. Tinted door glass LH & RH
- 2.4.13.10. Tinted windshield
- 2.4.13.11. Eight (8) liter windshield washer reservoir
- 2.4.13.12. Air-ride cab suspension
- 2.4.13.13. Fog lights, mounted in front bumper, with dash-mounted switch and indicator light
- 2.4.13.14. Heated windshield

2.4.14. Cab Interior

- 2.4.14.1. Deluxe interior trim package.
- 2.4.14.2. Two (2) molded armrests, on each door
- 2.4.14.3. "A" pillar molded plastic cover
- 2.4.14.4. Interior grab handles, pillar mounted, one each side
- 2.4.14.5. Interior trim panels, molded plastic, full height; all interior sheet metal covered
- 2.4.14.6. Overhead console with dual storage pockets and retainer nets
- 2.4.14.7. Interior door trim panels, molded plastic, driver and passenger doors
- 2.4.14.8. Driver door storage pocket, full length
- 2.4.14.9. Cloth headliner
- 2.4.14.10. Rubber floor covering with insulation
- 2.4.14.11. Instrument panel trim, woodgrain finish with center section
- 2.4.14.12. Two (2) cup holders shall be provided
- 2.4.14.13. Two (2) padded vinyl sun visors, integral to console

- 2.4.14.14. Interior color scheme; gray
- 2.4.14.15. Air conditioning with integral heater and defroster, HFC-134A hydrofluorocarbon refrigerant
- 2.4.14.16. Triangular reflectors without flares
- 2.4.14.17. 5lb. ABC fire extinguisher with mount
- 2.4.14.18. Premium high-back air-ride driver seat, with integral headrest, 2-position front cushion adjustment, seat back adjustment, arm rest and single chamber air lumbar support
- 2.4.14.19. High-back single person passenger seat, with integral headrest, seat back adjustment and arm rest
- 2.4.14.20. Both seats to include 3-point, lap and shoulder type seatbelts
- 2.4.14.21. Power window and door locks
- 2.4.15. Instruments and Controls
 - 2.4.15.1. Key switch ignition keyed alike to cab door locks (with 2 sets of keys)
 - 2.4.15.2. Gauge cluster (English)
 - 2.4.15.3. Electronic speedometer
 - 2.4.15.4. Electronic engine oil pressure
 - 2.4.15.5. Electronic water temperature
 - 2.4.15.6. Electronic fuel
 - 2.4.15.7. Electronic tachometer
 - 2.4.15.8. Voltmeter
 - 2.4.15.9. Odometer display; miles, trip miles, engine hours, trip hours, fault code readout
 - 2.4.15.10. Warning system; low fuel, low oil pressure, high engine coolant temperature, low battery voltage
 - 2.4.15.11. Allison transmission oil temperature gauge
 - 2.4.15.12. Air cleaner restriction indicator, with black bezel mounted in instrument panel.
 - 2.4.15.13. DEF fluid level gauge.
 - 2.4.15.14. On-board diagnostics display of fault coded in gauge cluster

2.4.15.15. Meritor WABCO OnGuardACTIVE collision mitigation system

2.4.15.16. OnLane lane departure warning system

2.4.15.17. AM/FM/WB radio with auxiliary input, and Bluetooth capabilities

2.4.15.17.1. Radio shall include two (2) deluxe commercial quality coaxial radio speakers in the cab.

2.4.16. Color

2.4.16.1. Cab color: White

2.4.16.2. Base coat/clear coat type, 1 tone

2.5. Hybrid Driveline

2.5.1. An Odyne plug-in parallel hybrid system shall be added to the chassis to assist with vehicle launch. System shall connect to the chassis driveline via the PTO only and include, at a minimum, the following components.

2.5.1.1. 0hp Remy motor (110hp peak), to provide launch assist and regenerative braking features

2.5.1.2. .2 kWh Johnson Controls, 300V, maintenance free lithium-ion battery pack, mounted LH side of frame rails

2.5.1.2.1. Charge time shall be 4 hours with 220V/30A (level 2) supply

2.5.1.2.2. Battery warranty shall be a minimum of 4 calendar years

2.5.1.3. SAE J1772 charging cord, with cord receptacle mounted LH side in easily accessible location

2.5.1.4. Exportable power via liquid-cooled inverter assembly (for conversion accessories), 120VAC, 8.0KW minimum and 12VDC, 100A minimum

2.5.1.5. Dash-mounted LCD driver display screen

2.5.1.6. System installation shall be fully completed by Odyne Systems, LLC in Pewaukee WI

2.5.1.7. Reference: www.odyne.com

2.6. Body

2.6.1. 22' trade length aluminum dry freight truck body, 102" exterior width with 84" interior height and 44" forward "cab-over" section.

2.6.2. Body shall be connected to the cab rear wall with a weatherproof boot, to allow "crouching" height pass-through capabilities

2.6.2.1. Crouch-through transition boot shall allow cab to "float" on its air-ride suspension

2.6.3. 3/4" (minimum) exterior plywood or approved equivalent floor

2.6.4. No wheel wells; flat floor.

2.6.4.1. Long sill height shall be selected to provide minimum allowable manufacturer specified "jounce" dimension over rear tires.

2.6.4.2. Floor height must not be more than 39" maximum height measured from ground.

2.6.5. 3" (maximum) I-beam cross-members; 12" OC

2.6.5.1. Spacing exception may be allowed over the rear wheels if necessary, to obtain required floor height. Heavy gauge plate steel is one exception in these areas.

2.6.6. 1/2" core FRP front wall or approved equivalent

2.6.7. Chrome plated composite corner

2.6.8. Side wall Z-posts; 16" OC

2.6.9. .040" (minimum) pre-painted aluminum side sheeting

2.6.10. .090" (minimum) aluminum side deep skirting

2.6.11. Skirting shall be full perimeter of body, with 12" minimum ground clearance

2.6.12. One-piece .032" (minimum) aluminum roof

2.6.13. Anti-sag galvanized roof bows; 16" OC

2.6.14. Roof reinforcement for A/C units

2.6.15. FMVSS 108 lights and reflectors, LED at all locations

2.6.15.1. Rear lighting shall be flush-mounted below floor line, in the aluminum skirting.

- 2.6.16. Painted stainless steel rear structure
- 2.6.17. Rear mud flaps; no logos or advertising
- 2.6.18. Two (2) 32" x 80" (approximate) passenger side "sedan type" mid entry (patron) doors placed per drawings. Door shall be of double-wall commercial quality aluminum construction and internally insulated between inner and outer skins.
 - 2.6.18.1. Step wells shall be a three-step configuration with 10" - 12" deep treads and 7" - 9" high risers. Each step shall incorporate heavy-duty, slip resistant commercial rubber step tread reinforced with aluminum back. The front edge of each tread shall incorporate a 2" safety yellow or white edge. Step wells shall contain 12VDC LED lighting to assist with entry/egress.
 - 2.6.18.2. Doors shall have dark tinted safety glass upper horizontal ½ sliding window with fiberglass screen and dark tinted safety lower fixed-pane window.
 - 2.6.18.3. Doors shall utilize continuous stainless steel, aluminum or similar non-corrosive type vertically-mounted, recess-mounted hinges, adequately sized for the anticipated weight and duty cycle of this door.
 - 2.6.18.4. Doors shall include an exterior stainless-steel or aluminum drip rail mounted above the door.
- 2.6.19. One (1) of 42" x 79" (minimum width) single door mounted off-center on the rear wall per drawings. Door shall be of double-wall commercial quality aluminum construction and internally insulated between inner and outer skins.
 - 2.6.19.1. Door shall be set at floor height (no step well).
 - 2.6.19.2. Door shall have one (1) 34"W x 20"T (minimum) fixed radius window, high-mounted, dark tinted.
 - 2.6.19.2.1. This window shall allow viewing of the rear-facing information monitor (reference 3.3.6).
 - 2.6.19.3. Door shall utilize stainless steel, aluminum or similar non-corrosive type vertically-mounted hinges, adequately sized for the anticipated weight and duty cycle of these doors.

- 2.6.19.4. Doors shall include an exterior stainless-steel or aluminum drip rail mounted above the door.

3. CONVERSION SPECIFICATIONS

3.1. Exterior

3.1.1. The 32" patron doors shall be configured with the following:

3.1.1.1. Doors shall be fitted with one (1) Yale 5800 series or equivalent door closer each to control the movement of the door.

3.1.1.1.1. Closer shall include a "hold-open" feature

3.1.1.2. Doors shall be equipped with one (1) heavy-duty, cast aluminum, positive hold-open device. Device shall be attached to the vehicle in a manner consistent with the intended use and lifetime of the vehicle.

3.1.1.3. Door interiors shall be finished to compliment interior and include an interior pull handle to assist in closing the door.

3.1.1.4. One (1) Yale push-bar "classroom" or equivalent entrance latch shall be installed on each door, keyed alike.

3.1.1.5. One (1) Yale 112 series or equivalent heavy-duty "deadbolt" latch shall be installed, in addition to the main latch, on each door, keyed alike to the latches.

3.1.1.6. Door/step well area shall be outfitted with a total of four (4) 1.25" diameter stainless steel handrails each to provide solid entry/egress assistance.

3.1.1.6.1. One (1) 36" approximate length handrail shall be installed vertically on the exterior, just aft of the door.

3.1.1.6.2. Two (2) angle-mounted handrails shall be installed one each side of the step well.

3.1.1.6.3. One (1) angle-mounted handrail shall be installed to the interior of the door below the upper window.

3.1.1.7. One (1) electric-operated, single auxiliary step or approved equal shall be installed beneath each of

these step wells. Steps shall be finished with a non-skid surface. Steps shall include a dash-mounted switch.

- 3.1.1.7.1. Height of deployed step shall be consistent with the overall staircase run - for smooth patron entry/egress.
- 3.1.1.7.2. Height of retracted steps shall impede clearance requirements of section 2.3.9.
- 3.1.1.7.3. Step shall be finished with a non-skid surface and a safety yellow, non-skid front strip.
- 3.1.1.7.4. Step shall include an audible/visual indicator system to warn the driver that the step is extended when the ignition key is activated.

3.1.2. The 42" rear wheelchair door shall be configured with the following:

- 3.1.2.1. Door shall be equipped with one (1) heavy-duty, cast aluminum, positive hold-open device.
- 3.1.2.2. Door interior shall be finished to compliment interior.
- 3.1.2.3. One (1) standard entrance latch with interior handle shall be installed.
- 3.1.2.4. One (1) Yale 112 series or equivalent heavy-duty "deadbolt" latch shall be installed, in addition to the main latch, keyed alike to patron doors.

3.1.3. Three (3) 14"x22" single dome translucent white acrylic skylights shall be installed with white PVC interior trim.

- 3.1.3.1. Skylights and installation shall be consistent with the intended lifecycle of this vehicle and be warranted against leaking for a minimum of 5 years.

3.1.4. Two (2) storage compartments shall be installed. Compartments shall be of maximum size available and located based on final design.

- 3.1.4.1. These compartments shall be installed fully beneath the floor (no interior protrusion).
- 3.1.4.2. This compartment shall be sealed to prevent moisture penetration.
- 3.1.4.3. Compartment shall be constructed of aluminum or equivalent materials.

- 3.1.4.4. Door(s) shall be constructed of aluminum and vertically hinged with ¼" pin stainless steel continuous hinges.
- 3.1.4.5. Door(s) shall have positive "compression" style, "slam latch", or equivalent locking latches
- 3.1.5. Vehicle underbody shall be fully undercoated with rubberized spray to provide additional sound resonance dampening and underbody insulation protection.
- 3.1.6. Two (2) 26"T x 24"W (approximate) half-slide windows with screens shall be installed in the side wall as depicted in the concept drawing(s).
 - 3.1.6.1. Windows shall be dark tinted.
 - 3.1.6.2. All glass furnished shall be automotive approved safety type. All glass shall be safety glazed and meet DOT GMVSS 205, SAE recommended practice J673b and J674a, and ANSI "Safety Code for Safety Glazing Materials" Z26.1-1977 as supplemented by Z26.1a-1980.
- 3.1.7. One (1) recessed monitor compartment shall be installed curbside to house the exterior 75" monitor. Compartment shall include a back panel for monitor mounting, and a 72"W x 50"H (approximate) top-hinged door that acts as a sun and weather shield when open.
 - 3.1.7.1. Compartment shall be constructed of aluminum or equivalent materials.
 - 3.1.7.2. Compartment shall have space and provisions below the screen for powering and connecting a video game console to the screen.
 - 3.1.7.3. Back panel shall be colored black for improved screen visibility.
 - 3.1.7.4. Door shall be constructed of aluminum and horizontally hinged with ¼" pin stainless steel continuous hinge.
 - 3.1.7.5. Door shall have positive "compression" style, "slam latch", or equivalent latches
 - 3.1.7.6. Door shall have pneumatic lift assist struts with mechanical locks to support the door horizontally when open.
 - 3.1.7.7. Door shall have a nylon pull strap attached to assist in reaching the door for closing.

3.1.8. Compartments, doors and appropriate added components shall be finished to match the body exterior.

3.1.8.1. Additionally, where the vehicle is cut or modified, or additional fabricated components are added to the exterior, exposed metal shall be properly prepared and painted to match vehicle exterior color.

3.1.8.2. Panels shall be properly cleaned and prepared for paint application in accordance with standard commercial practice and to requirements of the construction materials involved. Surfaces shall be properly cleaned and inspected before cover materials are applied.

3.1.8.3. The prepared surfaces shall be spray primed with synthetic base primer, which contains corrosion resistant pigments and resins. Extra coats shall be applied around moisture catching moldings, etc. All hidden areas such as overlapping metal, underside of moldings, underside or rubber extrusions at windows shall be cleaned and primed and where necessary and caulked with sealing compound during construction.

3.1.8.4. DuPont or equivalent paint shall be applied to all areas of the metal. Each coat shall be properly dried and evenly sanded before the following coat is applied. "Orange peel" surfacing will not be acceptable.

3.1.9. Vehicle shall have a "heavy" level (approximately 50% coverage) vinyl graphics package applied to the exterior. Vendor shall indicate organization or persons that the Library will work with in the development of this graphics scheme.

3.1.9.1. Vendor shall include a **\$12,000 allowance** for the development, printing and installation of this graphics package within their bid.

3.1.9.2. The Library reserves the right to increase the complexity of the graphics package at their expense based on final development.

3.2. Interior

3.2.1. The Bookmobile interior shall be designed to accommodate a collection of approximately 3,500 items, which includes but is not limited to: books of various sizes, DVDs, CDs, oversized materials of odd shapes, magazines, etc.

- 3.2.2. Since a bookmobile is a mobile library, and a quiet environment is most important in the successful operation of any library, all interior finishes shall contribute to absorbing ambient sounds. Appropriate panels, ceiling and flooring shall have superior acoustic qualities in addition to durability and aesthetics. Sound control measures shall comply with the Occupational Safety and Health Act (OSHA) sound level (dbA) requirement in effect at time of award of contract, for an eight (8) hour maximum operator exposure time; measured at operator's ear with engine at governed RPM.
- 3.2.3. Completed unit shall utilize environmentally conscious "green" elements wherever practical, including, but not limited to: energy efficient technologies, and recycled and/or sustainable construction materials.
- 3.2.4. Weight loading shall be of significant concern during the conversion of this vehicle for efficiency reasons. Substantial effort has been put into the interior design with this factor in mind. Vendor is cautioned to use the lightest materials available that will meet all specifications as described herein and make recommendations as appropriate for lightening the static load of the conversion.
- 3.2.5. Vehicle ceiling, walls, wheel wells (if applicable) and underbody shall be insulated with 1.5" (minimum) nominal thickness (3" nominal thickness underbody) sprayed-in urethane foam insulation or approved equivalent.
 - 3.2.5.1. Underbody foam insulation shall be protected from road spray and elements by an additional layer of rubberized automotive undercoating.
 - 3.2.5.2. Foam shall be compliant with all applicable FMVSS regulations including flammability.
- 3.2.6. Floor covering shall be Lonseal Loncoin II or equivalent commercial grade vinyl flooring.
 - 3.2.6.1. Covering shall have a 10-year minimum wear warranty.
 - 3.2.6.2. Sub-flooring shall be properly prepared prior to installation of the floor covering.
 - 3.2.6.3. Flooring shall be installed in a manner consistent with the manufacturer's recommendations.
 - 3.2.6.4. Any flooring remnants remaining from the carpet installation shall be shipped loose with the completed vehicle.

- 3.2.6.5. The library will select the exact color and pattern of vinyl from vendor's selections based on other interior color choices.
- 3.2.7. Two (2) 84" x 36" (approx.) commercial carpet runners shall be provided and shipped loose with the completed vehicle.
 - 3.2.7.1. Runner finish shall be selected by the library from manufacturer's standard selections.
- 3.2.8. Vehicle interior walls shall be finished with easily removable panels installed between shelving uprights to provide a pleasing, flexible and durable finish.
 - 3.2.8.1. The panels shall be fabric covered cork panels, appropriately trimmed to compliment the interior and allow for flexible display areas when shelving is removed. The finish of these fabric covered cork panels shall be chosen by the Library from manufacturer's standard selections.
 - 3.2.8.2. All removable panels shall finish to a depth equivalent to the mounting face of the shelving uprights, providing a recessed, "built-in" appearance to the entire system.
- 3.2.9. Ceiling shall be finished with eco-friendly, soft, sound absorbent materials chosen by the Library from manufacturer's selections.
- 3.2.10. Fabric covered cork bulletin boards and whiteboards shall be installed wherever possible in the vehicle, including, but not limited to, all overhead cabinet doors.

Number and size of bulletin boards and whiteboards furnished shall be determined by the exact configuration of interior. Bulletin and whiteboards shall be as large as possible and installed where space is available inside the coach. Smaller spaces and trim areas shall be finished in complimenting materials. All upholstery used within the vehicle shall meet provisions of FMVSS-302
- 3.2.11. One lockable, sliding door shall be fabricated and installed to separate the rear cabin from the cab at the staff's discretion. Door shall utilize heavy-duty hardware and be finished in materials to compliment the interior.
 - 3.2.11.1. Hardware shall include provisions for positively latching the door in the both the open and closed positions.

- 3.2.12. The cab-over area of the body shall be configured with mechanical items located over the driver's seat and general staff storage over the passenger seat.
 - 3.2.12.1. A raised "keeper" edge shall be installed to help keep items from falling into the walkway.
- 3.2.13. One (1) high quality, adjustable height rolling task chair with arms shall be supplied for the front station.
 - 3.2.13.1. Chair shall compliment the overall interior, with fabric color chosen by the Library from the manufacturer's standard selections.
 - 3.2.13.2. Chair shall include a method to secure it during transit.
- 3.2.14. One (1) adjustable height, small scale chair shall be supplied for the rear station, for use as with both a stand-up and sit-down work surface height.
 - 3.2.14.1. Chair shall compliment the overall interior, with fabric color chosen by the Library from the manufacturer's standard selections.
 - 3.2.14.2. Chair shall include a method to secure it during transit.
- 3.2.15. One (1) fixed staff desk shall be furnished and installed per finalized plans. Desk shall be constructed of furniture grade plywood or equivalent. Work surface shall be finished with high-impact laminate or equivalent materials. Surface shall be bonded to a substrate, and assembly installed to allow easy removal and replacement as these surfaces experience excessive wear and tear.
 - 3.2.15.1. Desk shall be appropriately configured for installation of technologies by the Library, including cable pass-through grommets and defined wire paths from desktop to other locations as designated.
 - 3.2.15.2. Desk shall have a finished height of 30".
 - 3.2.15.3. Desk shall have 14" flip-up extension per preliminary drawings.
 - 3.2.15.3.1. Extension shall utilize extra heavy-duty hardware for support and include provisions for securing it when in the relaxed (down) position.

- 3.2.15.4. Desk shall include a three-drawer cabinet and a pencil drawer below the work surface. Drawers shall include a positive latching mechanism.
 - 3.2.15.5. Desk shall include a pencil drawer below the work surface. Drawer shall include a positive latching mechanism.
 - 3.2.15.6. One (1) drop-in flush-mounted, removable cup holder shall be installed in the desk surfaces.
 - 3.2.15.7. The finalized design and placement of the desk shall be approved by the Library prior to fabrication and installation.
- 3.2.16. An Acore Shelving & Products, Inc. aluminum shelving system or equivalent shall be supplied and installed. Shelving components shall be powder coated after assembly where possible using coatings containing no lead or lead products. All components shall be constructed from superior grade lightweight materials and be built to withstand the unique stresses imposed by a mobile environment. The shelving layout shall be designed to accommodate approximately 3,000 items, which includes but is not limited to: books of various sizes, DVDs, CDs, videos, books on CD, oversized materials of odd shapes, magazines, etc. All shelving running along the sidewalls of the vehicle shall tilt back 15 degrees. Shelving is anticipated to be primarily of 7" depth, with additional components described herein.
- 3.2.16.1. The completed modular shelving system shall include the following components:
 - 3.2.16.1.1. Sixteen (16) one-piece aluminum slotted shelving uprights.
 - 3.2.16.1.1.1. Uprights shall be secured to sidewalls in a manner consistent with the anticipated stresses that will be imposed and expected lifecycle of this vehicle.
 - 3.2.16.1.1.2. Uprights shall be properly installed per manufacturer's instruction, including but not limited to ensuring centerlines are accurate (36" +/- 1/16" typical), uprights are plumb, and lateral alignment is true the entire length of each section.
 - 3.2.16.1.2. Forty-two (42) 7" deep wall shelves with integral 15° slope. Lengths to be determined by

finalized upright positions, but should be set at 36" wherever feasible, with a maximum length variation of two (2) for interchangeability.

- 3.2.16.1.3. Four (4) face-out book bins, for use on within the main shelving areas.
- 3.2.16.1.4. Seven (7) 7" deep wall shelves with integral 20° slope, for use on the rear wall of the vehicle.
- 3.2.16.1.5. Twelve (12) 36" wall hugger, single-sided book trucks with 3 shelves each.
 - 3.2.16.1.5.1. Four (4) face-out book bins, sized for use on the carts.
- 3.2.16.1.6. One (1) 36" enclosed book return truck, with face-mounted book return slot, locking access doors, and solid top.
 - 3.2.16.1.6.1. Top shall be finished with the same high-impact material as the work surfaces.
 - 3.2.16.1.6.2. Interior shall contain a foam pad in the bottom to protect materials from excessive damage.
- 3.2.16.1.7. Seven (7) wall hugger security devices, for locking the on-board book (and book return) trucks into the upright system.
- 3.2.16.2. Two (2) removable patron work surface modules shall be fabricated and provided. Surfaces shall utilize Acore support brackets and be finished with the same high-impact material as the staff work surfaces.
- 3.2.16.3. Five (5) bench seat modules shall be fabricated and provided with the completed vehicle.
 - 3.2.16.3.1. Seats shall include a minimum 2" thickness of foam, covered with durable fabric.
 - 3.2.16.3.2. Fabric shall be selected by the Library from manufacturer's selections.
 - 3.2.16.3.3. Seat modules shall mount to the shelving uprights using heavy-duty brackets designed for this purpose.
- 3.2.16.4. One (1) modular staff workstation shall be fabricated and installed in the rear per finalized plans.

Workstation shall be designed to last the lifetime of the vehicle but constructed of lightweight materials for ease of adjustment. Work surface shall be finished in high-impact laminate or equivalent.

- 3.2.16.4.1. Workstation shall be appropriately configured for installation of technologies by the Library, including cable pass-through grommets and defined wire paths from desktop to other locations as designated.
- 3.2.16.4.2. Workstation shall utilize the wall-mounted Acore uprights and appropriate brackets for main support, but also include an inboard mounted adjustable height support leg to allow staff adjustable height.
- 3.2.16.4.3. Workstation shall include a lightweight positive latch pencil drawer mounted beneath the work surface.
- 3.2.16.4.4. One (1) drop-in flush-mounted, removable cup holder shall be installed in the work surface.
- 3.2.16.4.5. Surface shall mount to the shelving uprights using heavy-duty brackets designed for this purpose.
- 3.2.16.4.6. The finalized design shall be approved by the Library prior to fabrication and installation.
- 3.2.16.5. Two (2) modular overhead storage cabinets shall be provided as depicted in the preliminary drawing(s).
 - 3.2.16.5.1. Cabinets shall include lockable, top hinged bulletin board type doors, with mechanical stays, per final design.
 - 3.2.16.5.2. Cabinets shall include one (1) interior adjustable shelf and cable grommets in the base panel for future wiring.
 - 3.2.16.5.3. Cabinets shall have a lower, open shelf for placement of printers and other peripherals. These shelves shall contain cable grommets for easy technology connection.
 - 3.2.16.5.4. Cabinets shall mount to the shelving uprights using heavy-duty brackets designed for this purpose.

- 3.2.16.6. Vehicle shall be configured as depicted in the finalized drawing upon delivery. Any remaining components (extras) of this system shall be shipped loose with each vehicle.
- 3.2.16.7. System shall include shelf label color strips, colors to be determined.
- 3.2.16.8. System shall be powder coated for maximum durability; color to be chosen by the Library from vendor's standard color selections.
- 3.2.16.9. Final configuration and colors of the interior shelving and cabinetry shall be subject to approval of the Library prior to installation.
- 3.2.16.10. Finish, cabinetry and shelving installation shall provide an approximate 76" aisle width.
- 3.2.16.11. Final configuration of the interior shelving and cabinetry shall be subject to approval of the Library prior to installation.

3.3. Electrical System – AC

- 3.3.1. System shall be a 120/240-volt rated, single-phase type system designed to provide and distribute electrical power at a level of performance that meets the requirements of all components and/or accessories utilizing such power throughout the vehicle.
 - 3.3.1.1. System furnished shall be designed and installed to meet all requirements of the National Electrical Code (NEC), with all system components, accessories, plugs, receptacles, switches and circuit breakers being Underwriter's Laboratories (UL) listed and approved.
 - 3.3.1.2. System furnished shall also meet any and all applicable state code requirements and regulations pertaining to the design and installation of AC electrical systems.
- 3.3.2. All AC wiring shall be installed using multi-stranded, multi-conductor flexible armored, THHN (in non-metallic conduit), or boat rated cable; 600 volt rated, UL approved or equivalent. All wire shall be color-coded and grounded throughout the system. Aluminum wire is not acceptable due to its history of involvement in electrical system fires. Since the body and chassis of a motor vehicle is constantly flexing in torsion when in use, fixed type conduit is not acceptable due to the long-term potential electrical shorting and the resulting potential of fire hazard.

- 3.3.2.1. Wiring and harnesses shall be installed in easily accessible locations to aid long-term serviceability and maintain a minimum 2" air-insulated clearance from parallel low-voltage wiring harnesses per NEMA standards.
- 3.3.2.2. All wiring shall be sized using NEMA ratings to 125% of anticipated load.
- 3.3.3. All 120/240VAC power shall be obtained from the Odyne hybrid system export power feature.
- 3.3.4. A minimum of ten (10) 15A-rated, UL listed, NEMA 5-15, three-hole grounded duplex receptacles shall be furnished inside the vehicle for general and specific uses. Inverter backed receptacles shall have an orange face for ease of identification.
 - 3.3.4.1. One (1) receptacle shall be weatherproof and installed on the curbside exterior for use under the awning.
- 3.3.5. Two (2) 13,500 BTU low-profile air conditioner shall be installed per drawings.
 - 3.3.5.1. Units shall provide 13,500 BTUs of cooling each.
 - 3.3.5.2. Units shall include self-contained, low-profile ceiling assembly with remote controls.
 - 3.3.5.3. Units shall stand a maximum of 10" above the roof and be included in the overall height measurement (reference 2.3.3).
 - 3.3.5.4. Units shall include a low-profile branch deflection system, to prevent small branches from becoming lodged below the forward AC cover.
- 3.3.6. One (1) SunBrite Veranda Series 75" black outdoor full shade 4K ultra HDTV-SB- 7574UHD-BL or equivalent full shade readable high-resolution LCD monitor shall be installed inside the passenger side exterior monitor compartment (reference 3.1.7).
 - 3.3.6.1. Unit shall be shock-mounted, but easily removable for service and/or replacement.
 - 3.3.6.2. Unit shall feature 3840 x 2160 screen resolution, and a 16:9 widescreen display.
 - 3.3.6.3. Unit shall be capable of playing content via USB device.
 - 3.3.6.4. Installation shall include the professional mounting and connection of a customer-supplied Chromebox.

- 3.3.6.5. Installation shall include one (1) HDMI cable from the front staff desk and one (1) HDMI cable from the game connection plate mounted below the screen in the exterior box.
- 3.3.6.6. One (1) Bose Solo 5 or equivalent sound bar shall be provided and mounted below the screen.
- 3.3.7. One (1) 32" high-resolution monitor shall be installed on a drop-down ceiling mount above the wheelchair lift.
 - 3.3.7.1. Installation shall include the professional mounting and connection of a customer-supplied Chromebox.
 - 3.3.7.2. Installation shall include one (1) HDMI cable run from the front workstation.
 - 3.3.7.3. Interior installation shall include a MORryde TV1-080H or equivalent drop-down TV ceiling mount.
 - 3.3.7.4. Exterior installation shall include a non-corrosive quick-release mount located per preliminary drawings.

3.4. Electrical System – DC/Other

- 3.4.1. Shall be a 12-volt, negative ground type system designed to provide and distribute electrical power at a level of performance that meets the requirements of all components and/or accessories utilizing such power throughout the vehicle.
- 3.4.2. Design emphasis of system furnished shall be on both reliability and serviceability. System furnished shall be a modular type design, modular being defined as a system where major power train, chassis, body component assemblies, including lighting, wiring and switch harnesses, and heater harnesses are easily separable for purposes of repair or replacement, using either simple hand tool or automotive type plug-in connectors. Special emphasis shall be made on accessibility to all wiring harnesses in all locations. Wiring shall not be rendered un-accessible behind permanently installed panels or appointments.
- 3.4.3. The power source for all body electrical equipment furnished shall be taken from a single point on the power train specifically designed for this purpose.
- 3.4.4. The main ground wire grounding the body to the chassis shall be minimum 8- gauge size; all ground wires furnished for insulated-return type systems shall be equal in size to the feed wire in the respective circuit. Redundant grounds shall be used if required to attain a satisfactory level of system performance desired. For

maximum system reliability, all serrated eyelets and screws or bolts utilized at points of ground shall be either coated or plated with an electrical conductive type material to improve their resistance to corrosion.

- 3.4.5. All electromagnetic type switches, relays and solenoids furnished shall be suppressed to protect the entire electrical system from major damage from the large negative voltage spikes these devices can produce.
- 3.4.6. All auxiliary electrical circuits shall be safety protected from current overloading by automatic resetting type heavy-duty automotive circuit breakers, each properly capacity sized to the circuit they serve. A master circuit breaker, minimum 150-amp shall also be furnished.
- 3.4.7. All terminals and connectors furnished shall be designed and approved by their manufacturer for heavy-duty automotive vocational application; material shall be a corrosion-resistant type. To eliminate disconnects; all terminals furnished shall incorporate a positive locking, seated type design to assure terminal position. Socket (female side of connectors shall be wired to electrical source side of circuit and plug (male) side of connector shall be wired to electrical load side of the circuit to help prevent a short circuit when disconnected. All connections made on the vehicle underbody shall be adequately protected against moisture and corrosion with dielectric grease, heat shrink tubing, or other similar techniques.
- 3.4.8. All insulated cable furnished shall comply with SAE Standards J1127 and J1128. All wiring furnished in the engine compartment area, where extreme heat and fire are of concern, shall be multi-stranded, low-voltage insulated automotive type cross-linked polyethylene fire-retardant SAE approved SXL type. All wiring furnished in the body portion of the coach shall be multi-stranded, low-voltage insulated automotive type; either SAE approved SXL or GXL types are acceptable. All wiring in each circuit shall be of sufficient size, and with 125% capacity rating of anticipated load to transmit the electrical current load of the circuit. Sizing shall take into account the length of the circuit and the voltage drop occurring in the circuit. Voltage at the load shall be +/- 5% of rated voltage when measured in a normal operating state.
- 3.4.9. All wiring shall be routed meeting the following minimum requirements:
 - 3.4.9.1. No contact with sharp or puncturing edges.
 - 3.4.9.2. No tension or strain between fixed points.

- 3.4.9.3. Adequate and safe clearance of moving parts.
- 3.4.9.4. 5-inch clearance from radiant heat sources.
- 3.4.9.5. Adequately secured to prevent pinching.
- 3.4.9.6. Wiring to be color-coded and numbered, grease-, oil- and moisture-resistant and securely fastened.
- 3.4.10. All wiring furnished shall be routed in protective harnesses, either woven vinyl or corrugated vinyl or nylon types acceptable. When harnesses go through metal structure, rubber grommets shall be used to further protect the integrity of the harnesses.
- 3.4.11. All auxiliary (conversion) 12VDC power shall be obtained from the Odyne hybrid power system.
- 3.4.12. A 12VDC, LED main cabin lighting system shall be installed to provide interior lighting meeting library minimum stack ratings.
 - 3.4.12.1. Lighting fixtures shall be alternately configured on two (2) switches to allow a “zig-zag” lighting option at the user’s discretion.
 - 3.4.12.2. Lighting level should be 6 foot-candles (ft-c) minimum measured on the stack face (vertically) at a height of 12", and 35 ft-c maximum at any height to achieve no more than a 6-to-1 maximum-to-minimum ratio across the entire stack face.
 - 3.4.12.3. Light output temperature shall be a “warm” white between 4400K – 5300K.
 - 3.4.12.4. Lighting system design shall be approved by the Library prior to installation.
- 3.4.13. LED stepwell lighting (12VDC) shall be provided at the side entry.
 - 3.4.13.1. Shall be wired to operate in conjunction with the condition of the door.
- 3.4.14. Four (4) Whelen 600 series or equivalent, LED weatherproof “scene” lights shall be installed; two (2) on the exterior curbside, and two (2) on the exterior rear.
 - 3.4.14.1. Lights shall be switched in the driver’s area.
 - 3.4.14.2. Rear mounted lights shall also be engaged by putting the vehicle in reverse.

- 3.4.15. Six (6) 12VDC receptacles with standard and USB charge ports shall be installed.
 - 3.4.15.1. Receptacles shall be independently fused and powered by the hybrid battery.
 - 3.4.15.2. Locations shall be chosen during the pre-build engineering phase.
- 3.4.16. One (1) Braun, Ricon or equivalent, in-body hydraulic wheelchair lift shall be installed inside the rear doors per manufacturer specification.
 - 3.4.16.1. Lift shall have a 33"W x 51"L (approximate) platform.
 - 3.4.16.2. Lift shall have an 800 lb. (approximate) lifting capacity.
 - 3.4.16.3. Installation shall include all vehicle interlocks and safety systems offered by the manufacturer and have a manual backup system.
 - 3.4.16.4. System and installation shall adhere to ADA and FMVSS regulations.
- 3.4.17. Two (2) Fantastic Vent 6000RBTA or equivalent, 3-speed, reversible roof vents shall be installed. Vents shall include thermostatic control, automatic opening dome, and automatic rain sensors.
- 3.4.18. Two (2) Espar AIRTRONIC D5 or equivalent diesel fueled air heaters shall be installed below floor to heat the main interior cabin. Heating system shall include integrated ducting and rotatable/closable vents to help ensure even distribution of the heat and further ensure that the areas beneath the staff desks are not cold.
 - 3.4.18.1. Units shall produce 16,400 btu/hr each at 275 cfm.
 - 3.4.18.2. Units shall vent combustion air to the exterior of the body.
 - 3.4.18.3. Heating output shall be integrated throughout the interior for even heating in two (2) zones per finalized design.
 - 3.4.18.4. Units shall be controlled by the central thermostat.
 - 3.4.18.5. Units shall be fueled from the main vehicle diesel fuel tank.
 - 3.4.18.6. System shall be installed in compliance with ANSI A-119.2 and NFPA regulations.

- 3.4.19. One (1) Duo Therm Comfort Control Center 2 or equivalent, thermostat shall be installed near the front desk. Unit shall utilize a series of advanced heat sensing devices to track temperatures and activate heat or air conditioning as needed to maintain selected temperature.
 - 3.4.19.1. Unit shall be a full digital system creating two (2) zones from one centralized location.
 - 3.4.19.2. Unit shall utilize a LCD readout and Intellisist technology to allow easy setting changes.
 - 3.4.19.3. Unit shall interconnect with the hybrid power system to provide "HVAC request" auto start signal.
 - 3.4.19.4. Unit shall be mounted near the front workstation.
- 3.4.20. One (1) twenty foot (20') long Dometic 9100 Weatherpro or equivalent 12VDC power awning shall be installed on the curbside of the vehicle.
 - 3.4.20.1. Awning shall include a wind sensor to close the awning when it detects high sustained winds.
 - 3.4.20.2. Awning shall include a knee action design to allow flex in moderate wind and automatically release any accumulated water away from the door.
 - 3.4.20.3. Awning shall include a hard-wired switch mounted high inside the main patron door, as well as a hand-held wireless remote control.
 - 3.4.20.4. Color of awning shall be chosen post-award by the Library from manufacturer's standard selections.
- 3.4.21. One (1) AM/FM/CD/Bluetooth stereo with auxiliary input and wireless microphone system shall be installed near the staff work station.
 - 3.4.21.1. System shall include four (4) high-quality interior speakers mounted in the ceiling and two (2) performance quality, flush-mounted exterior speakers mounted on the curbside.
 - 3.4.21.2. System shall include three (3) wireless microphones and a mixer to integrate the exterior speakers with the music from the stereo.
 - 3.4.21.2.1. Dependent on component selection, secondary amplifier may be necessary for the exterior speakers.

- 3.4.21.3. Final design of this audio system shall be approved by the Library prior to installation.
- 3.4.22. One (1) parking sensor system with 4 front and 4 rear in-bumper sensors shall be installed. System shall detect obstacles using ultrasonic wave (sonar) echolocation technology, and include a wired LED digital display with audible alert mounted in the dash area.
- 3.4.23. Two (2) Elmech Q-scan Uniplex, or equivalent, people counters shall be installed; one (1) in each doorway.
 - 3.4.23.1. Systems shall include magnetically activated, 4-digit 12mm high LED displays.
 - 3.4.23.2. Systems shall count each person crossing the beam, regardless of the direction of approach.
 - 3.4.23.3. Systems shall include non-volatile memories to protect against power failure.
 - 3.4.23.4. Reference: <http://www.q-scan.co.uk/uniplex.htm>
- 3.4.24. One (1) rear view, color LCD system shall be installed. System shall include all components necessary for the intended application and be wired with all features enabled.
 - 3.4.24.1. Shall include one (1) 7 inch (minimum) LCD color monitor mounted on (or in) the dash for easy view of the driver.
 - 3.4.24.2. Shall include one (1) video camera with sun shields and built-in microphone mounted to rear exterior. Shall have a vibration and shock resistant mounting, waterproof, and a minimum viewing angle of 114 degrees horizontal and 90 degrees vertical.
 - 3.4.24.3. Shall include two (2) additional side-view cameras, to monitor both driver and passenger sides of the vehicle during transit.
- 3.4.25. One (1) Aqualarm 20446 or equivalent 12VDC powered security system with cell and email alert shall be installed. System shall include the following features:
 - 3.4.25.1. Keypad activation/deactivation.
 - 3.4.25.2. IR remote
 - 3.4.25.3. Motion detector
 - 3.4.25.4. Door contacts for all doors

- 3.4.25.5. One (1) Aqualarm 20421 solar powered exterior siren/strobe light.
- 3.4.26. One (1) Cradlepoint IBR1100 series or equivalent, wireless LTE advanced ruggedized modem shall be provided.
 - 3.4.26.1. Modem shall be powered by the 12VDC system and connect to the front and rear desk areas via CAT6, 10/100 Mbps RJ-45 cabling.
 - 3.4.26.2. Modem shall support LTE advanced with SIM-based auto-carrier selection, and have the ability to easily add a second modem at a later time to increase bandwidth as necessary
 - 3.4.26.3. Modem shall include 802.11 a/b/g/n/ac WiFi to provide a hotspot in and around the vehicle.
 - 3.4.26.4. Modem shall include the ability to configure a virtual private network (VPN).
 - 3.4.26.5. Modem shall include one (1) Cradlepoint 170654-000 or equivalent 5-in- 1 GPS, modem & WiFi antenna, mounted to the exterior roof of the vehicle.
 - 3.4.26.6. Installation shall include a second Cradlepoint 170653-000 or equivalent 3-in-1 modem antenna, for addition of second modem at a later time.
 - 3.4.26.7. Modem(s) will be connected to the Verizon service network.
 - 3.4.26.8. Unit shall be installed in the cab-over mechanical area.
- 3.4.27. One (1) Cobra CDR895 D or equivalent, dual channel dash camera shall be supplied and installed.
 - 3.4.27.1. Camera shall feature a 160-degree wide angle front lens, a 130-degree rear-view lens, a 2" LCD screen, parking mode (automatic record with motion detection), lane departure warning system, 16GB microSD card, and 12V power adaptor.

3.5. Miscellaneous Components

- 3.5.1. One (1) SkyScan or equivalent atomic clock shall be furnished, with a minimum 2-inch main character size. Unit shall include readouts

for interior and exterior temperature (via wireless remote sensor), day and date, and receive its synchronization signal from NIST.

- 3.5.2. One (1) battery-operated Carbon Monoxide (CO) detector shall be installed on the interior ceiling.
- 3.5.3. One (1) battery-operated smoke detector shall be installed on the interior ceiling.
- 3.5.4. Two (2) 5 lb. ABC fire extinguishers shall be installed in the interior, one front and one rear.
- 3.5.5. One (1) IL State DOT approved first aid kit shall be supplied and installed within the completed vehicle.
- 3.5.6. One (1) set of three (3) red emergency reflective triangles with dedicated ABS plastic enclosure shall be provided and installed.

4. OPTIONAL ITEMS (please quote these items separately)

4.1. Extended Warranties

- 4.1.1. Please detail all extended warranties available for the chassis and/or conversion, including pricing and full text of inclusions/exclusions (reference 1.5.1).

4.2. Full Standing Height Cab Walk-through

- 4.2.1. Increase headroom in the cab walk-through modification (reference 2.6.2) by cutting away an approximate 24" deep (minimum) by 24" wide (minimum) section of the roof of the truck cab to create headroom into the cabover area of the body.

- 4.2.1.1. The full-height walk-through must utilize a flexible gasket between the truck cab and body (rear wall and roof) for a weatherproof seal that can accommodate the cab air-ride suspension.

- 4.2.1.2. Walk-through modification shall be fully warranted against leaks for a minimum of 10 years and fully structurally approved by the chassis manufacturer.

- 4.2.2.

4.3. Additional Book Carts

- 4.3.1. One (1) Acore or equivalent 36" wall hugger, single-sided book truck with 3 shelves each. Please quote price per each.

4.4. Solar Panel System

- 4.4.1. One (1) AM Solar SunRunner or equivalent, solar panel system shall be provided and installed.
 - 4.4.1.1. System shall include two (2) GO160 solar panels, one (1) SunRunner Gold 30MPPT/8 system core, and one (1) roof C-box.
 - 4.4.1.1.1. Controller interface shall be mounted in the kick-over mechanical area.
 - 4.4.1.2. System shall charge both the main and auxiliary battery banks with a potential total of 320 watts.
 - 4.4.1.3. The design of this system is subject to approval by the Library prior to installation.

4.5. Video Surveillance System

- 4.5.1. One (1) Safety Vision or equivalent video surveillance, GPS and remote monitoring system shall be installed with all triggers/features connected. System shall be mounted in a location out of general view, but still readily accessible for staff. System shall include, but not be limited to the following components. Additional accessories (cables, power/sensor harness, antennas, interconnects, etc.) may be necessary to fulfill the general intent of the system, and vendors are urged to consult with system manufacturer to complete system operability.
 - 4.5.1.1. One (1) Safety Vision Observer 4112 HVR, with 12 camera capability, integrated Wi-Fi and external Wi-Fi capability. SD card storage for mirror recording. Recorder must have eight (8) threaded aviation style camera inputs. Molex & BNC style camera inputs are not acceptable.
 - 4.5.1.2. One (1) Safety Vision 4112-1TB HDD hard drive, 1TB SATA, for DVR.
 - 4.5.1.3. 3-Axis accelerometer embedded in the recorder.
 - 4.5.1.4. One (1) Safety Vision 41-GPS antenna w/ 16' cable.
 - 4.5.1.5. One (1) Safety Vision 4108-USB hard drive reader cable.

- 4.5.1.6. One (1) Safety Vision 41-PANIC, panic button/event marker mounted near the front staff workstation in an easy to reach, but out of direct view location.
- 4.5.1.7. One (1) Safety Vision AHD-2.8MIR-WT, Hi-Definition dome camera, mounted high in the vehicle cab area.
- 4.5.1.8. One (1) Safety Vision AHD-2.8MIR-WT, Hi-Definition dome camera, mounted above the sliding door in the main cabin area, facing the rear.
- 4.5.1.9. One (1) Safety Vision SV-EXTCAM-WHITE, side mount camera, for exterior right (curb side) application. Must automatically trigger from the vehicle's right turn signal.
- 4.5.1.10. One (1) Safety Vision SV-630A-KIT, box camera, mounted on the exterior rear, for back-up/rear vision application. This camera must show as a reverse image, and automatically trigger from the vehicle's reverse circuit, for rear view requirements
- 4.5.1.11. One (1) Safety Vision SV-CP4-HYB-KIT, 7" touch screen monitor w/ direct connect to recorder. Monitor must allow single/dual/quad view, with ability to display up to nine cameras at the same time. Monitor shall be mounted in the cab to act as a back-up (and general) monitor, and include full screen reverse gear (automatic), turn signal (automatic) and manual activation. Additional panic button integrated into monitor. Monitor must allow viewing of all four (4) cameras at user discretion.

Reference:

<http://www.safetyvision.com/products/observer-4112-hvr>

Contract

Contractor must accept contract as written if the contractor is chosen as the successful bidder.

Additional Required Documents

Contractor must complete in full and submit the following documents with the signed bid. Failure to submit or properly complete any of the documents can cause the bid to be incomplete. Incomplete bids may disqualify the respondent from consideration by the District in awarding the Contract.

- Additional Insured Endorsement
- Anti-Collusion Affidavit of Compliance
- Contractor And Subcontractor Substance Abuse Prevention Policy
- Contractor's Certification
- Contractor's Drug-Free Workplace Certification
- Fair Employment Practices Affidavit of Compliance
- Indemnification Form