**INTRODUCTION:**
This specification contains items that would be specifically installed on 6,000 GVWR and larger cab and chassis. They are dump bodies, flat beds, service bodies, hitches, hydraulics, options (Tool Boxes, Racks, Bins, etc.) and MnDOT Custom Bodies.

Contract vendor shall meet all current Federal and Minnesota motor vehicle codes which shall include but not limited to a seven light package on rear of vehicle bodies exceeding 80” wide. Current FMVSS/CMVSS 108 applicable requirements can be found at [http://www.nhtsa.dot.gov](http://www.nhtsa.dot.gov)

There are separate pricing pages for each of these items. This is a multiple award price agreement contract. The State reserves the right to issue multiple awards to more than one responder.

**1.0 General Specifications for all bodies:**
1.1 Bodies must be “factory built” by a body manufacturer and not “custom built” by an Upfitter, the only exception to this specification is the bodies listed as “MnDOT Custom Bodies”.
1.2 Installation of all truck bodies shall have proper spacing and/or separation between the vehicle exhaust and body. Contract vendor shall consider but not limited to the material in which the body is composed of, engine type, make & model of vehicle.
1.3 All lighting to be L.E.D.
1.4 All prices must include installation. Installation shall include labor, shop supplies and needed hardware to accomplish complete installation.
1.5 When FMVSS 108 lighting package and ICC bumper under ride protection and mud flaps is not a part of the body component (flatbed, van body, etc.), these items shall be listed separately on pricing page.
1.6 The Contract Vendor shall furnish a standard manufacturer’s warranty. The vendor shall be responsible for the cost of any inspections, adjustments, parts and labor charges that are a result of equipment failure(s) during the warranty period. This shall be performed without any delay. This warranty shall commence when the unit is put into service. The responder shall state warranty for all items requested on the pricing page.
1.7 If the completed truck is required to pass a Commercial Vehicle Inspection (CVI) a licensed MnDOT commercial vehicle inspector will inspect it before payment will be made. If the licensed inspector cannot pass the equipment the vendor will be contacted to pick up the equipment and make necessary repairs so the equipment will pass a CVI. The vendor will then return equipment in a condition that will pass a Commercial Vehicle Inspection. The pickup, delivery and repairs or modifications to the equipment shall be at the vendor’s expanse.

**2.0 UTILITY/SERVICE BODY REQUIREMENTS:**
2.1 Utility/service bodies can be constructed out of fiberglass, steel or aluminum and shall be intended for 6,000 GVWR and larger cab & chassis.
2.2 Responders are reminded to include utility bodies that have reinforcements intended for use with a crane.
2.3 Installation of body shall meet FVMSS 108 and ICC bumper standards.

**3.0 VAN BODY REQUIREMENTS:**
3.1 Van bodies shall be for 6,000 GVWR and larger cab & chassis. Larger van bodies for straight frame air brake cab and chassis will be accepted.
SPECIFICATION: Truck Bodies

4.0 FLAT BED REQUIREMENTS:
4.1 Flatbeds shall be intended for 6,000 GVWR and larger cab & chassis.
4.2 Pricing page shall include bulkheads, stake racks, non-skid paint and other options normally requested.
4.3 Hydraulic hoists shall be listed in the Hydraulic section/Price Page, not in this section.

5.0 DUMP BODY REQUIREMENTS:
5.1 Dump body shall be intended for 26,000 lb. GVWR and smaller cab & chassis.
5.2 Hydraulic hoists shall be listed in the Hydraulic section/Price Page, not in this section.
5.3 Bids not offering a complete line of dump body variations may be rejected. Be complete and offer enough variations to cover most government requests.

6.0 HITCH REQUIREMENTS:
6.1 Hitches shall be for 6,000 GVWR and larger cab & chassis.
6.2 Hitches can be custom built or “Factory manufactured” hitches.
6.3 Custom built hitches shall include cost of installation and wiring in price of hitch.
6.4 Pintle hitch, Brake controllers, wiring and other hitch associated items shall be listed separately in this section.

7.0 HYDRAULIC AND CONTROL REQUIREMENTS:
7.1 Hydraulic hoists shall be included in this section.
7.2 Vendors shall list various hydraulic valves and controls for hoists, front plows, sanders, cranes, tools, hose reels, etc. in this section.
7.3 Hydraulic reservoirs and fluids shall be included in this section.
7.4 Responders are required to offer enough hydraulic valves and controls/options to operate the various combinations of components. Responders who do not offer these options will have their bid rejected.
7.5 All Hose ends to be Swivel Type Hose Ends.

8.0 Options:
8.1 The purpose of this section is to provide options to complete the build of the bodies being offered on this contract.
8.2 Examples of items offered in this section are Racks, Bins, Lighting, Toolboxes, Back-up Camera’s/Alarms, Hose Reels, etc..
8.3 Items like Cranes, Aerials/bucket Lifts, Air Compressors, Air/Hydraulic Tools, and hitches are not to be offered in this section.

MnDOT CUSTOM BODIES

This specification contains descriptions of custom steel and aluminum fabricated truck bodies used on sign, guardrail, and other trucks. Only vendors that offer one or more of the following bodies may include Hydraulic post pounders, post pullers and chipping hammers as options on pricing pages. Prices should be for body and installation of body on a cab and chassis only. Cab/chassis and cranes/compressors will be purchased separately and are not a part of this price agreement contract. Bodies must meet applicable codes and standards. The welds on the outside of the bodies should be ground and any holes or divots left after grinding should be filled to provide a smooth finished surface. Any place a hand or other body part that normally could come in contact with a metal edge, that the metal edge shall be ground so there is no sharp edge that could cut skin.
1.0 BODY VERSION 1, FOR A 35000# GVW TRUCK, WITH 124”- 134” CA AND A 40” OPENING BEHIND THE CAB FOR A CRANE AND COMPRESSOR.

1.1 The body shall be approximately 144” long, 96” wide, with various compartments as per drawings numbered 1.

1.2 The body shall be of the flatbed type with cabinets designed and fabricated in accordance with good engineering practices.

1.3 The flatbed shall have long sills manufactured from 8” structural steel channel, 8.2 lbs. per foot, minimum with cross sills manufactured from 4” structural steel channel, 5.4 lbs. per foot minimum spaced on 12” centers or better, at least every other cross sill shall be gusseted to a long sill. Top surface shall be 3/16” tread plate steel with anti skid black paint coating.

1.4 Base flatbed unit shall be dipped or approved equal with rust preventive coatings such as zinc phosphate.

1.5 The body compartments shall be manufactured of 14 gauge 2 sided galvanneal steel or greater and have drip rail over the door.

1.6 All body compartment doors shall be double 20 ga. galvanneal steel or greater, formed with hat channel reinforcement. All body compartment doors shall use stainless steel hinges and hardware. The doors shall be weather tight and use bulb type weather-stripping. Side opening cabinet doors shall have spring loaded hold open mechanism. Handles shall be “D” or “T” style that latch at top and bottom of the door with locks keyed alike.

1.7 The sign compartments shall have a nylon type sign storage slide material with 1” spacing between signs, 1/4” gap for sign storage and ¾” thick, mounted top and bottom or back and bottom as indicated in specification or drawing.

1.8 The two cabinet/drawer units located under bed behind back wheels shall be enclosed in a weather proof cabinet with American Eagle brand or equal two drawer unit inside on the Street Side side and a three drawer unit on the passenger side. The drawer unit shall have “egg crate” type dividers. There shall be one (1) on the streetside rear with access to the rear and one (1) mounted curbside rear with access to curb side of truck. Weather proof cabinet door shall have the hinge towards the outside edge of bed. The curb side box shall have the door swing open to the front.

1.9 At back of body there shall be a wrap around 3/16” steel tread plate skirting extending down to step bumper. Step bumper shall be 18” deep with galvenealed grip strut material on the surface.

1.10 The sign post storage area shall have a floor manufactured of 3/16” steel plate or greater. The sign post dividers shall be manufactured of formed 10 gauge steel or greater for extra strength. Each sign post compartment shall have a 3/16” or greater plate steel bulk head welded in place. Welding of dividers, bulk heads, flooring shall be continuous or substantial enough so that sign posts do not break welds during the life of the body. Sign post storage bottom shall have clean out holes at the head of the compartment. Sign post storage shall include a latchable drop down door made of 1/8” steel tread plate material or greater.

1.11 There shall be sign post assembly brackets incorporated into the rear bumper. This bracket shall have a steel backing to allow the signs to be assembled to the same length. Bracket shall be made of 2” square tubing minimum with 2 1/2” opening as shown in drawings.

1.12 There shall be an expanded metal or punched plate basket mounted above the curbside and streetside compartments 8” high 20” wide. The street side shall be 120” long and the curb side shall be 90” long. The basket shall be manufactured from 3/4”, #9 flat expanded steel or punch panel and have reinforced edges, sides and bottom. Unit shall be spaced above flooring with minimum of 4 ea tubular steel or approved equal spacers.

1.13 Cargo area of bed shall have 2 ea. full length E-Track with 2 ea. tie down strap. Both on curbside cabinet back side per Mn/DOT approval.

1.14 Front Below deck tool boxes shall be Protech or Mn/Dot approved equal with the box made of 5252 1/8” thick aluminum or greater and the door made of 14 gauge thick, #7 polish stainless steel or greater. Hinges and hardware shall be stainless steel with “D” or “T” style handle that latches with rods at two points. Tool box shall be lockable keyed to match body compartments. Handle style to be Mn/DOT approved. On below deck boxes doors shall open to 90° and have chain stops on each side of the door. Tool boxes shall be mounted with clean out space on top of tool box.

1.15 There shall be a 2” receiver hitch reinforced to the frame with hinged safety chain “D” rings and a 7 prong trailer socket and a pintle/ball combo shall be supplied for receiver hitch. Trailer plug in shall be mounted into sign post assemble bracket so it is protected from being knocked off. Installation shall include supplying electric brake controller, cab mounted.
1.16 The body shall have FMVSS108 L.E.D. lighting, shock mounted, recessed in rub rail and anti-sail, anti-splatter H.D. rubber mud flaps on front and rear side of tire. Rear bumper shall be ICC approved.

1.17 See drawings Titled number 1 body for more information, bid shall include all items shown on drawings.

1.18 Unit shall be painted black, lead free paint, appearance shall have uniform and satisfactory hiding power, color, gloss and smoothness.

1.19 The center cabinet at tail shelf shall have single door which opens to the left.

1.20 In dead space in front of sign post storage area on curb side fabricate and install curbside door with dividers which divide the space into 5 equal compartments and is 54" long x 28" deep with 180° flop down door with handle that latches at both ends (not shown on drawing). It uses the space in front of the curbside sign posts.

1.21 Fabricate and install a pull out curbside ladder per MN/DOT approved location. Additionally vendor shall install a grab handle in passenger side above deck rear compartment on inside of cabinet at top, per Mn/DOT approval for use with pull out ladder.

1.22 At rear, top of deck, passenger side cabinet there shall be a welding gas cylinder compartment with a hose reel with 50’ of twin welding hose supplied and installed. Compartment shall have clamps and brackets for welding cylinder located at cabinet wall closest to back of vehicle. Hose reel shall be mounted to top inside of cabinet. Top of cabinet shall be reinforced.

1.23 Install a 3/4” x 50’ air hose and reel craft, 83500LT or equal spring rewind hose reel on rear passenger side of deck, spaced off deck for clean out. Additionally in same area, except mounted on back side of cabinet above 3/4” hose reel there shall be a 3/8” x 50’ reel craft (6Z160) air hose reel plumbed into air system with shut off valve. The back wall of the cabinet is to be reinforced to accommodate hose reel mounting. Each hose reel shall have a in line air dryer and oiler after the shutoff and before the hose reel.

1.24 There shall be an auger bit storage box installed at front of bed between streetside tool box and curbside front compartment that is made of 10 gauge steel with formed edge at the top, that is approximately 20 wide.

1.25 Body shall have a handrail grab handle on rear of body, passenger and driver side with a grip strut step at tail shelf on both sides. Driver side cabinet stated in 1.8 can protrude into tail shelf. The top of cabinet can be used for driver side step with grip strut material installed on top of cabinet.

1.26 Body shall include a storage rack for MN/DOT supplied auger head installed on deck at rear of bed per Mn/DOT approved. Storage rack collar shall be large enough diameter to avoid damaging auger bearings.

1.27 Front of body large sign storage compartment shall have a hold in place adjustable mechanism that is heavy duty and padded to protect signs from wear with thickness adjustments and storage holder for arm when loading signs.

1.28 Tail shelf back side shall include two strobe lights anti-shock mounted flush with interior guards. Additionally there shall be two strobes mounted, one on each side of tail shelf per Mn/DOT approval anti-shock mounted flush with interior guards. Strobes shall be Whelen 502000AU, amber non LED strobes. Switches shall be cab mounted. Strobes shall be on separate switches (side, rear and front).

1.29 There shall be two Whelen MC9MED2A, two lamp safety lights mounted on pedestals at front of body, or on cab roof via cab roof mounts, on one driver side and one on passenger side. Pedestal height to be Mn/DOT approved. Switches shall be cab mounted. Power pack shall be ISP 188 12 volt for all strobe lights. Wiring shall be TPR cable, loomed, Deutsch connection.

1.30 Above street side shovel basket there shall be an extension ladder bracket fabricated which is mounted so it is spaced away and allows access to shovel basket.

1.31 Body shall include a post pounder bracket and post puller bracket, shipped loose.

1.32 Body shall include a passenger and driver side outrigger pad holder and pads. Passenger side shall have 2 Nylon pads and holders while driver side is one 24” x 24” Nylon pad and holder.

1.33 Pricing page contains optional items for custom truck body version 1, responders are encouraged to provide price for these items.

Optional Equipment for #1 body

1.34 An Option to 1.8 is the curb side cabinet to be the same as the Street Side and facing the rear
instead of the side.

1.35 An optional replacement for the Whelen Strobes is in 1.29 is Whelen L32HAF or Mn/Dot approved equivalent for the front of the body for the 360 degree lighting. Optional lights for 1.28 are ether Whelen 2FA00ZAR or 2EA00ZAR LED Warning lights for wide angle or narrow beam lighting.

2.0 BODY VERSION 2 for a 31,000-35,000 LB GVW Truck with Approximately 120” CA & a 36” opening behind the cab for a crane and air compressor

2.1 Body shall be approximately 12’ long, 96” wide, made of aluminum. With various compartments as per drawing number 2

2.2 Understructure shall be made of ¼ thick or better aluminum 4” to 6” formed “C” Channel long sills and 3/16 thick or better I Beams cross sills placed 12” apart, gusseted every other member or better

2.3 Floor shall be made of 3/16 thick aluminum tread plate

2.4 cabinets and compartments shall be made of 1/8 thick aluminum treadbrite material, welds shall be continuous.

2.5 cabinet doors shall be made of 1/8 thick aluminum treadbrite material, with structurally formal edges and weather tight bulb type rubber gasket seals.

2.6 Cabinet door hinges and fasteners shall be stainless steel and be weather tight.

2.7 Cabinet doors that are slide opening shall have spring loaded hold open mechanism. Cabinet door handles shall be “D” style that latch via rods at both ends. All door locks keyed alike.

2.8 Rear apron shall be closed, manufactured of 3/16 aluminum

2.9 At rear there shall be aluminum grip strut steps installed to access cargo bed area. There shall be two grab handles installed also. Location of steps and handles to be Mn/Dot approved.

2.10 Passenger side of truck shall have storage cabinets as shown on drawings labeled #2 with nylon plastic sign material as per drawings

2.11 At the rear of bed. Behind passenger side storage cabinet, there shall be a crane reinforcement plate that is 20” x 26” x ¼” with continuous welds on all sides. Additionally crane reinforcement plate shall be reinforced into deck body and cab and chassis frame rails.

2.12 The contract vendor shall supply and install a hose reel that is 50’ long by ¾ ID hose with spring rewind feature. Air dryer and Oiler shall also be included in the system. The dryer shall have a hose that will drain the dryer that leads to the outside below the body.

2.13 Driver side shall have three 18” tall x 48” long, 18” deep aluminum toolbox. Door shall be Polished S.S. hinged at bottom, Opening 180 degrees. Box shall be .125 thick aluminum. Door shall be .10 thick minimum. Hinges shall be stainless steel . Box shall be mounted to deck with 1” clean out space underneath. Spacers to be of a non-rusting material.

2.14 Under deck, front of deck, driver and curb side shall have a toolbox that meets requirements of specification 9.13 and is 24” tall x 42” long x 24” deep with door stops at 90 degree position. Mounting shall be such that top of toolbox can easily be cleaned off. Pad holder bracket with nylon pads installed under toolbox.

2.15 Under deck, rear of deck, driver and curb side shall have a toolbox that meets requirements of specification 9.13 and is 24” tall x 42” long x 24” deep with door stops at 90 degree position. Mounting shall be such that top of toolbox can easily be cleaned off. Two American Eagle drawer units installed.

2.16 At front of body there shall be a 30” high 3/16 steel treadplate bulkhead with reinforced top edge. Additional there shall be two Whelen MC9MED2A lights with ISP188 powerpack, mounted on Pedestals at front of body, one on driver side with pedestal coming off bulkhead and one on passenger side on top of high cabinet. Customer shall approve mounting and pedestal heights.

2.17 There shall be a grab handle rail installed on back of deck 24” in from driver side and a step installed at tail shelf. Step shall be made of grip strut mounted per customer approval.

2.18 Bumper shall include a 10 gauge sign post holder per drawing and a 12” tail shelf with grip strut step material on top of tail shelf. Tail shelf shall be ICC bumper requirement. Switches shall be cab mounted. Strobes shall be Whelen 500 series, LED amber with 5A housing or equal and tow same rear side mounted for a total of four.

2.19 Unit Shall include FMVSS108 lighting that is shock mounted, recessed. All wiring shall be loomed and protected, all connections coated with dielectric material and heat shrunk.

2.20 Contract vendor shall provide and install H.D. rubber anti-sail mud flaps I front of and on the
2.21 At the front and rear of body on passenger side there shall be two Betts model 305 flood/spot work lights installed per customer approved location.

3.0 BODY VERSION 3, FOR A TANDEM AXLE, 56,000 GVW TRUCK WITH 136” & 141” CT AND 53” OPENING BEHIND THE CAB FOR CRANE AND COMPRESSOR

3.1 Body shall be approximately 15’ long by 96” wide with various compartments as shown on drawings numbered 3.

3.2 The body shall be flatbed type with cabinet designed and fabricated per specification and mounted to flatbed with a clean out space between cabinet/tool box and flatbed, which are mounted either above or below flatbed.

3.3 Flatbed shall have long sills manufactured from 8” structural steel channel, 8.2 lbs. per foot minimum, with cross sills manufactured from 6” structural steel channel, 5.2 lbs. per foot minimum spaced on 12” centers, at least every other cross sill shall be gusseted to long sills. Top surface shall be 3/16” diamond tread plate painted with anti skid paint.

3.4 Base flatbed unit shall be dipped or approved equal with rust preventive coatings such as zinc phosphate.

3.5 Body cabinets/compartments shall be manufactured of 14 gauge 2 sided galvanneal steel or greater and have a drip rail above the doors. Top of cabinet shall be wrap around 3/16” tread plate steel.

3.6 All compartment doors shall be a minimum of 18 gauge galvanneal steel outer door panel and a 20 gauge inner door panel formed with hat channel reinforcement. All hardware and latches shall be S.S. Hinges shall be full length S.S. hinges. Doors shall be weather tight and use bulb type weather stripping. Handles shall be “D” style with latching rods at top and bottom of doors or at both ends if door is horizontal. All doors shall have locks, keyed alike.

3.7 Streetside #1 cabinet shall be approximately 36” wide x 66” tall x 28” deep, mounted with bottom of cabinet below the flatbed for storing oxygen and acetylene tanks. Cabinet shall have two overlapping vertically hinged doors. Cabinet shall include four ratchet straps and bottom of welding tank hold mechanism for securing 4 each welding tanks. Cabinet flooring shall be reinforced for welding tanks. Bottom of cabinet shall have outrigger pad holder on it. Doors shall have spring loaded hold open mechanism. Cabinet shall be vented on inside of bed as well as on door side. On the upper cabinet wall towards the rear of the truck there shall be 2 swivel J hooks.

3.8 Streetside #2 cabinet shall be approximately 48” wide x 36” tall x 28” deep. This cabinet shall include Reelcraft TW7450 OLP oxygen/acytylene hose reel or equal with 50’ of 1/4” hose, a Reelcraft 83050 OLP hose reel or equal with 50’ of ¼” airline, and a Reelcraft L5550 123/3 cord reel with 12 gauge 50’ electric cord and a TW745 single receptacle. This cabinet should be vented. Hose reels shall be mounted on bottom of cabinet. Door shall be one piece, hinged at top with gas hold open shocks on both sides and a nylon pull down handle mounted on inside of cabinet door.

3.9 Streetside #3 top and bottom and streetside #4 top and bottom shall be approximately 48” wide x 18” high x 28” deep with 4 each drop down doors with chain stops that prevent doors from opening just short of 180° point and hitting truck body. The top cabinets shall face the inside of the bed while the lower cabinets face outward. There shall be no divider between streetside #3, bottom compartment and streetside #4 bottom compartment while there shall be a divider between #3 and #4 top compartments. Both streetside #3 and #4, top compartments shall have a 12 gauge or better shelving installed at ¼ way point with front and rear “U” shaped lip that prevents sagging. On back side of driver side cabinets there shall be two rows of E-tracks installed and two tie straps supplied.

3.10 Streetside #5 shall be approximately 30” wide x 26” tall x “28” deep and be accessed from tail shelf. Door shall be hinged on driver side. This cabinet shall contain a pull-out drawer approximately 12” tall with front to rear center divider at 1/3 / 2/3 point. Drawer shall be installed on a 600 lb. grant slides minimum. On top of pull out drawer there shall be a lipped fixed shelf made of 12 gauge material or greater.

3.11 Curb side cabinets shall be identical in outside dimensions to streetside cabinets with the exception of curbside cabinet #1, it shall not extend below the flatbed, that space is reserved for a 40 gallon minimum hydraulic oil reservoir and an outrigger pad holder. The tops of all curbside
and streetside cabinets shall be level with each other including curbside to streetside. Also Curbside #4 upper and lower shall be 36 inches wide.

3.12 Curbside #1 shall have a shelf that is lipped and adjustable. Shelf shall be reinforced so it does not sag. Door shall have a spring over center hold open mechanism. Cabinet shall be vented for gas operated tools. This compartment shall have the breakers for the 110 volt lights and the generator remote controls both mounted below the shelf.

3.13 Curbside #2 shall have the same stuff in it as streetside #2. (see drawing for placement). There shall be a inline are dryer for the air hoses with drain hoses going through the bottom of the cabinet and the deck below.

3.14 There shall be no divider between curbside #3 and #4 top compartments. There shall be a divider between curbside #3 and #4 bottom compartments. Additionally there shall be no shelf at ¾ way point. Curb side #4 compartment, top and bottom shall be 36” long. In curbside # 3 compartment shall be 2 American Eagle (or approved equivalent) with 2 drawers in each section. Each drawer shall be 2” depth from top to bottom. Each drawer shall have moveable dividers. On back side of (rear of truck) there shall be a cabinet #6 that is 12” deep by 36” high and 28” wide with vertical right hinged door with spring loaded hold open mechanism. Interior of cabinet shall have heavy duty chain hooks installed, two on each side wall and 6 on rear wall. Hook shall be installed near the top of cabinet.

3.15 Curbside #5 shall have door hinged on passenger side as well as open to rear of truck like streetside #5. Additionally it shall contain pull out drawer as stated in specification 3.10.

3.16 Rear apron shall be closed, manufactured of 3/16: Diamond Tread plate with 14” deep winged left and right bumper tail shelf that is open in the middle for trailer hitch. Tail shelf shall be galvannealed grip strut material.

3.17 Rear apron shall include Holland Ph400 air operated pintle hitch with safety chain hinged “D” rings, Berg 7 prong trailer socket, and glad hands air brake connector. Air brakes connection shall be located close to pintle hitch but out of way of trailer tongue swing. Additionally, there shall be an electric brake socket at rear with cab mounted electric brake controller supplied.

3.18 At rear apron there shall be the following: 36” wide by 12” deep step just below possum belly compartment. Step shall be made of galvannealed grip strut with square tubing frame work. In middle and on back side of step a vise plate receiver shall be installed. 2 ea 24” long grab handle shall be mounted on inside edge of above deck rear cabinets, one on each side.

3.19 At rear apron there shall be a possum belly compartment with two pull out drawers on roller system, one on each side and a center compartment that is 66” deep for 5’ pry bars. Pull out drawers shall be 36” long x 10” wide x 5” tall with two equal spaced dividers making 3 compartments. Drawers shall have slide locks. Door shall be drop down with paddle style handle, bottom of possum belly compartment shall have drain holes in all three spaces at front.

3.20 In cargo bed area at front, there shall be an expanded metal bulk head with support frame work.

3.21 In cargo bed area, there shall be an auger storage rack that accommodates 18” x 5’ augers, location to be Mn/DOT approved. Additionally there shall be a storage rack for auger drive head, location to be Mn/DOT approved. Auger storage unit shall be a tube so flutes do not catch.

3.22 In cargo bed area there shall be a storage bracket for 3 each post pounder units locations to be Mn/DOT approved.

3.23 In cargo bed area there shall be brackets and space allowed for a generator which will power work lights. Contract vendor shall supply diesel powered generator. Generator shall draw fuel from cab & chassis fuel tank. Generator shall be Onan CMQD 7500, mounting of generator shall include a removable cargo area bulk head with proper ventilation capabilities to protect generator from damage. Generator shall be wired into outlets, hose reels and lights. Lights shall have separate switches. Wiring shall include load center panel with 3 breakers circuits.

3.24 Unit shall include 4 Safe-T-Lite Model 500, 500 watt flood lights mounted on adjustable stanchions, wired to power source. Two shall be at front corners of body and two at back corners of body, exact location to be Mn/DOT approved.

3.25 All compartments shall be equipped with rope lights mounted in a protected position, running vertically and horizontally around compartment with a master switch and indicator light in cab.

3.26 Body shall include driver and passenger side outrigger pad holding rack near outriggers.

3.27 On top of curbside and streetside compartment there shall be a shovel basket installed that has a reinforced frame and has a cleanout space between basket and cabinets. Basket shall be made of heavy #9 expanded metal or 14 gauge punched panel material. Basket shall be 28” wide by 12” tall and be just short of full length so it accommodates rear safety lights.

3.28 Unit shall be painted black, with lead free paint, appearance shall have uniform and satisfactory hiding power, color, gloss and smoothness.
3.29 At rear of body on top of above deck cabinets there shall be two Whelen #502000AU amber strobe heads facing rearward. In same location facing towards passenger and driver side there shall be two Whelen #502000AU amber strobe heads. Strobes shall be shock mounted in protective housings. On top of cab there shall be two Whelen MC9MED2A amber two lamp strobe lights installed on chassis reinforced roof mounts. Additionally, vendor shall supply price for roof mount light bar with wind noise prevention shield for chassis without reinforced roof mounts. Power source shall be Whelen ISP 188, 12 volt. Front, rear and side safety lights shall be on separate switches, cab mounted. Wiring shall be TPR cable, Loomed with Deutsch connectors.

3.30 Body shall include front and rear mud flaps for rear wheels. Mud flaps shall be heavy duty rubber, anti sail. Mud flaps can be installed on cabinets where possible.

3.31 Body shall have FMVSS108 L.E.D. lighting, shock mounted, recessed in rub rail. Bumper shall be ICC under ride approved. Sides and back of body shall have red and white reflective tape.

3.32 Vendor shall supply option price for Braden Model PD18-11FEB 20,000 lb. capacity hydraulic planetary winch with bumper storage compartment on left side, 4 way roller, 4 way control valve, Morris control lever in cab, hydraulic selector valve to switch from crane to winch, 225 ft of 9/16" 6x25 IWRC cable with eye, installed and painted black.

4.0 BODY VERSION 4, FOR A 31,000-35,000# GVW TRUCK WITH APPROXIMATE 108" CA AND BODY MOUNTED TELESCOPING CRANE.

Body shall be approximately 159" long, 96" wide, made of aluminum, with various compartments as per drawings numbered 4.

Body shall be unitized construction that saddles down on chassis frame rail with passenger and driver side cabinets extending below frame rails and has built in wheel wells with drip flange extension. Body shall be fabricated in accordance with good engineering profiles. Vendor will be responsible for understanding chassis frame rail heights and tire dimensions when ordering body so it fits properly on chassis.

Understructure shall be made of ¼" thick or better aluminum 4" to 6" formed “C” channel long sills and 3/16" thick or better “I” Beams cross sills placed 12" apart, gusseted every other member or better. Cross sills shall extend the full width of body wherever possible.

Floor shall be made of 3/16" thick aluminum tread plate.

Cabinets and compartments shall be made of 1/8" thick aluminum tread brite material, welds shall be continuous.

Hinged cabinet doors shall be made of 1/8" thick aluminum tread brite material, with structurally formal edges and weather tight bulb type rubber gasket seals. Roll up doors shall be Diamond Roll Up Door Inc. brand or equal, extruded aluminum roll up door with bar over center exterior latching handle.

Cabinet door hinges and fasteners shall be stainless steel and be weather tight.

Cabinet doors that are side opening shall have spring loaded hold open mechanism. Cabinet door handles shall be “D” style that latch via rods at both ends, all door locks keyed alike.

Rear apron shall be closed, manufactured of 3/16" aluminum. Tread plate with 18" deep hinged right and left bumper tail shelf that is open in the middle for trailer hitch. Tail shelf shall be aluminum grip strut material.

Body shall include a step bumper that is 18" deep with aluminum grip strut material on surface. Step bumper, shall include a sign post assembly brackets. Bracket shall have a aluminum backing to allow the signs and posts to be assembled to the same length. Bracket shall be made of 2" square tubing minimum with 2½ opening as shown in drawings. Sign bracket shall have a 2" receiver hitch tube installed in the middle, reinforced to the frame with hinged safety chain “D” rings and a 7 prong trailer socket. Hitch shall include a pintle ball combo. Trailer plug-in shall be mounted into sign post assembly bracket so it is protected from being knocked off. Installation shall include supplying electric brake controller, cab mounted.

At rear there shall be aluminum grip strut steps installed to access cargo bed area. There shall be two grab handles installed also. Location of steps and handles to be Mn/DOT approved.

Cargo bed area shall be painted with black anti-skid paint.

In rear tail shelf driver side a 22" wide by 18" tall by 37" deep underbody tool box shall be installed with two eagle brand 3” and 4” high pull out tool drawer installed inside tool box.

Driver side first cabinet shall be approximately 24" wide x 74" tall x 22" deep, mounted with bottom of cabinet below chassis frame rail. Cabinet shall have one vertically hinged door. Bottom of cabinet shall have outrigger pad holder on it. Cabinet shall have 3 adjustable shelves
4.15 Streetside #2 cabinet shall be 40" wide x 21" tall x 22" deep with an adjustable shelf. Shelf should have a lip on front side.

4.16 Streetside #3 shall be 135" long x 22" wide x 36" tall, sign post dividers and bulkhead shall be 3/16" thick plate with reinforcement at corners. Rear side shall have a door which swings open to left with hold open device. Front of sign post storage compartments shall have drain holes.

4.17 In tail self area just below deck there shall be two additional sign post storage bins, one 147" deep and one 87" deep, bulkheads to be 3/16" aluminum plate continuously welded. Additionally there shall be a slide bearing pull out drawer with dividers for bolts that is approximately 20" deep.

4.18 In tail shelf driver side there shall be cabinet with drop down door that is 20" wide x 18 ½" tall x 37" deep. Cabinet shall have two Eagle Brand bearing slide pull out drawers that are 3" and 4" tall with dividers.

4.19 Passenger side #1 compartment shall be 39" wide by 74" tall by 52" deep. Passenger side #1 shall have telescoping crane pedestal in it at front and be only 24" deep in this portion, this cabinet may be made from steel. This cabinet if made from steel is to be properly insulated from the aluminum body and the cabinet is painted silver. Cabinet shall have outrigger pad holder at bottom. Bottom of cabinet shall have one adjustable lipped shelf.

4.20 Passenger side #2 shall have be 30 5/8" wide by 40" deep.

4.21 Curb side #1, #2 and #4 shall have nylon type slide material with 1" spacing between signs ¼" gap for sign storage and ¾" thick, mounted top and bottom Curbside #3 shall have nylon sign storage material on bottom and back.

4.22 Passenger side #3 shall be a horizontal compartment that is 52 ¾ inches wide by 40 inches deep. Door shall be roll up door.

4.23 Passenger side #4 compartment shall be 36 5/8" wide x 40" deep x 74" tall extending below frame rail. Cabinet shall have roll up door. Bottom of cabinet shall have one adjustable lipped shelf.

4.24 On back side of driver and passenger side cabinets. Two rows of E track shall be installed.

4.25 The body shall have FMVSS 108 L.E.D. lighting, shock mounted, recessed in rub rail and anti-sail H.D. rubber mud flaps on front and rear side of rear tire. Rear bumper shall be ICC approved.

4.26 Tail shelf back side shall include 2 strobe lights anti-shock mounted flush with interior guards. Strobes shall be Whelen 502000AU amber. Switch shall be cab mounted.

4.27 There shall be two Whelen MC9MED2A two lamp strobe lights mounted on top of cab via reinforced roof mounts. Light mounting will require fabricating bracket to attach lights to roof mounts. Switch shall be cab mounted. Power pack shall be IDP 188 12 volt for all strobe lights. Wiring shall be TPR cable, loomed, Dentsch connectors.

4.28 Vendor shall plumb into chassis air compressor system and route an air line to rear passenger side of truck. Plumbing shall include a shut off valve that is accessible.

4.29 Body shall include holding brackets for hydraulic post hammer and post puller. Location to be Mn/DOT approved.

**FRONT DECK REQUIREMENTS**

4.30 At front of cab and chassis there shall be an approximate 8' x 24" wide hydraulically telescoping and elevating catwalk with bolt on handrails.

4.31 Catwalk decking shall be grip strut material. All decking sections surfaces in catwalk extensions shall go in the same direction up or down.

4.32 Catwalk shall have 2 hydraulic extensions and an approximate 28" flip out extension for a total of 12' of extension.

4.33 Extensions shall slide out on 110° Slide Master roller bearing mechanism providing positive 120% sliding platform.

4.34 System shall include electric/hydraulic system with controls mounted at cab grill and at cab dash per Mn/DOT approval.

4.35 System shall include a hydraulically operated leveling set up.

4.36 System shall include 1 ea 70" x 1.5", 1 ea 74" x 1.5" and 1 ea 3" x 10" hydraulic cylinders.

4.37 System shall be installed, ready to use with extension and retraction of catwalk.

4.38 Catwalk shall be primed and painted with lead free paint.

4.39 There shall be an outrigger for the cat walk at the outside edge of the truck body in the front bumper area to help keep the truck level when the catwalk is extended.

4.40 A 22" x 22" outrigger pad shall be supplied for catwalk outrigger and a storage rack will be
4.41 A proximity switch with light and buzzer (light and buzzer installed at a Mn/Dot approved location) that comes on when the truck is put into gear or brakes are released.

5.0 BODY VERSION 5, FOR A 31,000-35,000# GVW TRUCK WITH APPROXIMATE 130" CA AND A 36" OPENING BEHIND THE CAB FOR A CRANE AND AIR COMPRESSOR

5.1 Body shall be approximately 14’4" long, 96" wide, made of aluminum, with various compartments as per drawings numbered 5.

5.2 Body shall be unitized construction that saddles down on chassis frame rail with passenger and driver side cabinets extending below frame rails and has built in wheel wells with drip flange extension. Body shall be fabricated in accordance with good engineering profiles. Vendor will be responsible for understanding chassis frame rail heights and tire dimensions when ordering body so it fits properly on chassis.

5.3 Understructure shall be made of ¼" thick or better aluminum 4" to 6" formed “C” channel long sills and 3/16" thick or better “I” Beams cross sills placed 12” apart, gusseted every other member or better. Cross sills shall extend the full width of body wherever possible.

5.4 Floor shall be made of 3/16" thick aluminum tread plate.

5.5 Cabinets and compartments shall be made of 1/8" thick aluminum tread brite or smooth aluminum material, welds shall be continuous.

5.6 Cabinet doors shall be made of 1/8" thick aluminum tread brite or smooth aluminum material, with structurally formal edges and weather tight bulb type rubber gasket seals.

5.7 Cabinet door hinges and fasteners shall be stainless steel and be weather tight.

5.8 Cabinet doors that are side opening shall have spring loaded hold open mechanism. Cabinet door handles shall be “D” style that latch via rods at both ends, all door locks keyed alike.

5.9 Rear apron shall be closed, manufactured of 3/16" aluminum. Tread plate with 10” deep hinged right and left bumper tail shelf that is open in the middle for trailer hitch. Tail shelf shall be aluminum grip strut material.

5.10 Rear apron shall include 15 ton pintle hitch with hinged safety chain “D” rings, Berg 7 prong trailer socket and glad hands air brake connectors. Air brakes connection shall be located close to pintle hitch but out of way of trailer tongue swing. Additionally there shall be an electric brake socket at rear with cab mounted electric brake controller supplied.

5.11 At rear there shall be aluminum grip strut steps installed to access cargo bed area. There shall be two grab handles installed also. Location of steps and handles to be Mn/DOT approved.

5.12 Cargo bed area shall be painted with black anti-skid paint.

5.13 In rear tail shelf driver side a 22" wide by 18" tall by 18" deep underbody tool box shall be installed with two eagle brand 5” high pull out tool drawer installed inside tool box.

5.14 Driver side first cabinet shall be approximately 33.75" wide x 60” tall x 22” deep, mounted with bottom of cabinet below chassis frame rail for storing oxygen and acetylene tanks. Cabinet shall have one vertically hinged door. Cabinet shall include 2 ratchet straps and bottom of welding tank hold mechanism for securing 2 welding tanks. Cabinet flooring shall be reinforced for welding tanks. Bottom of cabinet shall have outrigger pad holder on it. Cabinet shall be vented properly for welding gas cylinders.

5.15 Streetside #2 cabinet shall be 25.25" wide x 60" tall x 22” deep with a fixed shelf installed 12” from top of cabinet. Shelf should have a lip on front side. Underneath the shelf there shall be 2-0-2 fixed H.D. hooks installed.

5.16 Streetside #3 shall be 113” long x 22” wide x 34” tall, open on top, sides shall be 3/16” thick aluminum tread plate with reinforcement channel at corners and approximately every 2’. Rear side of cabinet shall have a door which swings open to left with hold open device. Top edges of compartment shall be reinforced to avoid being deformed by loads. Bottom of compartment shall have drain holes as well as cross bracing for holding load off compartment bottom.

5.17 In space behind rear tire and in front of driver side tail shelf cabinet, there shall be a tool box installed with 180° swing down door. Tool box is to be part of unitized body and fill space without compromising truck departure angle at rear of truck.

5.18 Passenger side #1 shall be 33.75” wide by 60” tall by 22” deep. Passenger side #1 shall have 1 ea 3/8” x 50’ oxygen/acetylene Rewind hose reel mounted on cabinet top. Cabinet shall have outrigger pad holder at bottom. Cabinet shall have three lipped adjustable shelves in bottom.
5.19 Passenger side #2 shall be 33.75" wide by 60" tall by 22" deep and have 3 adjustable lipped shelves in upper portion of cabinet and a 4 drawer 5" high eagle tool drawer unit mounted in bottom of cabinet.

5.20 At midpoint just behind curbside #2 an air outlet shall be installed and on driver side just behind rear tire just under streetside #3 in a recessed area so air outlet does not protrude beyond the side of the truck. Air pipe shall be ¾" diameter.

5.21 Passenger side #3 shall be a horizontal compartment that is divided in half with each compartment having two adjustable lipped shelves. Door shall be drop down 180° with chain/cable stops at 90° point. Doors shall include bumpers where needed.

5.22 Passenger side #4 compartment shall be 52.25" wide x 22" deep x 60" tall extending below frame rail. Cabinet shall have overlapping vertically hinged doors. Cabinet shall have 1 ea ½" x 50' air rewind hose reel and 1 ea ¾" x 50' air rewind hose reel plumbed to air compressor and mounted to top of cabinet. Mounting to be Mn/DOT approved. Bottom of cabinet shall have 2 high approximately full width H.D. America Eagle nuts and bolt drawer unit installed.

5.23 At front of truck a 12" high x 12" wide full width aluminum work top compartment shall be built. Top shall be made of 3/16" aluminum tread plate material and shall be hinged to flip up for access. Compartment shall have curved back ends for aesthetics and aerodynamics. Flip up door can be multi-piece with each door having a latch. Bottom of compartment shall be double layer of H.D. expanded aluminum.

5.24 On each side of body at top of back side of curbside and driver side #2 there shall be a flood light installed. Flood lights shall be 12 volt and on separate switches. Flood light shall be K&H Industries Model 475-20 remote control. Mounting of remote control to be Mn/DOT approved.

5.25 In top of driver side #2 compartment a Dimensions DUI 12/3000 inverter shall be installed. Installation shall include 2 GFI duplex receptacles. Install location to be Mn/DOT approved.

5.26 On back side of driver and passenger side cabinets two rows of E track shall be installed that is 34" off deck flooring and one near bottom for holding 5' tall rolls of fencing. Top E-track shall be placed 34" off decking or higher.

5.27 The body shall have FMVSS 108 L.E.D. lighting, shock mounted, recessed in rub rail and anti-sail H.D. rubber mud flaps on front and rear side of rear tire. Rear bumper shall be ICC approved.

5.28 Tail shelf back side shall include 4 strobe lights anti-shock mounted flush with interior guards. One set of strobes mounted at top of body each side and one set mounted lower at each side. Strobes shall be Whelen 502000AU amber. Switch shall be cab mounted.

5.29 There shall be two Whelen MC9MED2A two lamp strobe lights mounted on top of cab via reinforced roof mounts. Light mounting will require fabricating bracket to attach lights to roof mounts. Switch shall be cab mounted. Power pack shall be IDP 188 12 volt for all strobe lights. Wiring shall be TPR cable, loomed, Dentsch connectors.

5.30 Vendor shall supply auger head holding bracket, 2 ea auger holding brackets and two post pounder holding brackets. Holding bracket mounting locations shall be Mn/DOT approved.

6.0 BODY VERSION 6, FOR A SINGLE AXLE, 33,000 GVW TRUCK WITH A 120" CA AND A 36" OPENING BEHIND THE CAB FOR A CRANE AND COMPRESSOR

6.1 Body shall be approximately 147" long, 96" wide with various compartments as per drawings numbered 6. Offer shall include all items shown on drawings.

6.2 Body shall be unitized construction that saddles down on chassis frame rails with passenger and driver side cabinet extending below frame rails and has built-in wheel wells with drip flange extensions. Body shall be fabricated in accordance with good engineering practices. Vendor will be responsible for understanding chassis frame rail heights and tire dimensions when ordering body so it fits properly on chassis.

6.3 Understructure shall be a 3/16" - 6" high formed C channel cross sills minimum.

6.4 Floor shall be 3/16" thick treadplate with 1-3/8" return flange on each side minimum.

6.5 Compartment top and back shall be one piece seamless design.

6.6 Body shell shall be made of 14 gauge two-sided galvanneal steel minimum with drip rail over the doors.

6.7 Doors shall be 20 gauge two-sided A 40 galvanneal steel, double paneled with hat section reinforcements minimum.

6.8 All doors, door openings, drip rails and other exposed steel edges shall be hemmed.
6.9 Door hinges shall be stainless steel, full length with built-in weather shield.
6.10 Latches shall be rotary zinc plated or stainless steel slam type or approved equal. All doors and drawers shall be lockable, keyed alike.
6.11 Door strikers shall be adjustable screw on type.
6.12 Door seals shall be automotive bulb type on all doors.
6.13 Door retainers shall be double spring over center on vertical doors, this included the door on sign post storage compartment.
6.14 Back of body shall be enclosed down to step bumper with wrap around side to wheel wells.
6.15 Bottom edge on sides and back shall have reinforced edge.
6.16 Body and doors shall be immersed in electrode position epoxy prime paint with a zinc phosphate pre-coat and seal. Prime paint to be oven cured.
6.17 Body shall be factory under coated.
6.18 At rear of body, driver side, just above step bumper, a tool box shall be installed with a weatherproof, lockable door. Tool box shall accommodate and include 2 American Eagle brand (or MnDOT approved equal) pull out drawers that are 18” W x 22” D x 5” H with dividers.
6.19 Driver side inside wall shall have 8” x 30” x 10’ ladder box.
6.20 There shall be an expanded metal or 14 gauge punched panel basket mounted above street side compartments that is 8” high x 20” wide x 10’ long, material shall be #9 flat expanded or 14 gauge punched panel metal. Edges, corners, etc., shall be metal reinforced. Metal basket shall be mounted on top of body such that there is a clean out space underneath.
6.21 The sign compartments shall have a nylon type slide material with 1” spacing between signs and 3/4” high, mounted top and bottom.
6.22 Body shall include crane outrigger pad holders, one on each side, 2 each 24” x 24” x 24” nylon pads shall be supplied.
6.23 Body shall include 4 each Whelen 502000AU amber strobe lights and 2 each Whelen MC9MED2A 2 lamp amber strobe lights. Power source shall be Whelen 12V ISP188. the Whelen MC9MED2A light head shall be cab mounted either on reinforced cab roof mounts or via optional priced roof mount light bar with anti-wind noise shield. Whelen 502000 AU strobes shall have 2 mounted on back of body and 2 mounted on side of body at rear. Mounting to be shockmount with interior guards. Safety lights shall be on separate switches (side, rear and front).
6.24 Unit shall be painted black, lead free paint, appearance shall have uniform and satisfactory hiding power, color, gloss and smoothness.
6.25 The body shall have FMVSS108 L.E.D. lighting shock mounted, recessed with interior guards, weatherproof connections.
6.26 Body shall include anti-sail, anti-splatter rubber mud flaps in front and behind the rear wheels.
6.27 Right rear compartment shall have reinforced floor and be vented to accommodate welding gas cylinders. Additionally, top of cabinet shall be reinforced for mounting hose reels. Cabinet shall include welding cylinders on clamp.
6.28 Body shall include oxy/ acetylene hose reel with 50’ of 3/8” hose and core stop, installed R.R. Compartment, mounted on inside top of cabinet.
6.29 Body shall include a reel craft, 83500LT model air hose reel with 3/4” x 50’ air hose with spring rewind installed in rear passenger side compartment mounted on inside top of cabinet.
6.30 Pull out drawer at back of body shall include partitions and have ball bearing slide out mechanism with drawer lock, so shall drawer on passenger side above rear tire.
6.31 Rear of body shall include two grab handles.
6.32 Drivers side, inside wall of body shall include 2 each 10’ of "E" track with 2 each fastening straps.
6.33 Passenger side lower compartments shall include a pull out shelf with dividers via a bearing slide out mechanism with shelf retaining latch.
6.34 Passenger side #3 compartment shall have a pull out roller bearing slide drawer, Eagle Brand, with dividers installed below sign holding compartment.
6.35 The sign compartments shall have a nylon type sign storage slide material with 1” spacing between signs, ⅛” gap for sign storage and ¼” or greater thick, mounted top and bottom or back and bottom as indicated in specification or drawing.

7.0 **Body version 7 for a single axle 33,000# Straight frame truck with 133” CA and a 43” Opening behind the cab for a crane compressor and vertical exhaust.**
7.1 Body shall be approximately 144” long and 96” wide with various compartments as per drawings
7.2 The base flatbed shall have long sills manufactured from 8” steel channel, 5.4 lbs. per foot minimum spaced 12” on center. At least every other cross sills shall be gusseted to a long sill. Top surface of flatbed shall be 3/16 smooth steel.

7.3 Base unit flatbed shall be dipped or approved equal with rust preventive coating such as zinc phosphate.

7.4 The body compartments shall be manufactured of 14 gauge A-40 galvanneal steel or greater and have drip rail over door.

7.5 The compartment door shall be double 20 gauge or 16 gauge galvanneal steel or greater with hat section reinforcements minimum. Handle shall be S.S. latches on top and bottom. Fastening hardware shall be S.S. Door shall have automotive bulb type weather seal.

7.6 Sign post storage compartments shall have 10 gauge steel or greater for the dividers, bulkhead shall be 3/16” steel. Top flooring shall be 3/16 steel tread plate. Sign post storage bottom shall have clean out holes. Welding of dividers, bulkheads and flooring shall be continuous or substantial enough so that sign posts do not break welds during life of the body.

7.7 Cargo area between body boxes shall be painted with anti-skid paint.

7.8 Passenger side of truck shall have storage cabinets as shown on drawing #7. All cabinets except the most rearward cabinet shall have a chain and latch mechanism installed at halfway point per Mn/Dot approval. There shall be plastic blocks both on top and on the bottom are capable holding signs standing on edge approximately 1 inch apart.

7.9 Rear most passenger side cabinet shall have a door on it with a fixed shelf with lip on it. Shelf shall be installed at the 2/3’s point from the bottom. Bottom of this cabinet shall have a storage tray that is 4” tall with 4 ea. 7” wide compartments and two of these compartments shall be divided in half. Additionally there shall be a light installed on underside of the fixed shelf with the light switch in the compartment and an additional switch and indication light in cab of truck.

7.10 At rear of bed, behind passenger side storage cabinets. There shall be a crane reinforcement plate that is 20”x26”x1/4” with continuous welds on all sides. Additionally crane reinforcement plate shall be reinforced into deck body and cab&chassis frame rails.

7.11 Contract vendor shall supply and install a hose reel that is 50’ long x ¾” I.D. diameter with spring rewind feature.

7.12 On back side of passenger side cabinets there shall be two rows of Etrack (84” long) installed per customer approval and two tie down straps supplied.

7.13 Welding torch cabinet shall have cylinder clamps, reinforced bottom (for welding cylinders) and holding device installed in it. Additionally there shall be welding hose hook mounted on front wall. Mounting location to be approved by customer. Back wall shall have two additional hooks installed for holding lifting chains.

7.14 The top of the passenger side cabinets shall have 10 gauge steel tread plate, painted with snit-skid paint. Tread plate is not required where air compressor cooling units are installed.

7.15 Driver side shall have a 24” tall x 48” long x 24” deep aluminum Protech toolbox or equal. Door shall be polished S.S. hinged at bottom, opening 180 degrees. Box shall be .125 thick aluminum. Door shall be .10 thick minimum. Hinges shall be stainless steel. Box shall be mounted to deck with 1” clean out space underneath. Spacers to be of a non-rusting material.

7.16 Under deck, front of deck, driver side shall have a Protech toolbox that meets requirements of specification 7.15 and is 18” tall, 48” long and 18” deep with stops at 90 degree position. Mounting shall be such that the top of toolbox can easily be cleaned off.

7.17 Behind the above deck toolbox on driver side there shall be a 76” long x 24” wide x 12” tall aluminum punch plate basket with a lengthwise top of bottom divider at 12” point. Aluminum punch plate shall be .125 thick basket shall have reinforced top edges, ends and bottom and be spaced off post storage compartment by 1” minimum with spacers made of non-rusting material.

7.18 At front of body there shall be a 30” high 3/16” steel treadplate bulkhead with reinforcement top edge. Additionally there shall be two Whelen Micro edge MC9MED2A lights mounted on pedestals at front of body, one on driver side with pedalstal coming off bulkhead and on passenger side on top of 50” high cabinet. Customer shall approve mounting and pedestal heights.

7.19 At rear tail shelf, driver side there shall be custom cabinet/drawer unit manufactured form a 10 gauge shell or greater, with a flat access door. The drawer unit shall be manufactured from 12 gauge steel or greater with slides that have a locking mechanism to keep drawer from sliding out. The American Eagle drawer unit shall have “egg crate” type dividers.

7.20 There shall be two 9’ sign post storage compartments installed at tail shelf, between the frame rails with cleanouts, and same steel used as in the deck sign post storage compartment. Sign
post storage's shall be as wide as possible.

7.21 There shall be a grab handle rail installed on back of deck 24” in from driver side and a step installed at tail shelf. Step shall be made of grip strut mounted per customer approval.

7.22 Tail shall include a 10 gauge or greater vertically mounted steel treadplate, A sign post holder per drawing and a 12” tail shelf with grip strut step material on top of tail shelf. Tail shelf shall meet ICC bumper requirements. Tail shelf shall include two strobe lights mounted in protective housing per customer approval. Switches shall be cab mounted. Light package to be Mn/Dot 8.

7.23 Unit shall be painted black, lead free paint, appearance shall have uniform and satisfactory hiding power color, gloss and smoothness

7.24 Unit shall include FMVSS108 lighting that is shock mounted, recessed. All wiring shall be loomed and protected, all connections coated with dielectric material and heat shrink.

7.25 Contract vendor shall provide and install H.D. rubber anti-sail mud flaps in front of and back side of rear wheels. Front side mud flap shall be 12” off ground and have a chain retainer to prevent flap from resting against rear tires.

7.26 At the front and rear of body on passenger side there shall one light at each location and the light shall be a Betts model 305 Flood/spot work lights or a MnDOT approved equal installed per customer approved location.

8.0 Body version 8 for a single axle truck with 92” CA

8.1 Body shall be approximately 135” long, 96” wide with various compartments as per drawings numbered 8

8.2 Body shell is 14 gauge galvanneal steel

8.3 Floor is 3/16” treadplate with 13/8 return flange.

8.4 understructure is 36,000 yield 7 gauge hot rolled “C” section 8” high steel cross sills, (5) cross sills, (2) end rails, (2) wheel housing sills.

8.5 Side compartment height is to be 66”, side compartment depth is to be 24” on the street side and 20” on the curb side.

8.6 Doors are double-shell, 20 gauge two-sided galvanneal steel with hat-section reinforcement for curability and long life. All stainless steel continuous hinges with 1/8” pin provides corrosion protection and pry-proof security.

8.7 Door retainers are double spring-over center door retainers on all vertical door, Rubber door bumpers on horizontal doors.

8.8 Door seals are an automotive continuous hollow neoprene seals installed on all doorframes.

8.9 Light guards are pre-punched, interior light guards shall be provided for lights and wiring harnesses

8.10 Exterior prime is to be a 12 stage prime paint process using Zink Phosphate and complete immersion in an electrodepositing and oven curing process.

8.11 Interior paint is to be medium gloss light gray electrodepositing epoxy paint and be oven cured.

8.12 The underbody is to be completely undercoated.

8.13 See drawing #8 for more details.

8.14 Signpost compartments above floor, 3/16 treadplate false floor installed with partitions and end stops. The signpost area shall be equality divided into 5 compartments with 10 gauge partitions, 7 gauge end stops with front cleanout holes.

8.15 One friction drawer in cargo area, 14 gauge construction friction slide drawer with combination slide latch/pull out handle 60” long and approximately 10” wide, with side to side dividers, installed on cargo floor in a separately called out false floor tunnel.

8.16 Treadplate bumper with hitch tube, 18”, 1/8” tread plate construction with a 2’ square receiver hitch tube. There also shall be provisions for sign assembly.

8.17 Shall have rope type compartment lights to not have power when ignition key is in the off position

8.18 S.S. D-Ring 3 point latches on all doors.

8.19 All lights are to be LED style.

8.20 Unit shall be painted with lead free paint and the appearance shall have uniform and satisfactory hiding power, gloss and smoothness.

8.21 The body shall have FMVSS108 lighting recessed with interior light guards, weatherproof connections.

8.22 Body shall include anti-sail mud flaps front and rear of rear tires.

8.23 Rear of body shall include two grab handles.

8.24 Right and left hand inside wall of body shall include 10’ of Etrack with two each fastening straps
Optional equipment

8.25 The #1 box on the curbside shall be able to be reinforced to support the biggest crane that is on the current Crane contract that would be applicable for this body of this style. Also a boom rest shall be included on the front of the body with a boom out of stow light in the cab as an option.

8.26 The compartment Tops and bottoms reinforced to support the hose reels, toolbox and the gas welding equipment as shown on the #8 Body drawing.

9.0 Body version 9 for a 31,000-35,000 LB GVW Truck with Approximately 108” CA & a air compressor

9.1 Body version 9 shall be a Knapheide 6155HC body or a MnDOT approved equal all steel capped body. The body shall be approximately 155 inches long by 94 inches wide x 78 inches High (from body floor to bottom of inside of cap.

9.2 All compartments are to be 18” deep except the front one on the curb side of the body which is to go all the way across to the front compartment on the Street Side.

9.3 There shall be a master lock system to lock all cabinets on each side.

9.4 All shelves are to have a 1 inch lip facing up to keep shelf items from sliding against the door.

9.5 All doors to have gas charged struts to hold the doors open at 90 degrees and help keep the doors closed. All compartment doors shall have bulb type door seals. All door handles are to be stainless steel D-ring style door handles with top, bottom and center latches.

9.6 All Double door compartments are to have the front door overlapping the rear door. All single door cabinets to have the hinge on the front of the body side of the compartment so the door opens to the front and the wind will help keep the door closed while driving down the road.

9.7 All boxes/ compartments are to have rope lighting on the front, top and rear side of the compartment and just inside of the door.

9.8 The inside of the body to have 4 Whelen LED lights model 86CE. The lights are to be placed along the center line of the body and be evenly spaced front to back between the roof vents. The light switch shall be installed so the switch is recessed into the back of the Curb Side #4 compartment just inside the door.

9.9 The front compartment on the Street Side (#1) shall be 53 inches wide and 18 inches deep by 60 inches tall. The floor and back wall shall be reinforced to support 4 one hundred pound jackhammers in a stand. The compartment is to have 6 swivel J hooks, 2 on the front wall, 2 on the back wall and 2 on the rear wall about 12 inched down from the top. This compartment is to have double doors.

9.10 The next compartment (#2) back on the Street Side shall be 25 inches wide and 50 inches tall. There shall be 3 adjustable shelves. Compartment shall have one door.

9.11 The third compartment back (#3) shall be over the wheels and be 53 inches wide and 22 inches tall. There shall be one full width adjustable shelf. There shall be double doors.

9.12 The rear compartment (#4) is to have 3 adjustable shelves. This compartment will have a single door.

9.13 The curb side compartments are to have the same diminutions and doors as the Street Side except the first compartment (#1curb side) which is deeper as stated above.

9.14 The first compartment (#1curb side) above frame area is to go across the body to the back side of the driver’s compartment. The below frame part is to be 18 inches deep so the compartment will have a step inside of it that goes around the frame and subframe. This compartment is to be vented for gas welding equipment. The floor is to be reinforced for oxy/ acetylene tanks. There shall be rings welded into the floor and straps on the rear wall to secure the gas bottles.

9.15 There shall be 5 J hooks inside the upper part of the #1curb side compartment. 3 evenly spaced on the rear wall and 2 on the back wall of the compartment all about 12 inches down from the top of the compartment.

9.16 There shall be one Whelen LED light (same style as the inside of the body) in the top of the #1curb side compartment.

9.17 There shall be a 50 foot x 3/8 inch gas welding hose reel on the ceiling of the #1curb side compartment just inside the door as close the front of the compartment as possible. The hose reel shall come with hoses that connect to MnDOT provided tanks and regulator. The ceiling above the lower part of the compartment shall be reinforced to support this hose reel. Optional location in compartment may be specified at a 80% completed meeting.

9.18 The second #2 curb side compartment shall have a American Eagle or a MnDOT approved
equal, drawer assembly that is as wide as possible in the compartment and have from top to bottom; 5 three inch tall drawers, 2 five inch tall drawers and a seven inch tall drawer on the bottom, all latching handles and drawer dividers.

9.19 In the horizontal cabinet #3 curb side over the wheel well there is to be one shelf. Under the shelf there shall be a parts drawer cabinet that is 34 inches wide x 17 high x 17 deep with 24 parts drawers.

9.20 The rear #4 curb side compartment on the curb side is to have 4 shelves. This cabinet shall also contain the remote controls for the Go light mentioned later.

9.21 There shall be 2 optional Whelen lights # PFP2 and PFA1 Pioneer Plus and corresponding mounting hardware PBA103 & PBA203 on the Street Side and curb side of the body. The front light double LED light shall be mounted so the center is above the door hinge points of compartment 1 & 2 on each side. The rear single light shall be mounted about 12 inches forward from the rear of the truck. Each shall be about 6 inches down from the top of the truck.

9.22 An Air Box (See drawing titled Air Box) shall be installed just behind the rear wheel on each side. The Air Box shall be 6 inches wide. The quick coupler shall be installed so it is pointing in a downward direction.

9.23 The rear doors of the body shall be so the maximum of the floor area is open to loading of pallets. The rear door shall have windows in them with expanded metal protection on the inside of the doors to protect the glass. Please state price of a windowless door option on price page.

9.24 Towards the outer edges of the body there shall be a chrome towel bar style grab handle.

9.25 At the bottom edge of the rear of the body there shall be a step that is made of grip strut type material in the tread area so dirt can fall through and is a non-slip surface. There shall be a space in the rear step for a pintle hitch and room for trailer swing without hitting the step. If there is to be a lift gate the step shall be deleted and the pintle hitch shall be indented towards the front to provide clearance for lift gate as needed.

9.26 There shall be a frame hitch support under the body and a 16 ton 2 5/16 pintle ball hitch

9.27 A removable grab handle shall be installed as close to the sides on each side of floor that is 3 feet tall and just inside of the rear doors.

9.28 There shall be a Phillips type Trailer plug with 7 round pins install near the pintle hitch.

9.29 There shall be 2 D-rings installed for securing trailer safety chains by the pintle hitch and the D-rings are to be hanging down.

9.30 There shall be swing away glad hands so the lay flat against the body when not in use.

9.31 Under the floor of the body on the Street Side there shall be a reinforcement plate that the thickness is sized correctly for the optional crane to mount to.

9.32 Inside the body there shall be a partition above the compartments that goes from the top of the compartments to the bottom of the cap forming another compartment in the rear of the body that is 23 inches wide on each side of the body. This divider/Partition shall be sturdy enough to support two hose reels if needed.

9.33 From the partition forward on each side at the top of the compartments there shall be a 2 inch lip so the tops of the compartments can be used as a shelf.

9.34 At the same level as the front two #1 compartments there shall be a shelf on each side the runs back to the partition. There shall also be a lip on the front compartment so items will not slide off if used as a shelf.

9.35 Inside the body on the back of the compartments shall be two strips of Etrack, one about a foot off the floor and the top one just below the top of the side compartments.

9.36 The ceiling shall have three optional sun/moon roof vents. The glass on the vents shall be tinted a smoke color and be approximately 36 inches wide and 18 inches front to back. The glass shall lift up on the back side of the vent so they can be locked open while going down the road and not have rain coming in the vent.

9.37 In the inside over The Curb Side #4 compartment shall be two optional hose reels. They each shall have 50 feet of hose with male ends, the purchasing agency shall supply the quick couplers for the end of the hoses. One hose reel shall be 3/8 inch and the other shall be ¾ inch same as in spec # 1.23. An optional hose reel same as the other two but for 1/2 inch hose shall be offered also on the price sheet. The larger diameter hose reel shall be installed towards the outside of the body to make more room for the water separator/oiler. Each hose reel shall have its own air shut off, ball type valve.

9.38 Over the Street Side #4 compartment there shall be one optional hose reel with ¾ inch hose
There shall be a water separator and oiler with a ¾ inch inlet installed so all the hose reels and the air outlets behind the rear tires are filtered and oiled by this unit. The unit is to be installed on the rear of the partition inside the body on the curb side in a way that the unit can be easily drained through a hose leading straight down through the #4 cabinet in the back corner to under the body. The unit is also to be installed so the oiler section can be easily refilled while standing on the floor inside the body.

The hoses shall go through a Air Box that is 16 inches wide and installed so the hose shall come off the reel and go straight through the air box. There shall be a nylon bushing that the hose goes through in the air box so the hose is not damaged by sharp edges and the hose stop shall cover the hole on the outside.

The air boxes shall be installed by the body builder so they can be cleaned and primed at the same time as the body.

On the outside of the body in the curbside rear corner shall be a Go light model 2020, K&H Model 475-20, or a MnDOT approved equal, remote control light. The controls shall be in the curb side #4 cabinet on the rear wall.

There shall be two rubber mounted Whelen warning lights on each side in the rear of the body as shown in the body #9 drawing. The top lights shall be 2FA00ZAR and the bottom lights shall be 2EA00ZAR. There shall be a mirror mounted Whelen light model L31HAF installed on the door mirrors so the light is above the roof of the cab. None of these LED warning lights need to synch together.

MnDOT may consider a optional 2000lb capacity liftgate installed instead of the rear step. The body shall be reinforced and constructed to support the liftgate and provide clearance for the liftgate. Liftgate shall be able to fold up flat against the rear of the truck and have enough travel to reach the ground with the truck on a flat surface and be level with the body floor in the raised position. Lift gate shall be the full width of the body floor minimum but not so wide as to block the tail lights. The Pintle hitch, D-rings, air lines and electric connections shall be indented to the front enough to provide clearance for liftgate.

10  **Body Version 10**

10.0  This body will be approximately 132'' long, 96'' wide with 22'' deep compartment s, except on CS # 1 which will be 40’’ deep to accommodate sign storage, 66’’ tall per drawing # 10. The front of the body shall have a 6’’ wide x 96’’ depth x 48’’ tall oversize sign compartment running across the front of the body.

10.1  The body type shall be a full body design with cabinets and designed and fabricated in accordance with good engineering practices and LED FMVSS 108 lighting.

10.2  The body shall be all aluminum construction with full length 6’’ structural aluminum long sills

10.3  The body shall have 4’’ aluminum structural cross members

10.4  The Body shall have .125 thickness tread bright aluminum outer panels and have ROM Corporation Bushed aluminum roll up doors except CS # 1 crane compartment , rear of SS # 4 and rear access door for pull out drawers in rear apron area, which will be hinged.

10.5  All hinged doors shall be made of .125 aluminum with structurally formed edges and weathertite bulb type automotive weather stripping with a stainless steel "D" handle

10.6  Door hinge and hardware shall be stainless steel.

10.7  Rear apron shall be all aluminum closed design manufactured from 3/16” tread bright aluminum
10.8 There shall be a full width aluminum grip strut bumper, 12” wide with center recess for towing; also incorporated into the bumper shall be 2” x 2” aluminum square tubing sub structure to allow for sign post construction. Bumper shall also include a 2” x 2” towing receiver hitch, safety chain “D” rings and a 7 prong, flat style towing socket.

10.9 CS # 3 is 18” wide Crane compartment, 6000 Lbs, 40” deep

10.10 CS # 2 Sign compartment, 36” wide, 40” deep, with poly pro sign slide material for 36”, 24” and 18” signs, all sign compartment to be 12” wide with shelf on top in each section with a lip going up on the door side of the shelf. All of the signs are to be even on the bottom of the compartment and the top shelves will be at different heights.

10.11 CS # 3 Horizontal compartment over wheel wells, 40” wide open for hose reel and drawer installation

10.12 CS # 4 Open for hose reel installation

10.13 SS # 1 18” wide, Oxygen / Acetylene bottle tank holder’s brackets

10.14 SS # 2 36” wide

10.15 SS # 3 Horizontal compartment over wheel wells, 40” wide, open

10.16 SS # 4 30” wide open from rear of body with hinged door, poly pro slide material for 30” signs

10.17 All compartment to have LED rope lighting, switched from cab

10.18 Accessed from the rear of the body shall be a possum belly compartment, between long sills, divided equally, post storage for 9’ / 9’ / 10’ / 6’ posts

10.19 False floor for sign post storage, 6” tall divided equally, post storage for 9’ / 9’ / 10’ / 6’ posts

10.20 12” drop down tailgate

10.21 Rear apron with LH side hinged door for 2 drawer, pull out drawers

10.22 Aluminum full length tool basket, 8” tall to be installed top of compartment, street side

10.23 There shall be a access step and grab handle at the rear apron area for cargo area access

10.24 Light holes to be cut in the rear apron for all warning and FMVSS lighting

**Note:**
MnDOT will accept drawings and specifications for custom bodies that are intended for sale to CPV members or MnDOT. When submitted the drawings and specifications they shall become property of MnDOT. The drawings MUST be submitted prior to two and a half (2.5) months before the end of this contract to be on the next contract. Everyone will be allowed to bid on the submitted body and the vendor who submitted the body is not guaranteed a contract for that body. That body if approved will be on contract for that contract only and must be resubmitted to be on the following contract. Each vendor can only submit two custom bodies per contract. The specifications and drawings must be in a MnDOT approved format and the format must be approved by MnDOT prior to submitting to MnDOT. In the submitted documents, brand specific or proprietary information will be removed or modified by MnDOT or the Department of Administration to comply with Minnesota law. There is no guarantee that this offer will be on any future contracts.

**Responder Instructions for the custom bodies:**
11.1 A pricing page is included covering the nine different body versions. Responders can offer on all, some, or one body version.

11.2 Responders must submit pricing on the “State of Minnesota Pricing Page” form that is included in RFP for the custom bodies.

11.0 VENDOR INSTRUCTIONS:

12.1 The responders should supply a price list catalog or section of a price list catalog with a discount to be applied. Make copies of catalog discount pricing page and fill in the requested information. In addition to the required hard copies, an electronic version shall be submitted if available.

12.2 Mn/DOT will convert catalogs and catalog discount pricing pages into a contract for communication to state agencies and Cooperative Purchasing Venture members. Do not submit documents with dark colors, shaded information or poor reproductions as they are not legible when scanned into the computer and put on a web site.

12.3 Delivery costs are to be for loaded miles only. The vendor must state starting location. Mileage distances will be determined the website http://maps.yahoo.com.

12.4 The responder must state company name, address, contact, phone number, fax number and toll-free number, if available, at the bottom of each pricing page submitted. This shall be done for each section and/or price list catalog submitted.