



Shop Order

The Town of St. George's
 PO Box 250
 St. George's, NL A0N 1Z0

Deliver to Deer Lake, NL

Sales Rep: Jaques Pelletier Metalfab Ltd.	Terms: Chassis, body and equipment COD
Drawing #: FT-10661	Penalty: \$200 per business day after August 4.2020
Est. Delivery Date: / /	
Customer PO #: 20190903	
Customer #: 1628	
QPF #:	

Quote No: JSANL-0005
Job/Order No: 21183
 11/19/2019

PART NO	QTY	DESCRIPTION
	1	== <i>Metalfab Pumper - ULC 05/13 - 0.000</i> ==
	1	<i>Change Order A</i>
00-10-1500	1	Metalfab Pumper E
00-20-1000	1	Company Profile E
00-20-1500	1	Standard Body Warranty
00-20-1550	1	Metalfab Limited Ten (10) Year Paint and Corrosion Warranty
00-20-1600	1	<i>Waterous Pump Warranty - 5 years</i>
00-20-1800	1	Polypropylene Tank Lifetime Warranty
00-20-2000	1	Plant Visits - unlimited at customer expense
00-20-3000	1	No Bonding Required
00-20-3500	1	Certification for Fusion Welding of Aluminum
00-20-4000	1	<i>Quality System registered to ISO 9001:2015</i>
00-20-4500	1	Fire Apparatus Manufacturers' Association Membership
	1	GENERAL INFORMATION
10-11-0000	1	Intent E
10-11-0105	1	Vehicle Data Recorder not requested E
10-11-1100	1	<i>ULC S515-13 Compliance</i>
10-11-1500	1	ULC Testing - Pumper
10-11-2100	1	Maximum length not specified E
10-11-2200	1	<i>Maximum height - 119"</i>
10-11-2400	1	<i>Overall length is 30' or more</i>
10-11-2500	1	General Construction
10-11-3000	1	Manuals - two copies
		***Two copies of chassis manuals are required.
10-11-3600	1	<i>Delivery - FOB Fire Department by ERL</i> <i>Delivery 11 months from receipt of signed order (acceptance letter from St. George's dated September 04.2019).</i> <i>\$200 per business day after August 04.2020</i> <i>Deliver to Deer Lake, NL (as per Addendum # 2 of Tender)</i>
10-11-4200	1	<i>Payment Terms - Chassis and Body COD</i>
10-20-1400	1	<i>Hose capacity exceeding ULC/NFPA requirements</i> <i>Main hose bed capacity for:</i> <i>1500' of .2.5" hose</i> <i>400' of 1.5" hose</i>

PART NO	QTY	DESCRIPTION
		Additional weight allowance of 400 lbs
10-20-2000	1	Equipment carrying capacity - standard ULC Pumper
10-99-05AA	1	Digital pictures at various stages of build to be e-mailed Emailed to the Fire Commissioner
	1	CHASSIS INFORMATION
20-11-1000	1	Chassis supplied by Metalfab Freightliner M2 106 4-door cab 41,600 lb GVWR 14,600 lb front axle 27,000 lb rear axle Cummins L9 300 hp @2000 rpm 2200 governed rpm 248" wheelbase 135.61" cab to axle 860 lb/ft torque @ 1300 rpm Allison 3000 EVS automatic transmission, 275 amp alternator 189 litre fuel tank, LH Fixed steering column ESC L3240EB red Color has been approved by the Town Manager per email of October 01.2019 Wheels are N0006 EB Powder White
20-11-1500	1	2013 Emission chassis modifications
20-11-1600	1	Chassis Motor Vehicle Inspection as supplied by chassis dealer
20-21-0500	1	Fluid capacity plate
20-21-0600	1	Pumping test plate
20-21-1030	1	Maximum riders sign - 5 persons
20-21-1510	1	Seat belt warning labels - 4 door chassis
20-21-1560	1	Tire Pressure Indicators - Single Axle
20-21-1600	1	Apparatus Information Label An information label is provided in the chassis cab, visible to the driver, stating: "When manufactured, this vehicle was: ** m high ** m long ** kg GVW Changes in height since the apparatus was manufactured shall be noted on this plate by the Fire Department"
20-21-2000	1	Non removable key
20-21-2500	1	Shifter lock not required E
20-21-3500	1	Rear step warning label
20-21-3810	1	Front mudflaps provided with chassis E
20-21-4000	1	Rear mudflaps - Metalfab Logo
20-31-0200	1	Fuel fill label -Ultra Low Sulfur Diesel only
20-31-1100	1	Alum tread fuel tank covers, diamond grip steps, Conv - 4 dr
20-31-1900	1	Chassis cab painted by chassis OEM
20-31-6000	1	Stainless steel wheel covers - single axle
20-31-7500	1	Console in cab Install switch panel (50-11-0900), siren (50-11-1400), On-Spot traction chains control (20-41-5500), controls for Go-Lights (50-21-3040), and pump shift (30-51-0500) in console. Storage area with hinged cover and lift and turn latch provided at rear of console. Gray Zolatone finish
20-41-0600	1	Intake air shutoff for engine not required
20-41-0900	1	Auxiliary braking system disabled when pumping
20-41-1100	1	Transmission programming - Allison WT
20-41-1500	1	Extend exhaust pipe - RS front of rear wheels E Engineering to specify exhaust pipe material as required by the chassis manufacturer. Engineering to sign off on the exhaust configuration to make sure it meets the chassis manufacturer's emission specifications. *** Heat deflector required between exhaust pipe and compartment floor***

PART NO	QTY	DESCRIPTION
20-41-1900	1	Battery boost terminals with chassis E
20-41-2000	1	Chassis batteries remain in OEM location
20-41-2510	1	Fuel fill at step fuel tank under cab
20-41-2600	1	Chassis fuel tank remains in OEM location
20-41-5000	1	Rear Tow Hooks - under body *** Flat bar tow hooks under rear step (2)
20-41-5500	1	ON SPOT Automatic traction chains Switch located in cab console 20-31-7500. Operating range is 2 to maximum 35 MPH. The chains may be engaged when traveling at speeds up to 25 MPH. The above statement is the performance standard - does not mean chains automatically drop out above 35 MPH.
20-51-0710	1	Master Battery Disconnect included with Freightliner chassis
20-51-2500	1	Back up alarm included with chassis Self adjusting type
20-51-3100	1	Air inlet not requested
20-51-3400	1	Protection valve installed for air operated accessories
20-51-6200	1	120 volt 20 A shore line connection in chassis cab Standard 5-20R duplex receptacle in chassis cab, not fused On back wall of chassis cab for battery conditioner to plug into.
20-51-66AA	1	Kussmaul Autocharge 2000 dual battery conditioner and 12 Volt compressor Battery charger (1030840) located under/behind rear seat Compressor (1034005) located inside the pump house, easily accessible through the right side pump access door. One side wired to the chassis batteries, one side wired to the portable generator battery (through a quick connect at the generator). Ref SOPT #910 - truck specific
20-51-7101	1	Electric System Management - VMUX
20-51-7500	1	Super Auto eject for 120 v - 20 A with sealed enclosure Located on left side pump panel.
20-51-8510	1	Engine compartment light LED (ea) Two lights required. Switched with park brake
20-51-9001	1	Air horns as supplied by chassis dealer Chassis is supplied with air horns on hood controlled by dual lanyards in cab.
20-52-3500	1	Chassis steering wheel lined up by Metalfab E
20-60-0400	1	Chassis wheelbase does not change
	1	PUMP AND PLUMBING
30-12-3900	1	Packing for Waterous pumps
30-12-5500	1	Waterous CS single stage 1050 IGPM For ordering purposes; See 30-31-4010 re short suction tubes. See 30-12-3900 re packing for pump
30-15-0204	1	Plumbing - Waterous manifold pump SM SS E
30-20-0500	1	Valves and controls - side mount panel
30-20-1003	1	Elkhart valves specified
30-20-1600	1	Piping stainless steel - general
30-20-1700	1	1-1/2" thread specifications NPSH
30-20-1800	1	2-1/2" thread specifications - 3.25 x 5V (Sharp V) Customer called 11.08.2019 to confirm thread specifications which are 5 Threads per Inch (TPI) and 3-1/8" Outside Diameter

PART NO	QTY	DESCRIPTION
30-20-2000	1	Piping hydrostatic test
30-20-2500	1	Anodes in suction and discharge piping Install one anode on discharge side of pump, one anode on suction side of pump - do not use teflon tape or thread sealant. Paint flange silver and mask brass anode before painting for visibility.
30-21-5560	1	Tank to Pump SS 3" w/ check valve manifold pump
30-22-0520	1	Tank Fill valve 2" SS
30-31-4010	1	Suction - 6" not gated each side manifold pump The suction tubes on the midship pump will have "short" suction tubes to allow for installation of adapters without excessive overhang. (i.e. minimum 2" clearance between panel and CP Cap
30-32-7535	1	Suction - 2-1/2" left side SS, bleeder, Waterous manifold pump
30-32-8035	1	Suction - 2-1/2" right side SS, bleeder, Waterous manifold pump
30-41-2025	1	2-1/2" RS discharge SS, bleeder, Waterous manifold pump
30-41-2525	2	2-1/2" LS discharge SS, bleeder, Waterous manifold pump
30-43-1520	1	2-1/2" rear discharge SS, plumbed 2-1/2", bleeder The discharge outlet piped to the rear of the hose bed, on driver's side, installed so proper clearance is provided for spanner wrenches or adapters.
30-44-0520	2	1-1/2" crosslay (each) SS, 2" valve, bleeder Each bed to carry 200' of 1.75" DJ hose and nozzle. The floor will be aluminum slats with unistruts to make the dividers adjustable. This will match the main hose bed layout. Equipped with stainless steel rollers on each end for easier hose removal.
30-44-6520	1	Piping for monitor SS, plumbed 3", bleeder Make and Model of Monitor - Elkhart Vulcan model 8500-02 (ref 80-99-10AA) Mount in center of pump house ahead of the body - must allow 360-degree use of the monitor
30-51-0500	1	Pump shift-Midship air ***Includes "Pump Engaged" and "OK to Pump" indicator lights in cab. ***Includes "Throttle Ready" indicator light on Pump operating panel
30-51-0700	1	Pump Gearbox mounted manual over ride for pump shift E
30-51-6640	1	Class One "TPG Plus" Governor/Throttle
30-51-7000	1	Suction side relief V/V, manifold pump
30-51-7500	1	Primer electric vane type 12V with oil tank Waterous Indicator light on panel to show when primer is operating
30-51-8100	1	Heat exchanger included with chassis
30-52-1000	1	Master drain V/V, 12 port
30-52-2000	1	Drain valve for foam system header
30-52-5510	1	Foam system-Hypro FoamPro 2001 Single Tank Foam system is plumbed to both 1.5" Mattydale discharges and the rear 2.5" discharge.
30-52-9100	1	Foam concentrate label at foam tank fill
30-52-9200	1	Foam System Instruction Plates
30-52-9400	1	NFPA Foam System certification test
		WATER AND FOAM TANKS
40-11-2100	1	Polypropylene water tank (Imperial gallons)
40-11-2200	1	Water tank capacity certification (tank manufacturer)
40-11-5000	1	Tank capacity 1000 Imperial Gallons
40-12-5000	1	Foam cell - 30 Imperial gallon
40-21-0500	1	3" tank to pump connection
40-22-0500	1	2" tank fill connection
40-23-0500	1	1" water level gauge connection
40-30-0500	1	Sump drain valve (3" gate valve) with linkage E Left side as not to interfere with drive lines or exhaust.

PART NO	QTY	DESCRIPTION
40-30-1000	1	Water Fill Box front left corner
40-31-0400	1	Rear dump valve not requested E
40-31-6050	1	Rear fill not requested E
	1	ELECTRICAL
50-11-0300	1	Base electrical system - multiplex E
50-11-0600	1	Warning Light Certification
50-11-0700	1	Low Voltage Electrical system test
50-11-0800	1	Low Voltage Electrical System Documents As required by ULC and NFPA standards
50-11-0900	1	Rocker switch panel with master warning switch ***Rocker switch assignments: MASTER -LIGHT BAR RED -REAR BEACONS -FLASHING WARNING -REAR FLOODS -Horn ring transfer switch (50-11-3500) -On Spot chains control switch (20-41-5500)
50-11-1400	1	Federal PA300 100 watt siren
50-11-1620	1	Siren speaker, 100 watt, in front bumper
50-11-2600	1	Siren to be accessible to driver and officer
50-11-27AA	1	Siren foot switch for officer A foot switch shall be installed for the Officer to activate the siren. SOPT #440 (truck specific, in file)
50-11-3500	1	Horn ring transfer switch The driver will have the option to control the siren/horn or the chassis horns from the horn button by means of a selector switch.
50-11-5812	1	Federal LPX53DS-NFPA light bar SOPT 798
50-11-6501	1	Rear Directional Light not required E
50-11-8900	1	Rear beacons-Federal Sentry (pr) 1 red, 1 amber Red on right side, amber on left side
50-12-5028	1	Front LED flashers (pr)-red Federal QL43-RR
50-12-5118	1	Rear LED flashers (pr)-red Federal QL43-RR
50-12-5218	1	Front side inter lts (pr)-red LED Federal QL43-RR
50-12-5318	1	Body side inter lts (pr)-red LED Federal QL43-RR
50-12-8000	1	Additional body side intersection light not required Distance between front and rear side intersection light does not exceed 25'
50-21-1505	1	Unity LED flood lights - to meet ULC Switched in cab and on light head These lights cannot be managed to shed as they are required for ULC SOPT #255a
50-21-25AA	2	Federal Commander COM120- ON-530-SW LED telescoping floodlight 120 Volt AC Located on front of pump house, one each side Switched on light head Include option for raised pole indicator switch (SW) - wired to the door ajar warning light in cab ***Order option for "No-Scratch" if available*** SOPT in file
50-21-3040	2	GoLight Model 3067 wireless CR5 Pentabeam White in color

PART NO	QTY	DESCRIPTION
		Located top of cab (forward) - one left side, one right side. Control to be located and secured in 20-31-7500 console area in cab. SOPT #572
50-21-5100	1	Compartment lighting - LED tube lights in each compartment (rollup doors)
50-21-5600	1	Door Ajar warning light with buzzer E Located in overhead console over drivers seating position to indicate when a door is open or a Telelight is not stowed properly. Bilingual warning label in cab to read: "Do Not Move Apparatus when Light is on"
50-21-8001	1	Step lights for body steps - 4" LED Switched when park brake is set.
50-21-8201	1	Step lights for chassis steps - LED Switched when park brake is set. SOPT #194
50-21-8300	1	12" LED Lumabar for rear step/platform - as required Switched when park brake is set. SOPT #307b
50-21-8600	1	LED clearance lts and reflectors
50-21-8800	1	LED intermediate turn signal/clearance/reflector length >30'
50-22-0700	1	Whelen 64 LED tail/brake-turn-backup module (pr) ***Installed on aluminum treadplate tail light standoff boxes outboard of beavertails***
50-31-65AA	1	Hose bed lighting - LED on front partition Switched when park brake is set. SOPT #958
50-31-6610	1	Ground lighting (4" LED) - 4 door chassis Switched when park brake is set.
50-31-6620	1	Ground lighting (4" LED) - side mount body Switched when park brake is set.
50-31-7000	1	LED work light for crosslay hose beds LED requested by the Customer. Switched when park brake is set.
50-35-0560	1	VHF antenna with base - commercial chassis Located center of roof behind light bar unless otherwise specified. Minimum 2' cable provided at center front cab area for Fire Department use - clearly labeled
51-31-2500	1	5000 watt portable generator, electric start, wired to chassis battery To be secured to sliding tray 60-31-8700 in left side rear compartment with quick release mechanisms for portable use. Battery is wired with quick disconnects to the Kussmaul 200 conditioner 20-51-66AA
51-31-3000	1	120 volt wiring for portable generator Note that Neutral is bonded to chassis ground. One (1) NEMA L5-20 weather-resistant outlet in each rear side fender well minimum 24" from grade will be installed Circuits for the 50-21-25AA telescoping lights Customer to specify if any additional circuits are required
51-31-4500	1	Dielectric strength test for line voltage system

PART NO	QTY	DESCRIPTION
	1	BODY
60-10-1400	1	Single axle extruded aluminum body
60-10-15AA	1	1" drop on lower edge of compartment floor - sweep out type SOPT 1236
60-10-4000	1	Tapered "beavertail" rear step supports E
60-10-4600	1	Painted fender surround E
60-10-4770	1	Removable stainless steel fender trim - single axle E
60-10-5400	1	Diamondback pumphouse steps
60-10-5430	1	Diamondback 19" rear step
60-10-6500	1	Bolt on extruded aluminum rub rail E No reflective requested in rub rails
60-11-0300	1	Front left side compartments full height E
60-11-0700	1	Front right side compartments full height E
60-11-1000	1	Rear left side compartments full height E *** Compartment to pass through to the back compartment ***
60-11-1400	1	Rear right side compartments full height E *** Compartment to pass through to the back compartment ***
60-11-2000	2	High side compartment (over 18") each
60-11-3200	1	Full Height Rear compartment *** Compartment to pass through to rear side compartments
60-11-5500	2	Rollup door - standard height Natural aluminum finish Includes magnetic door switch, LED tube lights, rubber bumpers to prevent pinch point
60-11-5520	5	Rollup door - full height Natural aluminum finish Includes magnetic door switch, LED tube lights, rubber bumpers to prevent pinch point
60-11-5655	2	Amdor pull straps - Flex-HD for L2 and R2 Order with doors
60-11-5660	5	Amdor pull straps - Flex-HD for L1, L3, R1, R3 and B1 Order with doors
60-31-4100	1	Extruded aluminum handrails Minimum 2" clearance from handrail to any surface
60-31-5500	1	Steps at rear of body (folding) - Integral LED lights Maximum height between steps is 18"
60-31-5600	1	Steps and grab handles at front of body next to pump panel Maximum height between steps is 18"
60-31-6510	1	Compartment matting - Turtle tile Turtle Tile requested in tender
60-31-8000	4	BA bottle compt (ea)-fender well
60-31-8700	1	Sliding tray (ea) - 400 pound capacity with open/close latch Located in left side rear compartment (forward most) sized for the portable generator. White reflective stripe is applied on the exposed edge for visibility when the compartment door is open
60-31-9600	14	Adjustable shelf (ea) Trays are installed in the following compartments Tray #1 - Left side front compartment - shallow depth Tray #2 - Left side front compartment - shallow depth

PART NO	QTY	DESCRIPTION
		Tray #3 - Left side compartment over rear wheels - full depth
		Tray #4 - Left side compartment over rear wheels - full depth
		Tray #5 - Left side rear compartment - shallow depth
		Tray #6 - Left side rear compartment - shallow depth
		Tray #7 - Right side front compartment - shallow depth
		Tray #8 - Right side front compartment - shallow depth
		Tray #9 - Right side compartment over rear wheels - full depth
		Tray #10 - Right side compartment over rear wheels - full depth
		Tray #11 - Right side rear compartment - shallow depth
		Tray #12 - Right side rear compartment - shallow depth
		Tray #13 - Back compartment - full depth
		Tray #14 - Back compartment - full depth
		White reflective stripe is applied on the exposed edge for visibility when the compartment door is open
60-32-3550	1	Two adjustable hose divider (each) Hand hold required in end
60-32-7500	1	Hose bed - aluminum Hose bed capacity: 1500' of .2.5" hose 400' of 1.5" hose
60-33-0000	1	Paint exterior - Imron Elite *** Paint code and colour red to match cab
60-33-0200	1	Undercoat vehicle with KROWN rust protection
60-33-0500	1	Paint chassis wheels job colour with silver trim E
60-33-1000	1	Paint pump and plumbing job colour
60-33-1500	1	Buffed finish compartment interior
60-33-2000	1	Lettering - no lettering provided
60-33-3000	1	Reflective stripe - 4" white 50% of perimeter each side and 25% of perimeter front
60-33-3310	1	Reflective stripe - red and yellow chevron at rear Minimum 90% of rear vertical surface
60-33-3500	1	Tarp over hose bed - black A hosebed cover will be provided and secured to top body flanges by quarter turn snaps at front of hosebed and Velcro on each side edge of the cover. A weighted flap will be furnished at the front of the cover, and Velcro straps will be provided on the rear of the cover to tie around the rear handrail. Color to be black.
60-33-3600	1	White reflective stripe - inside entry doors 96 square inches minimum inside each cab and crew cab entry door
60-33-4000	1	Tarp over crosslays - black A crosslay hosebed cover will be provided and secured to top body flanges by quarter turn snaps at each end of hosebed and Velcro on each side edge of the cover. A flap will be furnished on each end of the cover with Velcro straps to wrap around the hose bed rollers. Color to be black.
60-40-5500	2	Suction hose tube (each) with door For storage of the 80-11-5000 6" x 10' suction hoses. Located under the tee of tank, rear access, one left side and one right side. Door ajar switch required.
60-40-9000	2	Tube mount for ladders, with rear door One on the right side for the 24' two-section ladder 80-14-0500 One on the left side for the 14' roof ladder 80-14-5500, 10' pike pole 80-13-2500 and 10' attic ladder 80-14-8500.

PART NO	QTY	DESCRIPTION
		Door ajar switch required for each door.
60-41-1000	1	Pike Pole tube - rear access To be in the same ladder tube as the roof ladder and attic ladder
60-41-1500	1	Attic ladder tube - rear access To be in the same tube as the roof ladder and pike pole tube
	1	INSTRUMENTATION
70-11-0000	1	Warning Label on Pump Operator's Panel
70-11-0500	1	Side mount instrument panel No gauge or visual display can be higher than 84" above the operator's standing position Midpoint of any control cannot be higher than 72" above the operator's standing position
70-11-1500	1	Stainless steel instrument panels No gauge or visual display can be higher than 84" above the operator's standing position Midpoint of any control cannot be higher than 72" above the operator's standing position ***Right side pump panel to have lift and turn latches***
70-11-3200	1	Colour coded tags
70-11-4102	1	Stainless steel side panel hood left side Panel lights switched when park brake is set
70-11-4506	1	Diamondback grip type panel hood step right side Panel lights switched when park brake is set
70-11-5000	1	Standard cover over rear top of pump house - no storage
70-11-5500	1	Right side tread plate pump access door No opening dimension less than 18" Slot required for Primer level viewing
70-11-7500	1	Heat pan-aluminum
70-11-8000	1	Heater in pump compartment Switch located on left side pump operators panel
70-20-1120	2	4-1/2" compound gauge - dual face 0-400 To be within 8" of each other - edge to edge
70-20-2130	7	2-1/2" pressure gauge - dual face 0-400 Gauge to be no more than 6" from edge of the gauge to the center of the control.
70-20-2500	1	Primer control
70-20-3100	1	Class One Governor Control Throttle can be no lower than 42" and no higher than 72" from operator's standing position.
70-20-3500	1	Electric water level gauge on pump panel, Class One
70-20-6500	1	Test gauge panel Mount below the compound gauges for proper draining
70-20-7500	1	Heat exchanger control valve
70-21-1600	1	Electric Foam Level gauge not requested
70-21-5500	1	Panel readout for Battery Conditioner Located on left side pump panel.
	1	ACCESSORIES
80-11-5000	2	6" x 10' lightweight suction hose (ea) Tube mounted
80-12-2500	1	6" barrel strainer No mounted, shipped loose. Customer will mount in Customer supplied bracket.

PART NO	QTY	DESCRIPTION
80-13-0500	1	Rubber mallet No mounted, shipped loose. Customer will mount in Customer supplied bracket.
80-13-1500	1	Bar with bracket Located horizontally above rear step (below back compartment door opening)
80-13-2500	1	Pike pole, fibreglass handle - 10' long Tube mounted
80-13-3500	1	Axe, pick head, wooden handle and bracket Mounted as directed by the Customer, otherwise shipped loose with mounting brackets and fasteners.
80-13-3600	1	Axe, flat head, wooden handle and bracket Mounted as directed by the Customer, otherwise shipped loose with mounting brackets and fasteners.
80-14-0500	1	24' 2 section extension ladder PEL 24 Tube mounted
80-14-5500	1	14' aluminum roof ladder PRL-14 Tube mounted
80-14-8500	1	10' aluminum folding attic ladder FL-10 Tube mounted
80-18-0600	4	SCBA brkt w/strap - ZICO ULLH - crew cab mount
80-20-5015	5	Zico UHH1 Helmet holder - mounted P/n 1562378 Mounted as directed by the Customer, otherwise shipped loose with mounting fasteners. SOPT #426
80-99-10AA	1	Elkhart Vulcan 8500-02 monitor and CSW-L nozzle 8500-02 - Vulcan monitor with tiller handle 282-A - Stream shaper (NH thread) CSW-L - Select-O-Flow nozzle (NH thread) SOPT #1146 Installed on the 30-44-6520 piping