

**Prepared by:**  
Logan Grimm  
EXCEL TRUCK GROUP  
267 LEE HIGHWAY SOUTH  
ROANOKE, VA 24019  
Phone: 540-453-1004

*A proposal for*

*Prepared by*  
**EXCEL TRUCK GROUP**  
*Logan Grimm*

*Jul 14, 2021*

**Western Star 49X**

Components shown may not reflect all spec'd options and are not to scale

## S P E C I F I C A T I O N   P R O P O S A L

Description	Weight Front	Weight Rear
<b>Price Level</b>		
WST 49X STAR PRL-26X (EFF:7/26/21)		
<b>Data Version</b>		
SPECPRO21 DATA RELEASE VER 006		
<b>Vehicle Configuration</b>		
WESTERN STAR 49X	9,175	6,500
2023 MODEL YEAR SPECIFIED		
SET BACK AXLE - TRUCK		
STRAIGHT TRUCK PROVISION, NON-TOWING		
LH PRIMARY STEERING LOCATION		
<b>General Service</b>		
TRUCK CONFIGURATION		
DOMICILED, USA 50 STATES (INCLUDING CALIFORNIA AND CARB OPT-IN STATES)		
CONSTRUCTION SERVICE		
CONSTRUCTION BUSINESS SEGMENT		
HEAVY EQUIPMENT COMMODITY		
TERRAIN/DUTY: 100% (ALL) OF THE TIME, IN TRANSIT, IS SPENT ON PAVED ROADS		
MAXIMUM 8% EXPECTED GRADE		
SMOOTH CONCRETE OR ASPHALT PAVEMENT - MOST SEVERE IN-TRANSIT (BETWEEN SITES) ROAD SURFACE		
WESTERN STAR VOCATIONAL WARRANTY		
EXPECTED FRONT AXLE(S) LOAD : 12000.0 lbs		
EXPECTED REAR DRIVE AXLE(S) LOAD : 21000.0 lbs		
EXPECTED GROSS VEHICLE WEIGHT CAPACITY : 33000.0 lbs		
<b>Truck Service</b>		
FLATBED/PLATFORM/STAKE BODY		
GODWIN MANUFACTURING COMPANY		

Description	Weight Front	Weight Rear
<b>Engine</b>		
CUM X12 350 HP @ 1800 RPM, 1350 LB-FT @ 1000 RPM, 1800 GOV RPM	-670	-55
<b>Electronic Parameters</b>		
65 MPH ROAD SPEED LIMIT		
NO IDLE SHUTDOWN CONFIGURATION		
<b>Engine Equipment</b>		
2016 ONBOARD DIAGNOSTICS/2010 EPA/CARB/GHG21 CONFIGURATION		
2008 CARB EMISSION CERTIFICATION - CLEAN IDLE (INCLUDES 6X4 INCH LABEL ON LOWER FORWARD CORNER OF DRIVER DOOR)		
STANDARD OIL PAN		
ENGINE MOUNTED OIL CHECK AND FILL		
SIDE OF HOOD AIR INTAKE WITH ENGINE MOUNTED AIR CLEANER		
LN 12V 170 AMP AVI 160 PAD MOUNT ALTERNATOR		
(3) DTNA GENUINE, HIGH TEMP AGM STARTING AND CYCLING, MIN 2775CCA, 570RC, THREADED STUD BATTERIES		
PASSENGER SEAT BATTERY BOX VENTED TO OUTSIDE OF CAB		
BATTERY BOX MOUNTED UNDER PASSENGER SEAT		
WIRE GROUND RETURN FOR BATTERY CABLES WITH ADDITIONAL FRAME GROUND RETURN		
PLASTIC BATTERY BOX COVER		
CUMMINS NATURALLY ASPIRATED 25.9 CFM AIR COMPRESSOR WITH INTERNAL SAFETY VALVE		
ELECTRONIC ENGINE INTEGRAL SHUTDOWN PROTECTION SYSTEM		
CUMMINS INTEBRAKE BRAKE WITH HIGH MED LOW BRAKE		
RH OUTBOARD UNDER STEP MOUNTED HORIZONTAL AFTERTREATMENT SYSTEM ASSEMBLY WITH RH B-PILLAR MOUNTED VERTICAL TAILPIPE		
ENGINE AFTERTREATMENT DEVICE, AUTOMATIC OVER THE ROAD ACTIVE REGENERATION AND VIRTUAL REGENERATION REQUEST SWITCH IN CLUSTER AND DASH MOUNTED INHIBIT SWITCH		

Description	Weight Front	Weight Rear
11 FOOT 06 INCH (138 INCH+0/-5.9 INCH) EXHAUST SYSTEM HEIGHT		
RH CURVED VERTICAL TAILPIPE B-PILLAR MOUNTED ROUTED FROM STEP		
13 GALLON DIESEL EXHAUST FLUID TANK	9	3
UNPOLISHED ALUMINUM WST DIESEL EXHAUST FLUID TANK COVER		
LH HEAVY DUTY STANDARD DIESEL EXHAUST FLUID TANK LOCATION		
STANDARD DIESEL EXHAUST FLUID TANK CAP		
STAINLESS STEEL AFTERTREATMENT DEVICE/MUFFLER/TAILPIPE SHIELD		
AIR POWERED ON/OFF ENGINE FAN CLUTCH AUTOMATIC FAN CONTROL WITHOUT DASH SWITCH, NON ENGINE MOUNTED		
ALLIANCE FUEL FILTER/WATER SEPARATOR WITH INDICATOR LIGHT	15	
CUMMINS SPIN ON FUEL FILTER		
FULL FLOW OIL FILTER		
1400 SQUARE INCH VOCATIONAL RADIATOR ANTIFREEZE TO -34F, OAT (NITRITE AND SILICATE FREE) EXTENDED LIFE COOLANT GATES BLUE STRIPE COOLANT HOSES OR EQUIVALENT		
RADIATOR DRAIN VALVE		
LOWER RADIATOR GUARD		
DELCO 12V 39MT HD/OCP STARTER WITH THERMAL PROTECTION AND INTEGRATED MAGNETIC SWITCH		
<b>Transmission</b>		
EATON FULLER FR-14210B TRANSMISSION	-30	-10
<b>Transmission Equipment</b>		
NO TCU - AMT SHIFT CALIBRATION		
EATON ADVANTAGE 15-1/2 INCH SELF ADJUSTING CLUTCH		
TORQUE LIMITING CLUTCH BRAKE		
ZERK FITTING WITH EXTENSION HOSE AT CLUTCH RELEASE BEARING		
HYDRAULIC CLUTCH CONTROL		
ALUMINUM CLUTCH HOUSING		
NO PTO MOUNTING LOCATION SPECIFIED		

Description	Weight Front	Weight Rear
MAGNETIC PLUGS, ENGINE DRAIN, TRANSMISSION DRAIN, AXLE(S) FILL AND DRAIN		
PAINTED SHIFT LEVER, SOLID LINKAGE		
AIR TO OIL TRANSMISSION COOLER		
SYNTHETIC TRANSMISSION LUBE		
<b>Front Axle and Equipment</b>		
DETROIT DA-F-12.0-3 12,000# FF1 71.5 KPI/3.74 DROP SINGLE FRONT AXLE		
CONMET PRESET PLUS PREMIUM ALUMINUM FRONT HUBS		
MERITOR EX-L OPTIMIZED AXIAL AIR DISC FRONT BRAKES		
NON-ASBESTOS FRONT BRAKE LINING		
FRONT DISC BRAKE ROTORS		
FRONT BRAKE DUST SHIELDS		
FRONT OIL SEALS		
VENTED FRONT HUB CAPS WITH WINDOW, CENTER AND SIDE PLUGS - OIL		
FRONT AIR DISC BRAKE INTERNAL ADJUSTERS		
SINGLE POWER STEERING GEAR, BENDIX, 12- 13.3K		
2 QUART SEE THROUGH POWER STEERING RESERVOIR		
MINERAL SAE 80/90 FRONT AXLE LUBE		
<b>Front Suspension</b>		
12,000# DUAL TAPERLEAF FRONT SUSPENSION		
MAINTENANCE FREE RUBBER BUSHINGS - FRONT SUSPENSION		
FRONT SHOCK ABSORBERS		
<b>Rear Axle and Equipment</b>		
RS-21-160 21,000# R-SERIES SINGLE REAR AXLE		-2,250
CONMET PRESET PLUS PREMIUM ALUMINUM REAR HUBS		
2.93 REAR AXLE RATIO		
IRON REAR AXLE CARRIER WITH STANDARD AXLE HOUSING		
RPL25 MERITOR MAIN DRIVELINE	-20	-20
NO INTERAXLE (#3) DRIVELINE		-50
MERITOR EX-L OPTIMIZED AXIAL AIR DISC REAR BRAKES		-50

Description	Weight Front	Weight Rear
NON-ASBESTOS REAR BRAKE LINING		
BRAKE CAMS AND CHAMBERS ON REAR SIDE OF DRIVE AXLE(S)		
REAR DISC BRAKE ROTORS		
REAR BRAKE DUST SHIELDS		5
REAR OIL SEALS		
AIR DISC LONGSTROKE 1-DRIVE AXLE SPRING PARKING CHAMBERS		-20
REAR AIR DISC BRAKE INTERNAL ADJUSTERS		
MINERAL SAE 80/90 REAR AXLE LUBE		
STANDARD REAR AXLE BREATHER(S)		
<b>Rear Suspension</b>		
23,000# FLAT LEAF SPRING REAR SUSPENSION WITH RADIUS ROD		-410
8.5 INCH NOMINAL RIDE HEIGHT (430MM GLOBAL REFERENCE HEIGHT)		
STANDARD AXLE SEATS IN AXLE CLAMP GROUP		
NO REAR AIR SUSPENSION VALVE WIRING/LOGIC		
NO REAR CHASSIS SUSPENSION AIR PIPING FORE/AFT CONTROL RODS		
NO REAR SHOCK ABSORBERS		-80
<b>Brake System</b>		
WABCO 4S/4M ABS		
REINFORCED NYLON, FABRIC BRAID AND WIRE BRAID CHASSIS AIR LINES		
RELAY VALVE WITH 5-8 PSI CRACK PRESSURE, NO REAR PROPORTIONING VALVE		
WABCO SYSTEM SAVER 1200 HEATED AIR DRYER WITH PRESSURE CONTROL VALVE		
WABCO OIL COALESCING FILTER FOR AIR DRYER		
AIR DRYER MOUNTED UNDER HOOD		
STEEL AIR BRAKE RESERVOIRS		
PULL CABLES ON ALL AIR RESERVOIR(S)		
<b>Trailer Connections</b>		
NO ADDITIONAL TRAILER CABLE RECEPTACLE		
<b>Wheelbase &amp; Frame</b>		
3725MM (147 INCH) WHEELBASE		

Description	Weight Front	Weight Rear
8.0MM X 82.0MM X 281.0MM STEEL FRAME (0.32X3.23X11.06 INCH) 120 KSI	99,999	99,999
950MM (37 INCH) REAR FRAME OVERHANG		
FRAME OVERHANG RANGE: 31 INCH TO 40 INCH	10	-60
CALC'D BACK OF CAB TO REAR SUSP C/L (CA) : 71.65 in		
CALC'D FRAME LENGTH - OVERALL : 229.21		
FRAME HEIGHT TOP FRONT UNLADEN : -10.12 in		
FRAME HEIGHT TOP FRONT LADEN : 38.93 in		
FRAME HEIGHT TOP REAR UNLADEN : 41.88 in		
FRAME HEIGHT TOP REAR LADEN : 26.78 in		
SQUARE END OF FRAME		
STANDARD WEIGHT ENGINE CROSSMEMBER		
STANDARD CROSSMEMBER BACK OF TRANSMISSION		
STANDARD CAST ALUMINUM MIDSHIP		
STANDARD REARMOST CROSSMEMBER		
STANDARD SUSPENSION CROSSMEMBER		
STANDARD WEIGHT REAR SUSPENSION CROSSMEMBER		

### Chassis Equipment

UNPOLISHED ALUMINUM WST EQUIPMENT COVERS		
TEMPORARY STEEL BUMPER	-45	
REMOVABLE FRONT TOW/RECOVERY DEVICE, STORED ON CHASSIS FRAME	15	
CLASS 10.9 THREADED METRIC FASTENERS; REAR SUSPENSION HANGER TO BE HUCK-SPIN		
EXTERIOR HARNESES WRAPPED IN ABRASION TAPE		
NO TOOL/STORAGE BOX #1 MOUNTING LOCATION		
NO TOOL/STORAGE BOX #2 MOUNTING LOCATION		
NO TIRE PRESSURE CONTROL/SENSOR		
CHASSIS, MISC CUSTOM REQUIREMENTS-NONE		
NO ADDITIONAL LH MID-CHASSIS ROUTING & CLIPPING BRACKETS		
NO ADDITIONAL RH MID-CHAS ROUTING & CLIPPING BRACKETS		

Description	Weight Front	Weight Rear
<b>Fifth Wheel</b>		
NO FIFTH WHEEL RAMP		
<b>Fuel Tanks</b>		
60 GALLON/227 LITER ALUMINUM FUEL TANK - LH	-20	
25 INCH DIAMETER FUEL TANK(S) PLAIN ALUMINUM/PAINTED STEEL FUEL/HYDRAULIC TANK(S) WITH PAINTED BANDS FUEL TANK(S) FORWARD PLAIN STEP FINISH FUEL TANK CAP(S) EQUIFLO INBOARD FUEL SYSTEM HIGH TEMPERATURE REINFORCED NYLON FUEL LINE		
<b>Tires</b>		
CONTINENTAL HSR2 11R22.5 14 PLY RADIAL FRONT TIRES	16	
CONTINENTAL HSR2 11R22.5 14 PLY RADIAL REAR TIRES		32
<b>Wheels</b>		
MAXION WHEELS 90262 22.5X8.25 10-HUB PILOT 6.19 INSET 5-HAND STEEL DISC FRONT WHEELS	18	
MAXION WHEELS 90262 22.5X8.25 10-HUB PILOT 5-HAND STEEL DISC REAR WHEELS NO SPARE WHEEL NO ADDITIONAL SPARE WHEEL NO POLISHED, BRIGHT STANDARD POLISH, BRUSHED OR BRIGHT LVL ONE SPARE WHEEL FRONT WHEEL MOUNTING NUTS REAR WHEEL MOUNTING NUTS NO PUSHER/TAG WHEEL MOUNTING NUTS		36
<b>Cab Exterior</b>		
121 INCH BBC ALUMINUM CONVENTIONAL CAB STAINLESS STEEL CAB ACCENT MOLDING NO BAGGAGE DOOR NO SLEEPER DOOR FRONT FENDERS		

Description	Weight Front	Weight Rear
INTERIOR GRAB HANDLES WITH ADDED LOWER LH AND RH A PILLAR GRAB HANDLES		
BRIGHT HOOD MOUNTED AIR INTAKE GRILLE, BLACK SCREEN		
X-SERIES STEEL REINFORCED ALUMINUM CAB		
X-SERIES VOCATIONAL HOOD		
HOOD OPENING ASSIST WITH LOCKING STRUT		
PAINTED WESTERN STAR NAMEPLATES		
SINGLE AIR HORN UNDER LH DECK	-4	
SINGLE ELECTRIC HORN		
DOOR LOCKS AND IGNITION SWITCH KEYED THE SAME		
KEY QUANTITY OF 2		
REAR LICENSE PLATE MOUNT END OF FRAME		
LED LOW BEAM AND HIGH BEAM HEADLIGHTS		
ROOF MOUNTED LED MARKER LIGHTS		
DAYTIME RUNNING LIGHTS		
INDIVIDUAL LED STOP/TURN/BACKUP LIGHTS GROMMET MOUNTED BELOW RAIL		
LED SIDE TURN SIGNAL		
NO LOAD LOCK CARRIERS		
C-BAR MIRROR SYSTEM WITH DUAL HEATED MIRRORS WITH INTEGRAL CONVEX, DUAL REMOTE, STAINLESS STEEL BACK COVER, AND BLACK C-BAR		
102 INCH EQUIPMENT WIDTH		
LH AND RH CONVEX MIRRORS INTEGRAL WITH PRIMARY MIRRORS		
RH DOWN VIEW MIRROR		
STANDARD SIDE/REAR REFLECTORS		
NO SECURITY DEVICE		
UNPOLISHED ALUMINUM WST AFTERTREATMENT SYSTEM COVER		
NO SLEEPER VENT		
NO REAR WINDOW	-20	
NO SIDE SLEEPER CAP WINDOWS		
1-PIECE ROPED-IN SOLAR GREEN GLASS WINDSHIELD		
8 LITER (2 GAL) WINDSHIELD WASHER RESERVOIR, CAB MOUNTED, WITHOUT FLUID LEVEL INDICATOR		

**Cab Interior**

Description	Weight Front	Weight Rear
X-SERIES BASE INTERIOR TRIM LEVEL PACKAGE		
CHARCOAL BLACK VINYL BASE LEVEL INTERIOR		
CARBON WITH BASE BLACK ACCENT BLACK MATS		
(2) DASH MOUNTED POWER OUTLETS AND COIN TRAY		
FORWARD ROOF MOUNTED CONSOLE		
NO AUX ELECTRICAL VAULT CLEAR SPACE REQUEST		
LH AND RH DOOR STORAGE POCKETS INTEGRATED INTO MOLDED DOOR PANELS		
(2) COAT HOOKS ON BACKWALL OF CAB		
DIGITAL ALARM CLOCK IN DRIVER DISPLAY		
NO CUP/THERMOS HOLDER		
NO FIRE EXTINGUISHER		
STANDARD HEATER PLUMBING		
RADIATOR MOUNTED AIR CONDITIONER CONDENSER		
STANDARD INSULATION		
NO BAGGAGE COMPARTMENT LIGHT		
STANDARD LED CAB LIGHTING		
NO SLEEPER INTERIOR LAMP		
LH AND RH ELECTRIC DOOR LOCKS WITH AUTO UNLOCK FEATURE WHEN DOOR IS SET FROM OPEN TO CLOSED POSITION		
BLACK DOOR HANDLES		
NO AC 120V CAB WIRING AND AC OUTLET		
BASIC 2.0 HIGH BACK AIR SUSPENSION DRIVER SEAT WITH 1 CHAMBER AIR LUMBAR, INTEGRATED CUSHION EXTENSION AND TILT		
BATTERY BOX MID BACK NON SUSPENSION PASSENGER SEAT		
NO SEAT ARMREST		
BLACK MORDURA CLOTH DRIVER SEAT COVER WITH EMBROIDERED LOGO		
BLACK MORDURA CLOTH PASSENGER SEAT COVER WITH NO LOGO		
3 POINT ADJUSTABLE D-RING RETRACTOR DRIVER AND FIXED D-RING RETRACTOR PASSENGER SEAT BELTS		
NO SUPPLEMENTAL RESTRAINT SYSTEM		

Description	Weight Front	Weight Rear
4-SPOKE 18 INCH (450MM) BLACK STEERING WHEEL WITH SWITCHES  DRIVER AND PASSENGER INTERIOR SUN VISORS		

### Instruments & Controls

DIGITAL PANEL LAMP DIMMER SWITCH IN  
 DRIVER DISPLAY  
 EXTRA GRIP FOOT CLUTCH PEDAL PAD, NON-  
 ADJUSTABLE SUSPENDED PEDALS  
 ELECTRONIC ACCELERATOR CONTROL  
 STANDARD CENTER INSTRUMENT PANEL  
 BLACK GAUGE BEZELS  
 DUAL NEEDLE PRIMARY AND SECONDARY AIR  
 PRESSURE GAUGE  
 INTAKE MOUNTED AIR RESTRICTION  
 INDICATOR WITHOUT GRADUATIONS  
 ELECTRONIC CRUISE CONTROL WITH  
 CONTROLS ON STEERING WHEEL SPOKES  
 KEY OPERATED IGNITION SWITCH AND  
 INTEGRAL START POSITION; 4 POSITION  
 OFF/RUN/START/ACCESSORY  
 PREMIUM INSTRUMENT CLUSTER WITH 5.0  
 INCH TFT COLOR DISPLAY  
 HEAVY DUTY ONBOARD DIAGNOSTICS  
 INTERFACE CONNECTOR LOCATED BELOW LH  
 DASH  
 2 INCH ELECTRIC FUEL GAUGE  
 ELECTRICAL ENGINE COOLANT TEMPERATURE  
 GAUGE  
 NO ENGINE OIL TEMPERATURE GAUGE  
 NO TRANSMISSION TEMPERATURE GAUGE  
 ELECTRONIC OUTSIDE TEMPERATURE  
 SENSOR DISPLAY IN DRIVER MESSAGE  
 CENTER  
 ENGINE, TRIP AND PTO HOUR METERS  
 INTEGRAL WITHIN DRIVER DISPLAY  
 NO PTO CONTROLS  
 NO OBSTACLE DETECTION SYSTEM  
 NO VEHICLE STABILITY ADVISOR OR CONTROL  
 NO LANE DEPARTURE WARNING SYSTEM  
 ELECTRIC ENGINE OIL PRESSURE GAUGE  
 AM/FM/WB WORLD TUNER RADIO WITH  
 AUXILIARY INPUT, J1939

Description	Weight Front	Weight Rear
DASH MOUNTED RADIO		
STANDARD SPEAKER SYSTEM		
NO AM/FM RADIO ANTENNA		
POWER AND GROUND WIRING PROVISION OVERHEAD		
ROOF/OVERHEAD CONSOLE CB RADIO PROVISION		
SINGLE REMOTE SPEAKER WITH LEAD FOR 2- WAY RADIO		
SINGLE FIBERGLASS LH MIRROR MOUNTED CB ANTENNA WITH BRACKET AND LEAD		
HEADLINER MULTI-BAND ANTENNA: AM/FM/WEATHERBAND, WIFI/BLUETOOTH, GNSS/GPS		
NO ANTENNA-RADIO,UHF/VHF		
NO TELEVISION ANTENNA/PROVISION		
ELECTRONIC MPH SPEEDOMETER WITH SECONDARY KPH SCALE, WITHOUT ODOMETER		
ELECTRONIC 2500 RPM TACHOMETER		
DETROIT CONNECT PLATFORM HARDWARE		
TMC RP1226 ACCESSORY CONNECTOR LOCATED BEHIND PASSENGER SIDE REMOVEABLE DASH PANEL		
IGNITION SWITCH CONTROLLED ENGINE STOP		
NO HARDWIRE SWITCH #1		
NO HARDWIRE SWITCH #2		
NO HARDWIRE SWITCH #3		
NO HARDWIRE SWITCH #4		
NO SW RCPTS & WRG, ALTN CSL LOC		
NO PRE TRIP SYSTEM TEST		
2 INCH TURBO AIR PRESSURE GAUGE		
DIGITAL VOLTAGE DISPLAY INTEGRAL WITH DRIVER DISPLAY		
ROTARY HEADLAMP SWITCH, MARKER LIGHTS/HEADLIGHTS SWITCH WITH PULL OUT FOR OPTIONAL FOG/ROAD LAMPS		
ONE VALVE PARKING BRAKE SYSTEM WITH WARNING INDICATOR		
SELF CANCELING TURN SIGNAL SWITCH WITH DIMMER, HEADLAMP FLASH, WASH/WIPE/INTERMITTENT		

**Design**

Description	Weight Front	Weight Rear
PAINT: ONE SOLID COLOR		
<b>Color</b>		
CAB COLOR A: L0006EY WHITE ELITE EY BLACK, HIGH SOLIDS POLYURETHANE CHASSIS PAINT POWDER WHITE (N0006EA) FRONT WHEELS/RIMS (PKWHT21, TKWHT21, W, TW) POWDER WHITE (N0006EA) REAR WHEELS/RIMS (PKWHT21, TKWHT21, W, TW)		
<b>Certification / Compliance</b>		
U.S. FMVSS CERTIFICATION, EXCEPT SALES CABS AND GLIDER KITS		
<b>Sales Programs</b>		
STARQUOTE STOCK TRUCK SALES PROGRAM		

**T O T A L V E H I C L E S U M M A R Y**

<b>Weight Summary</b>			
	Weight Front	Weight Rear	Total Weight
Factory Weight <sup>+</sup>	108448 lbs	103570 lbs	212018 lbs
Total Weight <sup>+</sup>	108448 lbs	103570 lbs	212018 lbs

(+) Weights shown are estimates only.  
 If weight is critical, contact Customer Application Engineering.

(\*\*\*) All cost increases for major components (Engines, Transmissions, Axles, Front and Rear Tires) and government mandated requirements, tariffs, and raw material surcharges will be passed through and added to factory invoices.