## FORM A: BID (See B8)

1.	Contract Title	SUPPLY AND DELIVER	RY OF A MOBILE COMMAND	VEHICLE
2.	Bidder			
		Name of Bidder		
		Usual Business Name of Bidd	er as it appears on Invoice (if different	from above)
		Street		
		City	Province	Postal Code
		Email Address of Bidder		
		Facsimile Number		
	(Mailing address if different)	Street or P.O. Box		
		City	Province	Postal Code
		GST Registration Number (if a	applicable)	
		The Bidder is:		
	(Choose one)	a sole proprietor		
		a partnership		
		a corporation		
		carrying on business un	der the above name.	
3.	Contact Person	The Bidder hereby auth the Bidder for purposes	orizes the following contact poof the Bid.	erson to represent
		Contact Person	Title	
		Telephone Number	Facsimile Number	
		Email Address		
4.	Definitions		sed in the Contract shall ha General Conditions and D3.	ave the meanings

5.	Offer	The Bidder hereby offers to perform the Work in accordance with the Contract for the price(s), in Canadian funds, set out on Form B: Prices, appended hereto.
6.	Commencement of the Work	The Bidder agrees that no Work shall commence until he/she is in receipt of a notice of award from the Award Authority authorizing the commencement of the Work.
7.	Contract	The Bidder agrees that the Bid Opportunity in its entirety shall be deemed to be incorporated in and to form a part of this offer notwithstanding that not all parts thereof are necessarily attached to or accompany this Bid.
8.	Addenda	The Bidder certifies that the following addenda have been received and agrees that they shall be deemed to form a part of the Contract:
		No Dated
		·
9.	Time	This offer shall be open for acceptance, binding and irrevocable for a period of sixty (60) Calendar Days following the Submission Deadline.
10.	Indigenous Self- Declaration	The City is requesting that Bidders identify if their business is at least 51% owned by one or more Indigenous persons of Canada.
		YES, 51% or more Indigenous ownership
		NO, it is not
		This information is being gathered for statistical purposes only and will not be used for purposes of evaluation.

11.	Signatures	The Bidder or the Bidder's authorized official or o	officials have signed this
		day of	, 20
		Signature of Bidder or Bidder's Authorized Official or Officials	
		(Print here name and official capacity of individual whose sign	nature appears above)
		(Print here name and official capacity of individual whose sign	nature appears above)

## **FORM B: PRICES**

(See B9)

## SUPPLY AND DELIVERY OF A MOBILE COMMAND VEHICLE

## **UNIT PRICES**

ITEM NO.	DESCRIPTION	SPEC. REF.	UNIT	QUANTITY	UNIT PRICE
1.	Mobile Command Body	18070	Each	1	
2.	33,000 lbs. GVWR Conventional Cab & Chassis	18071	Each	1	

Name of Bidder	

## FORM N(R1): DETAILED SPECIFICATIONS 18070

#### MOBILE COMMAND BODY

## 1. <u>INTENT</u>

- 1.1 It is the intent of these specifications to describe a nominal 29'L x 8.5'W specialty body suitable for use as a mobile command vehicle including other equipment as described herein. The mobile command body shall be installed on a Class 7 regular cab and chassis vehicle to be supplied by the Contractor (see Detailed Specifications 18071 attached).
- 1.2 The mobile command body shall be the manufacturer's latest model, as may be modified by these specifications. The mobile command vehicle, including all auxiliary equipment, shall be furnished complete and ready for use. All parts not specifically mentioned but which are required for the complete unit shall conform in strength, quality of material and workmanship, to the best standards and engineering practice in the industry.
- 1.3 It will be the responsibility of the Bidder to inform the City of any errors or omissions in these specifications, for under this Contract, the Contractor shall be held responsible to ensure that the manufacturer will be responsible for the design, performance, reliability and satisfactory operational function of the unit.
- 1.4 The ratings specified herein merely state the minimum values acceptable to the City, not implying that those values are sufficient for the design of the particular equipment being bid.

### 2. OTHER SPECIFICATIONS AND STANDARDS

- 2.1 All applicable SAE Standards form an integral part of the chassis specifications and shall have precedence in any conflict concerning minimum acceptable standards.
- 2.2 The complete mobile command vehicle shall comply with the applicable regulations:
  - Manitoba Highway Traffic Act
  - Canadian Motor Vehicle Safety Standards, CMVSS Transport Canada
  - National Safety Mark, NSM
  - Manitoba/Winnipeg Safety and Health Act, Parts 12, 22
  - Canadian Standards Association, CSA
  - Under Writers of Canada, U/L
  - Society of Automotive Engineers, SAE
- 2.3 All welding and welding designs of the load supporting elements shall conform to the requirements of the Canadian Standards Association Standard (CSA) W47.1-03 and W59-03.
- 2.4 The completed vehicle shall be complete with a National Safety Mark, NSM.
- 2.4.1 **State** NSM Number:

## 3. **QUALIFICATIONS OF MANUFACTURER**

3.1 The manufacturer of the mobile command body shall have a minimum of five (5) years continuous experience manufacturing and installing emergency services bodies and equipment of the type being offered. The manufacturer shall have in effect a complete and documented quality control program ensuring the compliance with all applicable standards and shall be ISO 9001 certified..

## 4. QUALIFICATIONS OF THE BIDDER

- 4.1 The Bidder shall be a manufacturer or authorized distributor/supplier of customized truck bodies and specialty equipment bodies.
- 4.2 For the purposes of Warranty repairs, the Bidder shall have an authorized service facility located within 10 km of the boundaries of the City of Winnipeg. The facility, or major portion thereof, shall be dedicated to the installation, service, and maintenance of customized specialty bodies and equipment being offered.
- 4.3 Further to B11, Bidders shall provide a description of the facility including, but not limited to, number of qualified staff, years of service experience on specialty bodies, and general service capabilities within three (3) Business Days upon request of the Contract Administrator.

### 5. INSTRUCTIONS FOR COMPLETION OF SPECIFICATIONS

- All items in these specifications must be answered indicating compliance or non-compliance. Bidders shall, state "yes" for compliance or state deviation, or give a reply where requested to do so. Deviations and/or equivalents shall be clearly stated and fully detailed. Deviations and/or equivalents will be considered subject to evaluation. In every instance where a brand name or design specification is used, the City will also consider deviations and/or equivalents.
- 5.2 Each Bidder is required to fill in every blank. **Failure to do so may be used as a basis for rejection of bid.**

Provide five (5) references where this equipment is used in a working environment where climatic conditions are similar to the City of Winnipeg.

## 7. MAKE AND MODEL

**REFERENCES** 

6.

7.1 State make and model of mobile command body being bid:\_\_\_\_\_

### 8. CAB AND CHASSIS

The cab and chassis shall be a new, 2019 or 2020 regular cab and chassis complying with Detailed Specifications 18071 in accordance with the instructions given.

## 9. <u>BODY DIMENSIONS</u>

9.1	Body length, interior (measured to front wall) – 29 ft. approx., <b>state</b> length.	
9.2	Body height, interior – 80 in. approx., <b>state</b> height.	
93	Floor height – 38 in approx <b>state</b> height	

9.3 Floor neight – 38 in. approx., **state** neight.

9.4 Overall height – **state.** 

9.5 Body width, exterior – 100 in. approx., **state**.

# 10. TRUCK BODY, EXTERIOR

10.1	Exterior sidewall material – fiberglass composite with gel-coated, then painted with an automotive clear coat finish, <i>OR</i> modular body constructed of aluminum, fully welded into an integral structure. <b>State</b> body construction method.	
10.2	Roof material – capable of supporting two (2) people of average weight of 180 lbs., covered with diamond plate or equivalent for added support and increased traction. <b>State</b> roof construction materials.	
10.2.1	Roof access ladder – rear mounted to allow access to roof c/w a locking hinged cover to prevent unwarranted roof access.	
10.3	Body frame – welded tubular steel or aluminum cage.	
10.4	Floor frame – welded steel or aluminum floor frame and mounting plates c/w heavy duty cross members.	
10.5	Wheel wells – shall include stainless steel wheel liners.	
10.6	Drive shaft guards – required.	
10.7	Frame and body frame to be primed with a suitable rust inhibitor primer.	
10.8	Underbody to be foam sealed and undercoated.	
10.9	Insulation – 1-2 in. polystyrene foam board insulation or two-part expanding foam. <b>State</b> insulating material being bid.	
10.10	Entry door – single door, centrally located on the passenger side, flush with the side of the body, right side hinged.	
10.10.1	Door opening dimension – approx. 29"W x 78"H.	
10.10.2	Door window – one (1) approx. 18"W x 30"H, frosted safety glass with applicable labels.	
10.11	Exterior washroom door – located at the rear passenger side with the washroom accessible from the exterior of the truck body.	
10.11.1	Door opening dimension – approx. 29"W x 78"H.	
10.12	Door handles – flush-mounted, paddle type handles on interior and exterior of doors, chrome or stainless steel, lockable with keys and remote keyless entry.	
10.13	Door keys – four (4) sets required.	
10 14	Door latches – heavy duty rotary latches, slam lock, 2-stage latched at top	

	and bottom, Eberhard Mfg. or equal. Latches shall have adjustable rods (cable actuated latches are not acceptable). Striker pins shall be recessed on the top and bottom of the door opening such as not to protrude into the door opening area.	
10.15	Rear door stay – designed to hold rear door in fully opened position, "Grabber" U-style (Cast Products Inc.) or equivalent.	
10.16	Weather stripping – bulb type automotive style.	
10.17	Entry assist handle – one (1) aluminum or stainless steel grab handle with rubber insert, approx. 24 in. length, located for ergonomic entry and egress of truck body.	
10.18	Rear bumper – full width, heavy duty steel construction bumper, tapered ends, powder coated and rear tow hooks.	
11.	EXTERIOR COMPARTMENTS AND EQUIPMENT	
11.1	For the purpose of these specifications:	
	L – Length, along or parallel to chassis frame rails. H – Height or vertical.	
	D – Depth on horizontal plane across chassis.	
11.2	Diesel generator compartment – 12.5 kW Onan diesel generator or equivalent, mounted on a slide-out tray on the driver's side of the body. Compartment door(s) to be louvered, vertically hinged and lockable. Fuel for the generator shall be supplied from truck fuel tank. State make and model of generator being bid.	
11.3	Exterior slide-out storage areas – three (3) storage area compartments provided, two (2) located on the passenger side and one (1) at the rear of the driver's side. All compartments to be equipped with heavy duty slide-out trays for ease of access to tools and equipment.	
11.4	Plumbing compartment – located on the passenger side rear compartment to house all plumbing components. Components to include a fresh water holding tank, an electric pump for the water system and an electric heater for the hot water. The system will include an easy access external fill valve to fill the water system without having to open the compartment. A blackwater tank will be heated and include a blackwater drainage system.	
11.5	Exterior electrical compartment – located on the driver's side housing a deep cycle battery, electrical, plumbing, and HVAC components.	
11.6	Vertical doors shall have a rigid type door spring or a gas strut.	
11.7	Door hinges and latches – stainless steel or aluminum with adjustable striker plates.	
11.8	Compartment door handles – stainless steel paddle type handle with lock and four (4) sets of keys. Tri-Mark, Eberhard or equivalent in accordance with B6. Substitutes.	
11.9	All compartment door openings shall be sealed using automotive, bulb type, rubber gaskets.	
11.10	Drip mouldings – required above each door opening where applicable.	

11.11	Compartment door handles –stainless steel paddle type handles with locks, keyed alike with Compartment 1 and rear door. Tri-Mark, Eberhard or equivalent.
11.12	Compartment door hardware – chrome or stainless steel with adjustable striker plates.
11.13	Rubber bumpers required on exterior door compartments where applicable.
11.14	Washroom – accessible from the rear, passenger side exterior of the truck body, 29 in. door width approx., small frosted window. The rear washroom shall include a fully functional RV style toilet, sink with all associated plumbing to operate the system and connect it to the water tank located underneath the vehicle. Sink to include an electric pump with both hot and cold water. Washroom to include an exhaust fan, soap and paper towel dispenser, heated by a 110V heater as well as ventilated heat from the main compartment heating system.
11.15	Main entry door – installed centrally on the passenger side with a clear opening width of 29 in The door shall include a deep tinted window, 18"W x 30"H approx A door stop/hold-open device shall be provided to prevent the door from exceeding its opening width and hold the door open when required.
11.16	Entry steps – required for washroom and main entry door consisting of either hydraulically folding exterior steps or interior step wells. Entry steps shall be designed for ergonomic entry/egress c/w large grab handles. State details of entry step design.
12.	INTERIOR EQUIPMENT
<b>12.</b> 12.1	INTERIOR EQUIPMENT  Interior height – 78 in. approx., state height.
12.1	Interior height – 78 in. approx., <b>state</b> height.  Interior floor material – heavy duty smooth black rubber floor or equivalent seamless non-skid flooring. The joints where the floor and cabinets/wall meet shall roll up 90 degrees to prevent seepage of fluids under the
12.1 12.2	Interior height – 78 in. approx., <b>state</b> height.  Interior floor material – heavy duty smooth black rubber floor or equivalent seamless non-skid flooring. The joints where the floor and cabinets/wall meet shall roll up 90 degrees to prevent seepage of fluids under the cabinets/wall.  Ceiling and side wall material – white, moisture and impact resistant
12.1 12.2 12.3	Interior height – 78 in. approx., <b>state</b> height.  Interior floor material – heavy duty smooth black rubber floor or equivalent seamless non-skid flooring. The joints where the floor and cabinets/wall meet shall roll up 90 degrees to prevent seepage of fluids under the cabinets/wall.  Ceiling and side wall material – white, moisture and impact resistant fibreglass reinforced plastic panels or equivalent, <b>state</b> material.  Fire extinguisher – one (1) 5 lb. installed in the kitchen area and one (1)
12.1 12.2 12.3 12.4	Interior height – 78 in. approx., state height.  Interior floor material – heavy duty smooth black rubber floor or equivalent seamless non-skid flooring. The joints where the floor and cabinets/wall meet shall roll up 90 degrees to prevent seepage of fluids under the cabinets/wall.  Ceiling and side wall material – white, moisture and impact resistant fibreglass reinforced plastic panels or equivalent, state material.  Fire extinguisher – one (1) 5 lb. installed in the kitchen area and one (1) 5 lb. located in the front area.  Insulation – cavities between the interior and exterior body panelling and doors shall be filled with R8 insulation. Flooring shall have an R5 insulation
12.1 12.2 12.3 12.4	Interior height – 78 in. approx., state height.  Interior floor material – heavy duty smooth black rubber floor or equivalent seamless non-skid flooring. The joints where the floor and cabinets/wall meet shall roll up 90 degrees to prevent seepage of fluids under the cabinets/wall.  Ceiling and side wall material – white, moisture and impact resistant fibreglass reinforced plastic panels or equivalent, state material.  Fire extinguisher – one (1) 5 lb. installed in the kitchen area and one (1) 5 lb. located in the front area.  Insulation – cavities between the interior and exterior body panelling and doors shall be filled with R8 insulation. Flooring shall have an R5 insulation value.

	shelves each side hinged doors. Latches to be positive latches with locking mechanisms keyed the same as the cabinetry.	
12.7.1	Driver's side compartment – the storage compartment is intended for mounting and installing City owned and installed computer/Wi-Fi equipment. Compartment shall have two (2) 12V live battery connections and three (3) 110V outlets inside the cabinet. Exact locations to be determined at a pre-production meeting.	
12.7.2	Wiring access panel – a covered bulkhead/access panel running from driver's side workstation to cabinet for the purpose of running cabling after build is complete.	
12.8	Bench style seating – provided along the driver's side wall, 132 in. length approx., cushions to be 2 in. thick padded anti-microbial material that is easy to clean/disinfect. A padded backrest of similar material shall be provided. Bench seats shall be hinged to allow for inside storage with bench including a positive latch to ensure the bench top from opening during movement.	
12.9	Folding bench style seating – four (4) folding seats along the passenger's side wall, 126 in. approx., cushions to be 2 in. thick padded anti-microbial material that is easy to clean/disinfect. A padded backrest of similar material shall be provided. The seats shall be hinged to allow for inside storage. Folding seats shall be spring levered to automatically fold-up when not in use.	
12.10	Dry whiteboards – wall-mounted large whiteboards entire length and above the seats, driver's and passenger's side.	
12.11	Table – fixed table installed in the centre of the seating area, 120" x 21" approx., easily accessible from the driver's side seating. A second folding section 120" x 15" shall be mounted on the table. When folded up, the table top shall be easily accessible from the passenger side seating area. When both the table and seats are stored in the away position, there shall be 30 in. of clear isle space with no obstructions.	
12.12	Workstations – provided along driver's side wall aft of bench style seating, 60 in. L approx., two (2) overhead storage cabinets, two (2) LED overhead lights. Locations and termination points for radio and computer equipment at the workstation to be discussed at a pre-production meeting.	
12.12.1	Workstation chairs – two (2) caster type chairs c/w strap and buckle to the contain the chairs during transport.	
12.13	Bulkhead/divider door – located aft of workstation, separating the front seating/workstation area from the kitchen area. Pocket door opening to be approx. 30 in., and can be either latched or have a hold-open device to prevent the door from sliding while in transport.	
	Kitchen Area, Front to Back	
12.14	Counter area – approx. 72 in. L on passenger side wall, stainless steel surface providing a sink, refrigerator mounted underneath the countertop and a provision for a built in microwave.	
12.15	Cabinets – required below countertop and overhead cabinets. Storage compartment doors and drawers to include a positive latch system with locking capabilities. All cabinets and drawers to be keyed alike.	

12.16	Seating – bench seating provided along the driver's side and rear walls. Cushions to be 2 in. thick of padded material and covered with an antimicrobial material that is easy to clean. A padded backrest of similar composition shall be provided. Bench seats to be hinged to allow for inside storage.	
12.17	Table – provided for the bench seating area, 54"L x 33"W approx., permanently mounted to the floor and provide area for accessing bench seating from both sides.	
13.	ELECTRICAL & LIGHTING	
13.1	All vehicle lighting shall conform to C.M.V.S.S. (latest revision) and Manitoba Highway Traffic Act requirements.	
13.2	Supplier installed lighting to be LED Truck-Lite, Maxxima or equivalent in accordance with B6 Substitutes and shall include the following components: Specifications 13.3 to 13.8.	
13.3	Combination stop/turn/tail lights – two (2) per side (high and low mount) with mounting grommets, flush or recess mounted in rear of body.	
13.4	Turn signal flash rate – 70-90 flashes per minute.	
13.5	Back-up lights – one (1) per side with mounting grommets.	
13.6	3-light cluster – three (3) 2½ in. lights or penny lights c/w mounting grommets.	
13.7	Clearance lights – 2½ in. clearance lights or penny lights c/w mounting grommets.	
13.8	Licence plate lamp – LED c/w license plate bracket.	
13.9	Lighting harnesses – all harnesses shall be internally grounded, properly routed and secured, protected from damage.	
13.10	Junction box – Truck-Lite P/N 50400 or equivalent, complete with necessary compression fittings, required for all vehicle lighting harness connections, located inside rear of truck frame, protected from road debris including all harness connections.	
13.11	All plug in connectors shall be coated with a di-electric grease or anti- corrosion compound prior to assembly.	
13.12	Antennas and specialty cabling – City of Winnipeg supplied, to be installed by Contractor on vehicle roof. Access ports required for servicing antennas. Additional structural metal required for antenna ground plates. Exact locations and terminations to be discussed at pre-production meeting.	
	Note: Antennas and specialty cabling are the only City of Winnipeg supplied equi	pment.
13.13	Warning lights, body mounted – ten (10) Whelen C9LB and ten (10) C9LR lights or equivalent with chrome flanges, alternating flash patterns, mounted as follows:	
	i) Front facing – two red, two blue on front section.	
	ii) Rear facing – two red, two blue.	

	iii) Side facing, driver's side – three red, three blue.	
	iv) Side facing, passenger side – three red, three blue.	
13.14	Warning lights, grille mounted – two (2) Whelen ION T red, and two (2) Whelen ION Series blue or equivalent, front facing in truck grille.	
13.15	Warning lights shall be wired "hot" (i.e., able to use without the key on), wired through a single, chassis manufacturer's OEM dash mounted switch, labelled "Warning Lights" with a permanent type label.	
13.16	Traffic Advisor, rear facing – one (1) Whelen TANF85AA or equivalent, centre mounted at rear of body protected from accidental damage.	
13.16.1	Controller – in-cab mounted in an ergonomic location, wired "hot".	
13.17	Siren package – required with speaker, including one full function hands free siren, one (1) Whelen SA315 series with speaker bracket.	
13.18	Scene lights/flood lights – four (4) Whelen 900 Series or equivalent, flush mounted, two per side.	
13.19	All switches and warning lights shall be identified with permanent engraved type labels or chassis manufacturer's OEM labels. No labels allowed on upper surface of dash.	
13.20	Interior lights – ten (10) Truck-Lite, Maxxima LED lights or equivalent, six (6) mounted in the front seating/workstation area, three (3) mounted in the kitchen area, and one (1) mounted in the washroom. The ten (10) interior lights are in addition to the two (2) LED overhead lights above the workstation (previously specified). Exact locations of lights and switches to be determined at pre-production meeting.	
13.21	Generator – 12.5 kW quiet diesel generator including generator compartment and door, provisions required for serviceability. The generator shall have a remote start feature, accessible from the interior of the vehicle.	
13.22	Automatic charging relay – required.	
13.23	Body load disconnect switch – required.	
13.24	Electrical package – basic 110V, 50-Amp including 110V inlet, 30 ft. shore power cord c/w auto eject, 50-Amp electrical box, 50-Amp main breaker and 50-Amp transfer switch.	
13.25	Converter – 110V to 12V, 60 Amp with charger.	
13.26	Deep cycle batteries – two (2) Group 31 extreme duty batteries with volt meter, securely mounted to a stainless steel battery tray with hold-down clamps, isolated from main truck batteries.	
13.26.1	Battery compartment – vented to the outside of the compartment, batteries to be accessible on a stainless steel battery tray with slides. <b>State</b> location.	
13.27	Duplex receptacles, interior – twelve (12) required, three (3) kitchen area, two (2) at workstation, one (1) in the washroom, three (3) in the front driver's side interior compartment, and three (3) additional receptacles in the front	

	seating/workstation area. The receptacles shall be GFI, CSA approved
13.28	12 Volt DC outlet/USB power outlets – four (4) required, two at workstation and two (2) additional in the front section.
13.29	Duplex receptacle, exterior – two (2) required, one (1) mounted near rear of body passenger's side, and one (1) mounted near front of body passenger's side. The receptacles shall be GFI, CSA approved, weatherproof type, with a hinged cover.
13.30	Clock – a large digital clock to be mounted on the front wall of the front seating area above front walkthrough. The clock shall display hours, minutes and seconds with the numbers, 2½ in. or taller.
13.31	Roof mounted power vent – ceiling mounted above restroom, 3-speed fan, reversible airflow with controls.
13.32	Battery charger – to be installed to charge deep cycle batteries when the shoreline is connected or when the generator is running.
13.33	Master disconnect switch – to disable all electrical systems for repair or long-term storage. <b>State</b> location.
13.34	Door open light – indicator light in cab area illuminating when an exterior door is open.
13.35	Back-up camera – colour camera installed on rear of vehicle giving full range of view at rear. Display monitor to be 7 in., in-cab mounted.
13.36	Back-up alarm – 97 dBA located underneath near rear of vehicle in a location protected for damage or road spray. An auto reset or cut-off switch shall be provided in the cab at the front controls.
13.37	Auto levelers – to allow jacks to automatically level the vehicle, controls to be located in the compartment area next to the side entry door. An indicator light shall also illuminate in the cab when the levelling jacks are deployed and the truck engine is running.
13.38	All wiring installed by body manufacturer/installer (including accessories, work lights, etc.) shall be colour coded, loomed, properly secured and protected from damage.
13.39	All electrical connectors shall be crimped & soldered, then sealed with heat shrink tubing.
13.40	All joining of wires shall be soldered and sealed using heat shrink tubing (crimp-on electrical connectors for joining wires are not acceptable).
13.41	Any holes required to run wires through body, cab, steel sections, etc. shall be drilled (not punched), grommeted and sealed.
14.	INSTALLATION
14.1	The Contractor shall install the mobile command body onto the chassis specified in Detailed Specifications 18071.
14.2	Mounting of the body shall be in accordance with the chassis manufacturer's guidelines for body mounting including, but not limited to, guidelines for tire and suspension clearance

14.3	Welding to truck chassis frame is not permitted.	
14.4	Mounting brackets shall be bolted to chassis frame using Grade-8 fasteners.	
14.5	Any holes required in chassis frame web must be drilled and reamed to fit bolts.	
14.6	All non-continuous body seams (joints) shall be caulked with an automotive grade elastomeric sealant.	
14.7	Departure angle of completed unit – 12° approx. <b>State</b> angle.	
14.8	Overall height decal – engraved type, installed in chassis cab.	
14.9	Isolators – all interfaces between aluminum and steel are to be separated by $^{1}/_{16}$ in. thick rubber or neoprene sheet to prevent galvanic corrosion. Bolts used on aluminum or between aluminum and steel shall be bolted through with stainless steel bolts and non-conductive bushings.	
15.	MISCELLANEOUS	
15.1	Interior heater – Espar heating system or equivalent, as recommended from body manufacturer for extreme cold climate. Two (2) additional electric base board heaters are also required. <b>State</b> details of heating package being bid including makes and models of heaters.	
15.2	Roof mounted Air Conditioners – two (2) 13,500 BTU, c/w remote thermostat. State make and model being bid.	
15.3	Carbon monoxide monitor – required.	
15.4	Front console – manufacturer's recommended console including backlit, rocker type switches. Details of the proposed console to be discussed at pre-production meeting.	
15.5	Mudflaps – black, rubber with no insignia, required at all wheels.	
15.6	Mounting rails – roof mounted for the use of a ceiling mounted antenna.	
15.7	Escape hatch – roof mounted, <b>state</b> dimensions and actuation details.	
16.	COLOUR AND FINISH	
16.1	Van body – colour impregnated Gel-coat or primed and painted to match chassis cab colour.	
16.2	Floor, underside – steel and aluminum sections of deck, sub-frame and under body shall be undercoated with an asphalt and rubber based material, Proform or equivalent, applied as per manufacturer's recommendations.	
16.3	Rear bumper – black powder coated finish.	

16.4	Alum	inum or	stainless steel components, unfinished.		
17.	TECHNICAL DOCUMENTS AND MANUALS				
17.1	Bidders shall provide the following, within three (3) Business Days upon request of the Contract Administrator:				
17.1.1		Two (2) sets of three (3) view drawings showing complete unit including chassis, body and interior views.			
17.1.2			ont and rear axle weights of the complete unit (chassis, cluding full fuel, full water tank and two operators).		
17.1.3	Serv	ice facilit	ry description.		
17.1.4	Body	to frame	e mounting plans.		
17.2	Prior	to final i	nspection the Contractor shall provide the following;		
	a)		scale ticket of the completed unit, fully fuelled, including operators.		
	b)	Operate sets rec	or's manuals for cab & chassis and Onan generator – two (2) quired.		
	c)		nd maintenance manuals – two (2) sets required with the ng comprising a set:		
		i)	Maintenance manual.		
		ii)	Unit parts book.		
		iii)	Electric wiring diagram (as built) of the completed unit.		
	the u	ınit supp olete unti	manuals supplied with this Contract must be in English and shall lied. General purpose manuals are <u>not acceptable</u> . Contract will rill these sets of manuals have been delivered. Manuals must be sulivered. USB format preferred.	not be considered	
17.3	Bidde	er shall p	provide information on any manuals that are available in an electron	ic format.	
18.	DEL!	IVERY			
18.1	The F.O.I Mana fifty-	complete B with the agement two (52) act the C pment sh	ed unit shall be serviced, ready for operation and delivered e freight prepaid to the City of Winnipeg, Winnipeg Fleet Agency, 185 Tecumseh Street, Winnipeg, Manitoba within calendar weeks from the date of award. The Contractor shall contract Administrator prior to delivery of the equipment.		
18.2		e-delivery oment.	y inspection shall be performed by the Contractor on all		

19.	PERFORMANCE RELIABILITY	
19.1	The responsibility for the design of the complete I-DENT vehicle, its performance, and reliability shall rest upon the Contractor.	
19.2	The term "repeated failures" as used herein is defined to mean that the same component, subassembly, or assembly develops repeated defects, breakdowns and/or malfunctions rendering the vehicle inoperative, or requiring repeated shop correction, service, and/or replacement during the Warranty period applicable for said component, subassembly, or assembly. Minor items or ordinary service adjustments are not included, or considered under the scope of "repeated failures", as well as other factors, such as operational damage due to accidents, misuse or lack of proper maintenance, service and lubrication attention by not following the manufacturer's preventative maintenance schedules.	
19.2.1	Where the vehicle develops "repeated failures" in service, the Contractor shall make any necessary engineering changes, repairs, alterations or modifications in order to guarantee reliability of performance.	
20.	WARRANTY	
20.1	The warranty on the cab & chassis is listed in Detailed Specifications 18071.	
20.2	The Contractor shall provide all detailed published warranty information (including all exclusions) at the time of delivery of the equipment. <b>State</b> the following warranties:	
20.3	Body, exterior – <b>state</b> .	
20.4	Body, interior – <b>state</b> .	
20.5	Electrical, lighting, etc. – <b>state</b> .	
20.6	Generator – <b>state</b> .	
20.7	Finish, i.e., paint, gelcoat, powder coat, etc. – <b>state</b> .	
20.8	Provide details on any extended Warranty coverage available.	
	<u> </u>	

#### FORM N: DETAILED SPECIFICATIONS 18071

## 33,000 lbs. GVWR CONVENTIONAL CAB AND CHASSIS

### 1. <u>TYPE</u>

- 1.1 Shall be a Model Year 2019 or 2020, 33,000 lbs. GVWR, Regular Cab & Chassis suitable for use as a mobile command specialty body. The cab & chassis shall be furnished complete and ready for use with all features and equipment as described herein.
- 1.2 STATE YEAR, MAKE AND MODEL BEING BID:\_\_\_\_\_

### 2. OTHER SPECIFICATIONS AND STANDARDS

2.1 All applicable SAE standards form an integral part of these specifications and shall have precedence in any conflict concerning minimum acceptable standards.

Society of Automotive Engineers, SAE: <a href="http://en.wikipedia.org/wiki/Society\_of\_Automotive\_Engineers">http://en.wikipedia.org/wiki/Society\_of\_Automotive\_Engineers</a>

2.2 The completed unit and all its components shall comply with all C.M.V.S.S. and Manitoba Highway Traffic Act regulations and requirements including, but not limited to, a Manitoba Government Inspection with Safety Sticker on the driver's side window.

## 3. SERVICE FACILITY

3.1 For the purpose of warranty repairs, the manufacturer shall have an authorized service facility located within 10 km of the boundaries of the City of Winnipeg. The facility, or a portion thereof, shall be dedicated to the service and maintenance of the type equipment being offered. Further to B12, Bidders shall provide a description of the service facility including, but not limited to, number of qualified service staff, years of service experience, and general service capabilities within three (3) Business Days upon request of the Contract Administrator.

### 4. <u>INSTRUCTIONS FOR COMPLETION OF SPECIFICATIONS</u>

- All items in these specifications must be answered indicating compliance or non-compliance. Bidders shall state "yes" for compliance or state deviation, or give reply where requested to do so. Deviations and/or equivalents shall be clearly stated and fully detailed. Deviations and/or equivalents will be considered subject to evaluation. In every instance where a brand name or design specification is used, the City will also consider deviations and/or equivalents.
- 4.2 Each bidder is required to fill in every blank. Failure to do so may be used as a basis for rejection of bid.

ITEM 5.			BIDDER TO STATE "YES" OR STATE DEVIATION	
	GVWR			
5.1	Total	33,000 lbs.		
5.2	Front	12,000 lbs.		
5.3	Rear	21,000 lbs.		
	<b>Chassis Dimensions</b>			
5.4	Cab-to-axle	225 in. approx., suitable for 29 ft. mobile combody, <b>state</b> CA	mand	

5.5	Wheelbase	296 in. approx., suitable for 29 ft. mobile command body, <b>state</b> WB
	Engine	•
5.6	Туре	Diesel engine, Tier IV, <b>state</b> make, model and displacement
5.7	Horsepower	250 HP approx.
5.8	Torque	620 lbf-ft approx.
5.9	Engine shut down	Low oil pressure / high water temperature
5.10	Air intake warmer	Required
5.11	Fuel shut-off	Electric solenoid type
5.12	Air cleaner	Dry type
5.13	Air intake restriction inc	I. Dash mounted restriction indicator
5.14	Oil drain plug	Magnetic type
5.15	Oil filter	Full flow, spin-on or cartridge type
5.16	Fuel filter	Spin-on or cartridge type
5.17	Fuel/water separator	Heated, drainable, mounted under hood, located to be protected from road spray
5.18	Block heater	Immersion type, 1000 Watt with plastic, covered recessed male plug, located under driver's side door
5.19	Coolant	Extended life coolant, antifreeze to -35°F (-37°C)
5.20	Coolant hoses	Silicone type, Gates Blue Stripe or Premium type hoses
5.21	Fan Drive	Thermostatically controlled, automatic type
5.22	Air compressor	Water cooled, pressure lubricated, 13 cfm
	Electrical System	
5.23	Alternator	270 Amp, <b>state</b> make and model
5.24	Starter	Delco Remy 38MT HD or equivalent
5.25	Batteries	Three (3), 12-volt, group 31, 1950 CCA combined capacity
5.26	Battery Box	Under cab c/w enclosure, readily accessible
5.27	Battery disconnect	In-cab mounted, <b>state</b> location
5.28	Remote boost terminal	Remote battery boost terminal(s), protected from road spray, covered, <b>state</b> location
5.29	Cab marker lights	LED
5.30	Back-up alarm	Required, 97 dBA, located on inside-rear of frame rails
5.31	Accessory switches	Six (6) required, dash mounted for body installation, labelled and backlit
5.32	Radio circuit	Independent 20 Amp, 2-way radio circuit, ignition powered, wired under dash loose, labelled

	Exhaust System	
5.33	Configuration	Single horizontal muffler with horizontal tailpipe
	Transmission	
5.34	Model	Allison 2500 RDS Series
5.35	Shift selector	T-Bar shift selector, dash mounted
5.36	Cooling	Water to oil transmission cooler
5.37	PTO provision	Required with maximum clearance from exhaust
5.38	Oil level dipstick	Bayonet type with high and low level markings
5.39	Trans. drain plug	Magnetic type
	Front Axle	
5.40	Capacity	12,000 lbs. capacity
	Rear Axle	
5.41	Capacity	21,000 lbs. capacity
5.42	Ratio	For 110 km/hr top speed, <b>state</b> ratio
5.43	Differential lock	Required for rear drive axle w/dash mtd. switch
	Front Suspension	
5.44	Type	Taper leaf spring suspension, 12,000 lbs. capacity
	Rear Suspension	
5.45	Туре	Air ride suspension, 21,000 lbs. capacity, <b>state</b> make and model of suspension being bid
5.46	Susp. control valve	Manual dump valve for air suspension c/w dash mtd. switch and indicator light
5.47	Auto refill	Required at 5 km/hr
	Rims, Wheels, Hubs	
5.48	Front	22.5 x 8.25 polished aluminum, 10-bolt, hub piloted
5.49	Rear	22.5 x 8.25 polished aluminum, 10-bolt, hub piloted
5.50	Hubs	Aluminum hubs, front and rear
5.51	Hub seals	Oil lubricated front and rear
5.52	Wheel nut indicators	Required on every second wheel nut, front and rear
	Tires, front	
5.53	Size	11R 22.5
5.54	Make & model	Michelin XZE, Goodyear G662 RSA or equivalent 14-ply tires, <b>state</b> tires
	Tires, rear	
5.55	Size	11R 22.5
5.56	Make & model	Michelin XDE M/S, Goodyear G182 or equivalent 14-ply tires, <b>state</b> tires
	Frame	
5.57	Туре	Single or double rail, to match GVWR, 1,000,000 inlbs. RBM, outside frame clear

5.58	Application	Suitable for use with a 29 ft. mobile command body
5.59	Chassis fasteners	Grade-8 threaded hex headed frame fasteners or huck-spin fasteners
5.60	Afterframe	As required for mobile command body installation, 120 in. approx., <b>state</b>
	Steering	
5.61	Туре	Power
	Brakes	
5.62	Туре	Hydraulic, ABS, power with optional air supply
5.63	Air drier	Wabco System Saver 1200, heated
5.64	Moisture ejector	Bendix DV-2, heated, required in wet tank
5.65	Drain valves	Manual, chain or cable operated, required on each air tank
5.66	Parking brake	Dash mounted air operated parking brake knob
	Fuel Tanks	
5.67	Туре	Dual aluminum, 300 L combined capacity approx., fully fuelled upon delivery
5.68	Tank straps	Steel mounting straps with <sup>1</sup> / <sub>16</sub> in. rubber or neoprene isolators
5.69	Fuel separator	Heated, drainable, c/w primer pump
5.70	DEF tank	Diesel exhaust fluid tank, 25-35 L approx., state size and location
	Cab	
5.71	Туре	Conventional type, aluminum or steel w/corrosion inhibitor
5.72	Hood	Fibreglass tilt
5.73	Cab mounts	Air suspension
5.74	Cab interior/trim	Extreme climate insulation including cloth or vinyl headliner on roof, door panels and rear interior of cab
5.75	Cab silencer package	Required for minimal decibel level
5.76	Hood/Firewall/Engine	Insulated hood liner, engine cover and firewall
5.77	Floor covering	Rubber mat with under-padding
5.78	Floor mats	Two (2), rubber
5.79	Driver seat	High back, air suspension w/foldable right hand armrest, seat belt, heavy-duty cloth upholstery,  Cordura or equal, <b>state</b> material
5.80	Passenger seat	High back, air suspension w/foldable left hand armrest, seat belt, heavy-duty cloth upholstery, Cordura or equal, <b>state</b> material
5.81	Sun visors	Dual flip-up type

5.82	Steering wheel	Tilt type	
5.83	12-Volt power outlet	Required	
5.84	Radio	Factory installed AM/FM with Bluetooth <sup>®</sup> capability, auxiliary input and USB port	
5.85	Starter switch	Key operated c/w four (4) sets of keys	
5.86	Interior light	Dome light with driver and passenger door switches	
5.87	Heater / Defroster	High output, capable of keeping all windows clear at an outside temperature of -35°F (-37°C)	
5.88	Air conditioning	Required	
5.89	Brake & accel. pedals	Hanging type brake and accelerator pedals	
5.90	Horn	Dual electric	
5.91	Exterior mirrors	Dual West Coast, stainless steel or polycarbonate, 7" x 14½" approx.	
5.92	Convex mirrors	6 in. aux., stainless steel, mtd. below West Coast mirrors, or integral type with polycarbonate mirrors, one (1) per side	
5.93	Downview mirror	Located over passenger door, 5" x 4" approx.	
5.94	Windows & windshield	Tinted	
5.95	Windshield wipers	Electric, intermittent	
5.96	Windshield washers	Electric	
5.97	Grab handles	Dual exterior with rubber inserts	
5.98	Entrance steps	Dual each side, open grate / grip type	
5.99	Winter front	Heavy-duty vinyl w/twist lock or snap type fasteners	
	Instrumentation		
5.100	Oil pressure	Gauge	
5.101	Coolant temperature	Gauge	
5.102	Transmission oil temp.	Gauge	
5.103	LOP/HWT	Warning light and buzzer	
5.104	Voltmeter	Gauge	
5.105	Air reservoir pressure	Gauge with LAP warning light and buzzer	
5.106	Engine hourmeter	Required, non-resettable type	
5.107	PTO hourmeter	Required, non-resettable type	
	Tow Hooks		
5.108	Location	Front mounted	
	Front Bumper		
5.109	Туре	Chrome, full width c/w license plate provision	
	Colour and Finish		
5.110	Exterior	White	
5.111	Interior	Dark grey or black	

5.112	Frame & suspension	Primed and finished with black Imron 5000 paint or equivalent	
	Accessories	•	
5.113	Flare kit	Three (3) triangular reflectors, CVSA approved	
5.114	Fire extinguisher	5 lb. ABC type, required in cab with mounting bracket	
5.115	First aid kit	Required, Provincial 1 approved kit, supplied loose	
	Manuals		
5.116	Operator's manual	Required, one (1) per vehicle	
5.117	Parts/Repair/Service	Required, including preventative maintenance schedules for life of unit, USB or online manuals preferred	
	Warranty	p. 5. 5. 5. 5. 5. 5. 5. 5. 5. 5. 5. 5. 5.	
5.118	Chassis warranty	The Contractor shall provide all detailed published Warranty information (including all exclusions) at the time of delivery of the equipment. <b>State</b> the following:	
5.119	Basic vehicle	State	
5.120	Batteries	State	
5.121	Drivetrain	State	
5.122	Cab structure/corrosion	State	
5.123	Frame & crossmembers	s State	
5.124	Cab paint	State	
5.125	Engine	State	
5.126	Towing coverage	State	
5.127	Transmission	State	
5.128	Axles, front & rear	State	
5.129	Exhaust system	State	
	Delivery		
5.130	Delivery point	Equipment shall be serviced, ready for operation and delivered F.O.B. with the freight prepaid to the WFMA 185 Tecumseh Street, Winnipeg, Manitoba	
5.131	Delivery time	Within 52-calendar weeks from the date of official notification of award of contract. Equipment shall be delivered within 8:00 am and 3:00 pm on Business Days	
5.132	Delivery contact	The Contractor shall contact the Contract Administrator prior to delivery of the equipment	
5.133	PDI	A pre-delivery inspection shall be performed by the Contractor on all equipment	