# DOCUMENT FOR INCOMPLETE VEHICLE APPLICABLE TO THE 2018 MODEL YEAR FULL SIZE VAN (G-VAN)

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## DO NOT REMOVE

THIS DOCUMENT MUST REMAIN WITH THIS VEHICLE UNTIL IT IS CERTIFIED AS A COMPLETED VEHICLE

## PLACE LABEL HERE

The Label affixed here includes the following information:

- the name of the incomplete vehicle manufacturer;
- the month and year the incomplete vehicle manufacturer performed its last manufacturing operation on the incomplete vehicle;
- the vehicle identification number (VIN);
- the Gross Vehicle Weight Rating (GVWR) expressed in kg (lb), intended for the vehicle when it is a completed vehicle;
- The Gross Axle Weight Rating (GAWR) expressed in kg (lb), intended for each axle of the vehicle when it is a completed vehicle, listed in order from front to rear.

This document is furnished as required by the Canada Motor Vehicle Safety Act and United States (U.S.) Federal Motor Vehicle Safety Regulations (FMVSR) to aid intermediate and final stage manufacturers in their determination of conformity of the completed vehicle with applicable Canada Motor Vehicle Safety Standards (CMVSS) and U.S. Federal Motor Vehicle Safety Standards (FMVSS). Also included are instructions which must be followed in order to assure that Environmental Protection Agency (EPA) and California Air Resources Board (CARB) emission certification requirements, U.S. National Highway Traffic Safety Administration (NHTSA) and Environmental Regulations and Enviromental Protection Agency (EPA) Greenhouse Gas Regulations are met.

The label attached to this document will indicate whether this vehicle was manufactured by General Motors LLC or by Navistar Inc. under a contractual agreement with General Motors LLC. All inquiries regarding the content of this document should be forwarded to General Motors LLC through the www.gmupfitter.com website

This document is not a substitute for knowledge and understanding of the requirements of the Canada Motor Vehicle Safety Act, Federal Motor Vehicle Safety Regulations (FMVSR), or applicable Canada Motor Vehicle Safety Standards (CMVSS) and Federal Motor Vehicle Safety Standards (FMVSS). Intermediate and final stage manufacturers should be familiar with the Regulations and Standards referred to above to be aware of their specific responsibilities as they relate to the final destination and sale of each incomplete vehicle.

Any intermediate or final stage manufacturer making material alterations to this incomplete vehicle during the process of manufacturing the complete vehicle should be constantly vigilant to recognize all the effects, either direct or indirect, on other components, assemblies or systems caused by any alteration. No alteration should be made to the incomplete vehicle that directly or indirectly results in any component, assembly or system being in nonconformance with any applicable Canada Motor Vehicle Safety Standard or Federal Motor Vehicle Safety Standard or Emission Regulation or Fuel Economy/Greenhouse Gas Regulation.

The statements contained in this Incomplete Vehicle Document are accurate as of the date of manufacture of the Incomplete Vehicle and can be relied on by any intermediate and/or final stage manufacturer as a basis for certification.

Printed in U.S.A. 2018 PART NO. 23380347

# INTRODUCTION

This document contains information relative to conformance of this incomplete vehicle with the following:

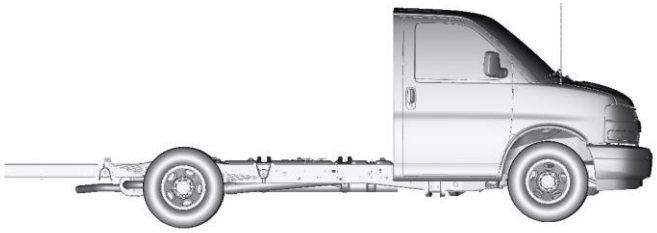
**Part I -** **FEDERAL MOTOR VEHICLE SAFETY STANDARDS AND CANADA MOTOR VEHICLE SAFETY STANDARDS**

**Part II -** **U.S. ENVIRONMENTAL PROTECTION AGENCY, STATE OF CALIFORNIA, AND CANADIAN EMISSION REQUIREMENTS AND NHTSA FUEL ECONOMY REQUIREMENTS**

# PART I

For the G Cutaway Van, refer to Part I, Chart A that follows. This section contains a list of Canada Motor Vehicle Safety Standards (CMVSS), and Federal Motor Vehicle Safety Standards (FMVSS), followed by a section entitled "Statements Regarding Canada Motor Vehicle Safety Standards (CMVSS), and Federal Motor Vehicle Safety Standards (FMVSS)". In the latter section, an appropriate statement of applicability is made for each standard, and by vehicle type, as it relates to the incomplete vehicle.

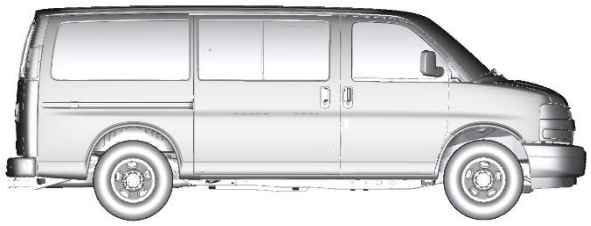
**G-VAN Cutaway**
**TYPE: Bus, School Bus, Multifunction School Activity Bus (MFSAB)[1], Multipurpose Passenger Vehicle[3], Motor Home, Ambulance[2], Truck**



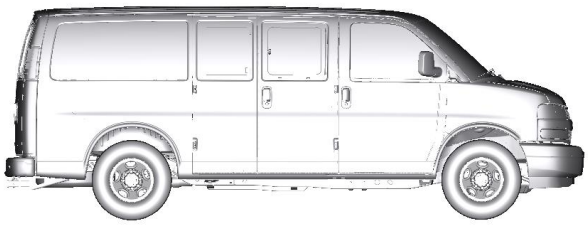
G-Vans, and G-Cutaway Vans that are built with specific Regular Production Option (RPO) or Special Equipment Option (SEO), may require additional statements of applicability. If required, the additional statements will be found under each affected CMVSS and/or FMVSS Standard.

**G-Van**

**Cargo Van**
**TYPE: Bus, Motor Home, Truck, Ambulance[2], Multipurpose Passenger Vehicle[3]**



**Passenger Van**
**TYPE: Bus, Motor Home, Truck, Multipurpose Passenger Vehicle[3]**



1. Type MFSAB should be completed from a Cutaway model with School Bus Option Package (&B3D).

2. Ambulance is a Canada Type ONLY.

3. If your completed vehicle is classified as a DOT multipurpose passenger vehicle and has a GVWR of 4536 kg (10,000 lb.) or less it may fall within the EPA definition of an MDPV. If so, it will not be covered by GM's MDV emissions certification. See the emission statements in Part II of this document.

The identifiers TYPE 1, TYPE 2 or TYPE 3 prefix the statements (of applicability) regarding Canada Motor Vehicle Safety Standards (CMVSS), and Federal Motor Vehicle Safety Standards (FMVSS). "Examples" of these statements follow:

**TYPE 1 A statement that the vehicle when completed will conform to the standard if no alterations are made in identified components of the incomplete vehicle. EXAMPLE: This vehicle when complete will conform to CMVSS 104 and FMVSS No. 104, Windshield Wiping and Washing Systems, if no alterations are made in the windshield wiper components.**

**TYPE 2 A statement of specific conditions of final manufacture under which the manufacturer specifies that the completed vehicle will conform to the standard. EXAMPLE: This vehicle when completed will conform to CMVSS 121 and FMVSS 121, Air Brake Systems, if it does not exceed any of the gross axle weight ratings, if the center of gravity at GVWR is not higher than ## feet above the ground, and if no alterations are made to any brake system component.**

**TYPE 3 A statement that conformity with the standard cannot be determined based upon the components supplied on the incomplete vehicle, and that the incomplete vehicle manufacturer makes no representation to conformity with the standard.**

In accordance with the requirements of Canada Motor Vehicle Safety Regulations, and Federal Motor Vehicle Safety Regulations Part 568.4, the following information is included on the label affixed to the front cover of this document:

- the name of the incomplete vehicle manufacturer;
- the month and year the incomplete vehicle manufacturer performed its last manufacturing operation on the incomplete vehicle;
- the vehicle identification number (VIN);
- the Gross Vehicle Weight Rating (GVWR) expressed in kg (lb), intended for the vehicle when it is a completed vehicle;
- the Gross Axle Weight Rating (GAWR) expressed in kg (lb), intended for each axle of the vehicle when it is a completed vehicle, listed in order from front to rear.

In addition, the final stage manufacturer is responsible under Canada Motor Vehicle Safety Regulations, and Federal Motor Vehicle Safety Regulations and Part 567.5, to place the GVWR and the GAWR of each axle, on the Final Vehicle Certification Label. Required on label is the "Gross Vehicle Weight Rating" or "GVWR" followed by the appropriate value in kilograms and (pounds), which shall not be less than the sum of the unloaded vehicle weight, rated cargo load, and 68 kg (150 lb) times the number of the vehicle's designated seating positions, if known. However, for school buses the minimum occupant weight allowance shall be 54.4 kg (120 lb) per passenger and 68 kg (150 lb) for the driver.

Unloaded Vehicle Weight means the weight of a vehicle with maximum capacity of all fluids necessary for operation of the vehicle, but without cargo or occupants or accessories that are ordinarily removed from the vehicle when they are not in use.

During the completion of this vehicle, GVWR and GAWR may be affected in various ways, including but not limited to the following:

- The installation of a body or equipment that exceeds the rated capacities of the Incomplete Vehicle.
- The addition of designated seating positions that exceed the rated capacities of the Incomplete Vehicle.
- Alterations or substitution of any components such as axles, springs, tires, wheels, frames, steering and brake systems that may affect the rated capacities of the Incomplete Vehicle.

On page 2 before each vehicle illustration and after the word TYPE, is a list of types of vehicles into which the incomplete vehicle is designed to be manufactured. **If supplemental technical information is required to support this document, go to the GM Upfitter Integration website located at www.gmupfitter.com**

# PART I – CHART A

LIST OF CANADA MOTOR VEHICLE SAFETY STANDARDS (CMVSS) AND FEDERAL MOTOR VEHICLE SAFETY STANDARDS (FMVSS), APPLICABLE TO THE FULL SIZE VAN (G-VAN) CARGO, PASSENGER OR CUTAWAY VANS

**SEE STATEMENTS REGARDING CMVSS AND FMVSS ON PAGES THAT FOLLOW**

| CMVSS NO. | FMVSS NO. | TITLE | Cargo Van | Passenger Van | Cutaway Van |
|---|---|---|---|---|---|
| 1106 | - | Exterior noise | 1 | 1 | 1 |
| ICES-002 | - | Canada interference causing equipment standard | 1 | 1 | 1 |
| 101 | 101 | Controls and displays | 1 | 1 | 1 |
| 102 | 102 | Transmission shift position sequence, starter interlock, and transmission braking effect | 1,3 | 1,3 | 1,3 |
| 103 | 103 | Windshield defrosting and defogging systems | 1 | 1 | 1 |
| 104 | 104 | Windshield wiping and washing systems | 1 | 1 | 1 |
| 105 | 105 | Hydraulic and electric brake systems | 2 | 2 | 2 |
| 106 | 106 | Brake hoses, hydraulic, air and vacuum | 1 | 1 | 1 |
| 108 | - | Daytime running lamps | 1 | 1 | 1 |
| 108 | 108 | Lamps, reflective devices and associated equipment | 1 | 1 | 2, 3 |
| 110 | 110 | Tire selection and rims for motor vehicles with a GVWR of 4536 kg (10,000 lb) or less | 2 | 2 | 2 |
| 111 | 111 | Rearview visibility | 1, 3 | 1, 3 | 1, 2, 3 |
| 113 | 113 | Hood latch system | 1 | 1 | 1 |
| 114 | 114 | Theft protection and rollaway prevention | 1 | 1 | 1 |
| 115 | - | Vehicle Identification Number | 1 | 1 | 1 |
| 116 | 116 | Motor vehicle brake fluids | 1 | 1 | 1 |
| 118 | 118 | Power operated window, partition and roof panel systems | 1 | 1 | 1 |
| 120 | 120 | Tire selection and rims for motor vehicles with a GVWR of more than 4,536 (10,000 lb) | 2 | 2 | 2 |
| 124 | 124 | Accelerator control systems | 1,3 | 1,3 | 1,3 |
| - | 125 | Warning devices designed to be carried in motor vehicles | 1 | 1 | 1 |
| 126 | 126 | Electronic stability control systems | 2 | 2 | 2 |
| 131 | 131 | School bus pedestrian safety devices | 3 | 3 | 3 |
| - | 138 | Tire pressure monitoring systems | 2 | 2 | 2 |
| 201 | 201 | Occupant protection in interior impact | 1,3 | 1,3 | 1,3 |
| 202 | 202A | Head restraints | 1,3 | 1,3 | 1,3 |
| 203 | 203 | Impact Protection for the Driver from the Steering Control System | 1 | 1 | 1,3 |
| 204 | 204 | Steering control rearward displacement | 2,3 | 2,3 | 2,3 |
| 205 | 205 | Glazing materials | 1 | 1 | 1 |
| 206 | 206 | Door locks and door retention components | 1, 3 | 1, 3 | 1, 3 |

| CMVSS NO. | FMVSS NO. | TITLE | Cargo Van | Passenger Van | Cutaway Van |
|---|---|---|---|---|---|
| 207 | 207 | Seating systems | 1,3 | 1,3 | 1,3 |
| 208 | 208 | Occupant crash protection | 1, 3 | 1, 3 | 1,3 |
| 209 | 209 | Seat belt assemblies | 1,3 | 1,3 | 1,3 |
| 210 | 210 | Seat belt assembly anchorages | 1,3 | 1,3 | 1,3 |
| 210.1 | - | Tether anchorages for restraint systems | 1,3 | 1,3 | 1,3 |
| 210.2 | - | Lower universal anchorage systems for restraint systems and booster cushions | 1,3 | 1,3 | 1,3 |
| 212 | 212 | Windshield mounting | 2 | 2 | 3 |
| 213.4 | 213 | Built-in child restraint systems and built in booster cushions | 3 | 3 | 3 |
| 214 | 214 | Side impact protection | 1, 3 | 1, 3 | 1, 3 |
| 216 | 216a | Roof Crush Resistance | 2 | 2 | 2, 3 |
| 217 | 217 | Bus emergency exits and window retention and release | 3 | 1 | 3 |
| 219 | 219 | Windshield zone intrusion | 2 | 2 | 3 |
| 220 | 220 | School bus rollover protection | 3 | 3 | 3 |
| 221 | 221 | School bus body joint strength | 3 | 3 | 3 |
| 222 | 222 | School bus passenger seating and crash protection | 3 | 3 | 3 |
| - | 225 | Child restraint anchorage systems | 1,3 | 1,3 | 1,3 |
| 301 | 301 | Fuel system integrity | 2 | 2 | 2 |
| 301.1 | - | LPG fuel system integrity | 3 | 3 | 3 |
| 302 | 302 | Flammability of interior materials | 1,3 | 1,3 | 1,3 |
| 301.2 | 303 | CNG fuel system integrity | 3 | 3 | 3 |
| - | 304 | Compressed natural gas fuel containers | 3 | 3 | 3 |
| - | 403 | Platform lift systems | 3 | 3 | 3 |
| - | 404 | Platform lift installations in motor vehicles | 3 | 3 | 3 |

- TYPE 1, 2 or 3 numbers to the right hand side of the table above designate the appropriate paragraph in the CMVSS or FMVSS standards that follow.

# Statements Regarding Canada Motor Vehicle Safety Standards (CMVSS), and Federal Motor Vehicle Safety Standards (FMVSS)

## CMVSS 1106 – EXTERIOR NOISE
## Applies to all types of Incomplete Vehicles Contained in this Document

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

A. This incomplete vehicle, when completed, will conform to the above standards providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below (if equipped):

- Air Induction System (tuning elements)
- Alternator
- Axles/halfshafts/propshaft
- Engine assembly
- Exhaust System
- Exterior noise generating devices
- Exterior rearview mirror assemblies
- Hood assembly including sound deadening material and seals
- Intake system (Air Induction System (i.e. Air filter, Mass Air flow (MAF) sensor, ducts))
- Power steering pump
- Powertrain control and logic
- Powertrain cooling fan and motor assemblies
- Radiator/condenser assembly to body seals
- Tires (including correct tire pressure)
- Transmission/Transaxle assembly
- Underbody shields including air deflector
- Wheel house liners and shields

B. Final compliance with CMVSS 1106 is the responsibility of the final stage manufacturer for any modifications, added material, components, or systems.

## INTERFERENCE CAUSING EQUIPMENT STANDARD (CANADA ONLY) – ICES-002
## Applies to all types of Incomplete Vehicles Contained in this Document

**TYPE 1 The following statement is applicable to all types of incomplete vehicles with spark ignition engines contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to the performance requirements of the above standards provided no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

- Ignition coil(s)
- Ignition wires & plugs
- Spark plug wires
- PCM/ECM/TCM/EBCM

**The final stage manufacturer must provide a statement of compliance on the Final Stage Manufacturer's Compliance Label with the following bilingual information in order to comply with Industry Canada's Interference Causing Equipment Standard ICES/NMB-002:**

ICES/NMB-002

## CMVSS 101 and FMVSS 101 CONTROLS AND DISPLAYS
## All Cargo, Cutaway and Passenger Van Models

**TYPE 1 The following statement is applicable to all types of Incomplete Vehicles contained in this document as noted above (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 101 and FMVSS 101 providing no alterations are made which affect the size, location, identification or illumination of the controls and

displays or the location, travel and type of driver's seat, as manufactured by General Motors. **If the driver's seat is installed by the intermediate or final stage manufacturer, the "H" point must be located as shown in the "Body Builder Manuals" on the GM Upfitter Integration website located at www.gmupfitter.com.**

The following controls must be operable, and the following displays for the following functions and malfunctions shall be fitted in such a manner that they are identifiable, by the driver while the driver is seated in the driver's designated seating position with the driver's seat belt fastened around the driver in accordance with the manufacturer's instructions:

Hand operated controls (if equipped):

- Automatic vehicle speed (cruise control)
- Clearance lamps (switch)
- Clutch
- Driver's sun visor
- Engine start
- Engine stop
- Electronic stability control system "off"
- Hand throttle
- Hazard warning signal
- Hazard warning switch
- Headlamps
- Headlamp high or low beam switch
- Heating and air conditioning fan
- Heating and air conditioning system
- Horn
- Identification lamps (switch)
- Ignition (switch)
- Illumination intensity
- Manual choke
- Master lighting switch
- Position, side marker, end-outline marker, identification or clearance lamps
- Rear window defogging and defrosting systems
- Steering wheel
- Taillamps
- Transaxle/transmission shifter (except transfer case)
- Turn signal
- Windshield defogging and defrosting systems
- Windshield washer (washing system)
- Windshield wiper (wiping system)

Foot operated controls (if equipped):

- Accelerator
- Clutch
- Headlamp high or low beam switch
- Highbeam
- Park brake pedal
- Service brake pedal
- Taillamp
- Windshield washer (washing system)
- Windshield wiper (wiping system)

Displays (if equipped):

- Air brake low pressure
- Air bag system readiness
- Antilock brake system malfunction
- Battery charging condition
- Brake lining wear-out condition
- Brake system malfunction (Canada - ISO symbol)
- Brake Pressure (system loss)
- Electrical charge
- Electronic stability control system "off"
- Electronic stability control system malfunction
- Engine coolant temperature
- Engine oil pressure
- Fuel level
- Gross loss of brake pressure condition
- Hazard warning signal
- Headlamp high beam
- High beam
- Low brake air pressure telltale
- Low brake fluid condition
- Low tire pressure indication (see MVSS 138)
- Odometer (Canada must be metric)
- Parking brake applied
- Passenger air bag status
- Regenerative brake system malfunction
- Seat belt (unfastened telltale)
- Speedometer (Canada must be metric)
- Tire pressure monitoring system malfunction
- Transmission control position
- Turn signal(s)
- Variable brake proportioning system malfunction

If the intermediate or final stage manufacturer installs any of the above controls and displays, they must also meet the requirements of this standard.

## CMVSS 102 and FMVSS 102 – TRANSMISSION SHIFT POSITION SEQUENCE, STARTER INTERLOCK, AND TRANSMISSION BRAKING EFFECT
## Refer to Vehicle Types, and Applicable "Mobility" Statements that follow

**TYPE 1 The following statement is applicable to all incomplete vehicle types contained in this document and not equipped with a Mobility Package (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 102 and FMVSS 102 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below (if equipped):

Transaxle/Transmission (A/T) control and identification system, including but not limited to:

- A/T floor shift mechanism
- A/T gear ratios and final drive ratio
- A/T gear shift sequence and control logic (electrical or mechanical)
- A/T neutral safety switch assembly and wire
- A/T position indicator linkage and display
- A/T steering column assembly
- Automatic transmission/transaxle assembly (A/T)
- Brake - A/T interlock controls
- Engine starter interlock controls
- M/T clutch-starter interlock system
- Transmission/transaxle shift position pattern (knob, plate or label)
- Vehicle wiring harnesses

**TYPE 3 The following statement is applicable to all incomplete vehicle types contained in this document and equipped with a Mobility Package (unless otherwise noted on the cover).**

Conformity with CMVSS 102 and FMVSS 102 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 103 and FMVSS 103 – WINDSHIELD DEFROSTING AND DEFOGGING SYSTEMS
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 103 and FMVSS 103 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below (if equipped):

Windshield defrosting and defogging systems, including but not limited to:

- Chassis and instrument panel wiring harness assembly
- Defroster air distributor assembly (manifold)
- Defroster air duct assembly
- Defroster air hoses (distributor to nozzle)
- Defroster air to windshield outlet assembly (nozzle) (it affects blower speed)
- Defroster outlet to heater assembly adapter
- Engine control, software and calibration
- Engine coolant pump
- Engine water outlet thermostat assembly
- Engine wiring harness
- Heater and air conditioning wiring harness
- Heater and defroster assembly (including motor and blower)
- Heater and defroster control (electrical, mechanical, vacuum)
- Heater and radiator hoses/hose assemblies
- Heater blower motor speed control
- Side window defroster ducts
- Vacuum control hoses and electric actuators
- Windshield assembly

## CMVSS 104 and FMVSS 104 - WINDSHIELD WIPING AND WASHING SYSTEMS
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 104 and FMVSS 104 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below (if equipped):

Windshield wiping and washing systems, including but not limited to:

Vehicle wiring harness and electrical controls
Washer reservoir cap
Water reservoir filler assembly
Windshield assembly
Windshield module attachments
Windshield washer fluid reservoir
Windshield washer nozzle
Windshield washing system hoses
Windshield wiper arm assembly
Windshield wiper blade assembly
Windshield wiper linkage assembly
Windshield wiper/washer control
Windshield wiper/washer motor/pump assembly

## CMVSS 105 and FMVSS 105 – HYDRAULIC AND ELECTRIC BRAKE SYSTEMS
## Applies to all types of Incomplete Vehicles Contained in this Document including option B3D – Equipment School Bus at any GVWR.

**TYPE 2 The following statement is applicable to all types of incomplete vehicles contained in this documenet including option B3D – Equipment School Bus at any GVWR (unless otherwise noted on the cover).**

This incomplete vehicle when completed will conform to CMVSS 105 and FMVSS 105 provided it is completed in accordance with the following specific conditions by the (intermediate and) final stage manufacturer:

A. Providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below (if equipped):

Anti Lock Brake System
Brake assemblies and components (service/parking) (power boosters, master cylinder, wheel cylinder, calipers, wheel speed sensor, wheel speed sensor wiring, brake lining, etc.)
Brake pedal, brake switch, parking brake pedal or park brake switch and related mechanical components
Brake system electrical controls and logic
Gauges and warning devices, and statements
Hydraulic brake fluid and reservoirs
Hydraulic brake valves and components
Hydraulic brake lines, fittings and routings
Master cylinder warning statement
Parking brake actuator and related mechanical components
Power steering or vacuum lines and routing
Power steering or vacuum pump
Shocks, springs and other suspension components
Tires and Wheels
Vacuum brake lines, fittings and routings
Vehicle wiring harnesses
Wheelbases

B. GVWR, GAWR front and rear weight ratings as listed on the Incomplete Vehicle Label affixed to the front cover of this document must not be exceeded.

C. The center of gravity of the total vehicle falls within the areas referenced on the “ALLOWABLE CENTER OF GRAVITY CHART” that follows. Instructions for determining the allowable center of gravity variation are listed below:

These charts detail the envelope of allowable center of gravity variation for completed vehicles. This is significant for the lightly loaded portion of FMVSS 105, which is defined as curb plus 181.4 kg (400 lb) distributed in the driver-passenger area of the vehicle for vehicles with GVWR of 4536 kg (10,000 lb) or less or as curb plus 226.8 kg (500 lb) distributed in the driver-passenger area of the vehicle for vehicles with GVWR greater than 4536 kg (10,000 lb).

The lightly loaded center of gravity of complete vehicles needs to be restricted so it will meet FMVSS 105 stopping distances. The laden center of gravity does not need to be specified as it is controlled within the CMVSS 105 and FMVSS 105 test procedure by specific instructions as to how ballast is to be placed (while height is not controlled, it is assumed that for test purposes it would be reasonable).

For upfitter use, the center of gravity location can be approximated by the following formula:

$$D = \frac{[Wrc + Wrb + [(Hp)(Wp)/WB]]\ WB}{Wt}$$

$$h = \frac{[h1Wc + h2Wb + (h3)(Wp)]}{Wt}$$

d = horizontal distance from front wheels to completed vehicle center of gravity mm (in)

h = vertical distance from ground to completed vehicle center of gravity mm (in)

Wrc = rear component of Chassis weight kg (lb)

Wrb = rear component of body weight kg (lb)

WB = vehicle wheelbase mm (in)

Wt = total weight of chassis and body kg (lb) plus 181.4 kg (400 lb) for vehicles with a GVWR equal to or less than 4536 kg (10,000 lb)

Wt = total weight of chassis and body kg (lb) plus 226.8 kg (500 lb) for vehicles with GVWR greater than 4536 kg (10,000 lb).

h1 = center of gravity height from ground of the Bare Chassis = 711 mm (28 in)

Wc = total weight of Chassis kg (lb)

h2 = center of gravity height of body from ground mm (in)

Wb = total weight of body kg (lb)

Wp = 181.4 kg (400 lb) Amount from lightly loaded definition that is evenly distributed in driver-passenger area of vehicle for vehicles with GVWR of 4536 kg (10,000 lb) or less.

Wp = 226.8 kg (500 lb) Amount from lightly loaded definition that is evenly distributed in driver-passenger area of vehicle for vehicles with GVWR greater than 4536 kg (10,000 lb).

Hp = 1115 mm (43.9 in) Horizontal distance from front axle to center of gravity of 181.4 kg (400 lb) or 226.8 kg (500 lb) evenly distributed in driver-passenger area of vehicle.

h3 = 1160 mm (45.7 in) Vertical center of gravity height of 181.4 kg (400 lb) evenly distributed in driver-passenger area for vehicles with GVWR of 4536 kg (10,000 lb) or less.

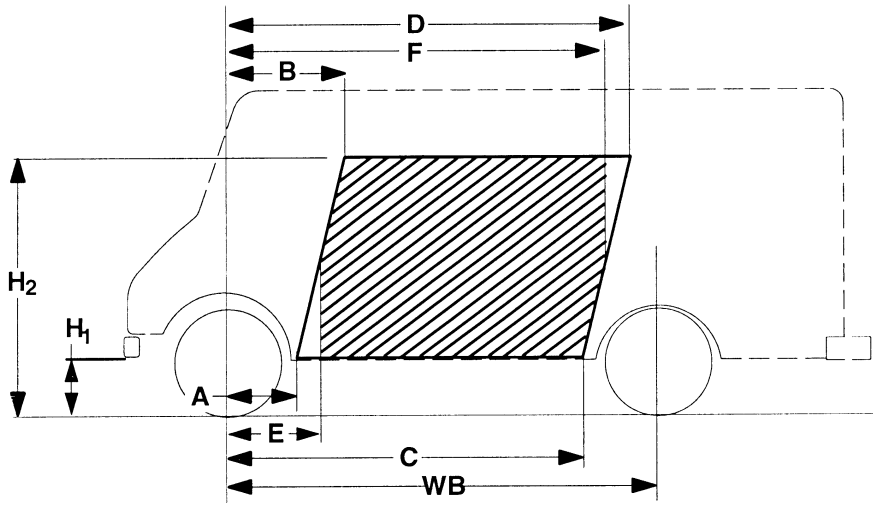
h3 = 1160 mm (45.7 in) Vertical center of gravity height of 226.8 kg (500 lb) evenly distributed in driver-passenger area for vehicles with GVWR greater than 4536 kg (10,000 lb).

# CMVSS 105 and FMVSS 105
# ALLOWABLE CENTER OF GRAVITY CHART

| Model | GVWR kg (lbs) | Brake RPO | Wheel Base mm (inch) | SRW /DRW | Incomplete Vehicles | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | | | Coordinates of Allowable C/G Variation at CMVSS 105 / FMVSS 105 Unladen, Curb Weight + 181.4 kg (400 lb) or Curb Weight + 226.8 kg (500 lb) as defined by CMVSS 105 and FMVSS 105 mm (in) | | | | | | Fwd C/G Limit mm (in) | Rwd C/G Limit mm (in) |
| | | | | | H1 | H2 | A | B | C | D | E | F |
| G23405 | 3901 (8,600) | JH6 | 3429 (135.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1142 (45.0) | 1395 (54.9) | 2457 (96.7) | 2710 (106.7) | 1234 (48.6) | 2369 (93.3) |
| G23406 | 3901 (8,600) | JH6 | 3429 (135.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1142 (45.0) | 1395 (54.9) | 2457 (96.7) | 2710 (106.7) | 1234 (48.6) | 2369 (93.3) |
| G33405 | 4354 (9,600) | JH6 | 3429 (135.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1142 (45.0) | 1395 (54.9) | 2457 (96.7) | 2710 (106.7) | 1234 (48.6) | 2369 (93.3) |
| G33406 | 3992 (8,800) | JH6 | 3429 (135.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1142 (45.0) | 1395 (54.9) | 2457 (96.7) | 2710 (106.7) | 1234 (48.6) | 2369 (93.3) |
| G33406 | 4354 (9,600) | JH6 | 3429 (135.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1142 (45.0) | 1395 (54.9) | 2457 (96.7) | 2710 (106.7) | 1234 (48.6) | 2369 (93.3) |
| G23705 | 3901 (8,600) | JH6 | 3937 (155.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1298 (51.1) | 1552 (61.1) | 2808 (110.6) | 3062 (120.6) | 1417 (55.8) | 2720 (107.1) |
| G33705 | 4354 (9,600) | JH6 | 3937 (155.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1298 (51.1) | 1552 (61.1) | 2808 (110.6) | 3062 (120.6) | 1417 (55.8) | 2720 (107.1) |
| G33705 | 4491 (9,900) | JH6 | 3937 (155.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1298 (51.1) | 1552 (61.1) | 2808 (110.6) | 3062 (120.6) | 1417 (55.8) | 2720 (107.1) |
| G33705 | 4502 (9,925) | JH6 | 3937 (155.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1298 (51.1) | 1552 (61.1) | 2808 (110.6) | 3062 (120.6) | 1417 (55.8) | 2720 (107.1) |
| G33706 | 4354 (9,600) | JH6 | 3937 (155.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1298 (51.1) | 1552 (61.1) | 2808 (110.6) | 3062 (120.6) | 1417 (55.8) | 2720 (107.1) |
| G33706 | 4491 (9,900) | JH6 | 3937 (155.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1298 (51.1) | 1552 (61.1) | 2808 (110.6) | 3062 (120.6) | 1417 (55.8) | 2720 (107.1) |
| G33706 | 4502 (9,925) | JH6 | 3937 (155.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1298 (51.1) | 1552 (61.1) | 2808 (110.6) | 3062 (120.6) | 1417 (55.8) | 2720 (107.1) |
| G33503 | 3901 (8,600) | JH6 | 3531 (139.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1173 (46.2) | 1427 (56.2) | 2527 (99.5) | 2781 (109.5) | 1271 (50.0) | 2440 (96.1) |
| G33503 | 4354 (9,600) | JH6 | 3531 (139.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1173 (46.2) | 1427 (56.2) | 2527 (99.5) | 2781 (109.5) | 1271 (50.0) | 2440 (96.1) |
| G33503 | 4491 (9,900) | JH6 | 3531 (139.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1173 (46.2) | 1427 (56.2) | 2527 (99.5) | 2781 (109.5) | 1271 (50.0) | 2440 (96.1) |
| G33503 | 4581 (10,100) | JH6 | 3531 (139.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 978 (38.5) | 1190 (46.9) | 2694 (106.1) | 2905 (114.4) | 1271 (50.0) | 2440 (96.1) |
| G33503 | 4536 (10,000) | JH9 | 3531 (139.0) | DRW | 304.8 (12.0) | 1219.2 (48.0) | 1173 (46.2) | 1427 (56.2) | 2527 (99.5) | 2781 (109.5) | 1271 (50.0) | 2634 (103.7) |
| G33503 | 5579 (12,300) | JH9 | 3531 (139.0) | DRW | 304.8 (12.0) | 1219.2 (48.0) | 978 (38.5) | 1190 (46.9) | 2694 (106.1) | 2905 (114.4) | 1271 (50.0) | 2634 (103.7) |

| Model | GVWR kg (lbs) | Brake RPO | Wheel Base mm (inch) | SRW /DRW | Incomplete Vehicles | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | | | Coordinates of Allowable C/G Variation at CMVSS 105 / FMVSS 105 Unladen, Curb Weight + 181.4 kg (400 lb) or Curb Weight + 226.8 kg (500 lb) as defined by CMVSS 105 and FMVSS 105 mm (in) | | | | | | Fwd C/G Limit mm (in) | Rwd C/G Limit mm (in) |
| | | | | | H1 | H2 | A | B | C | D | E | F |
| G33803 | 4491 (9,900) | JH6 | 4039 (159.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1330 (52.4) | 1583 (62.3) | 2879 (113.3) | 3132 (123.3) | 1454 (57.2) | 2791 (109.9) |
| G33803 | 4581 (10,100) | JH6 | 4039 (159.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1109 (43.7) | 1320 (52.0) | 3071 (120.9) | 3283 (129.3) | 1454 (57.2) | 2791 (109.9) |
| G33803 | 4536 (10,000) | JH9 | 4039 (159.0) | DRW | 304.8 (12.0) | 1219.2 (48.0) | 1330 (52.4) | 1583 (62.3) | 2879 (113.3) | 3132 (123.3) | 1454 (57.2) | 3013 (118.6) |
| G33803 | 5579 (12,300) | JH9 | 4039 (159.0) | DRW | 304.8 (12.0) | 1219.2 (48.0) | 1109 (43.7) | 1320 (52.0) | 3071 (120.9) | 3283 (129.3) | 1454 (57.2) | 3013 (118.6) |
| G33803 | 6441 (14,200) | JH9 | 4039 (159.0) | DRW | 304.8 (12.0) | 1219.2 (48.0) | 1109 (43.7) | 1320 (52.0) | 3071 (120.9) | 3283 (129.3) | 1454 (57.2) | 3013 (118.6) |
| G33903 | 5579 (12,300) | JH9 | 4496 (177.0) | DRW | 304.8 (12.0) | 1219.2 (48.0) | 1226 (48.3) | 1438 (56.6) | 3411 (134.3) | 3622 (142.6) | 1618 (63.7) | 3354 (132.0) |
| G33903 | 6441 (14,200) | JH9 | 4496 (177.0) | DRW | 304.8 (12.0) | 1219.2 (48.0) | 1226 (48.3) | 1438 (56.6) | 3411 (134.3) | 3622 (142.6) | 1618 (63.7) | 3354 (132.0) |
| G33503 &B3D | 4354 (9,600) | JH6 | 3531 (139.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1173 (46.2) | 1427 (56.2) | 2527 (99.5) | 2781 (109.5) | 1271 (50.0) | 2440 (96.1) |
| G33503 &B3D | 4491 (9,900) | JH6 | 3531 (139.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 1173 (46.2) | 1427 (56.2) | 2527 (99.5) | 2781 (109.5) | 1271 (50.0) | 2440 (96.1) |
| G33503 &B3D | 4581 (10,100) | JH6 | 3531 (139.0) | SRW | 304.8 (12.0) | 1219.2 (48.0) | 978 (38.5) | 1190 (46.9) | 2694 (106.1) | 2905 (114.4) | 1271 (50.0) | 2440 (96.1) |
| G33503 &B3D | 4356 (10,000) | JH9 | 3531 (139.0) | DRW | 304.8 (12.0) | 1219.2 (48.0) | 1173 (46.2) | 1427 (56.2) | 2527 (99.5) | 2781 (109.5) | 1271 (50.0) | 2634 (103.7) |
| G33503 &B3D | 5579 (12,300) | JH9 | 3531 (139.0) | DRW | 304.8 (12.0) | 1219.2 (48.0) | 978 (38.5) | 1190 (46.9) | 2694 (106.1) | 2905 (114.4) | 1271 (50.0) | 2634 (103.7) |
| G33803 &B3D | 4536 (10,000) | JH9 | 4039 (159.0) | DRW | 304.8 (12.0) | 1219.2 (48.0) | 1330 (52.4) | 1583 (62.3) | 2879 (113.3) | 3132 (123.3) | 1454 (57.2) | 3013 (118.6) |
| G33803 &B3D | 5579 (12,300) | JH9 | 4039 (159.0) | DRW | 304.8 (12.0) | 1219.2 (48.0) | 1109 (43.7) | 1320 (52.0) | 3071 (120.9) | 3283 (129.3) | 1454 (57.2) | 3013 (118.6) |
| G33803 &B3D | 6441 (14,200) | JH9 | 4039 (159.0) | DRW | 304.8 (12.0) | 1219.2 (48.0) | 1109 (43.7) | 1320 (52.0) | 3071 (120.9) | 3283 (129.3) | 1454 (57.2) | 3013 (118.6) |

SRW = Single Rear Wheel, DRW = Dual Rear Wheel, C/G = Center of Gravity, B3D = School Bus Option




**C/G of vehicle in CMVSS or FMVSS unladen condition [Curb + 181.4 kg. (400 lb) for vehicles less than or equal to 4536 kg (10,000 lbs) GVWR or Curb + 226.8 kg (500 lbs) for vehicles greater than 4536 kg (10,000 lbs) GVWR] must be inside shaded area – that is, the C/G must be within the trapezoid formed by the coordinates A, B, C, D, H1, & H2, plus the C/G must be to the rear of vertical line E and forward of vertical line F.**

## CMVSS 106 and FMVSS 106 – BRAKE HOSES, HYDRAULIC, AIR AND VACUUM
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 106 and FMVSS 106 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

| | |
|---|---|
| Hydraulic, Air, and Vacuum Brake Hoses and assemblies | Labeling requirements |

## CMVSS 108 – DAYTIME RUNNING LAMPS
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed will conform to the Daytime Running Lamps (DRL) requirements of CMVSS 108 providing no alterations are made to the ignition switch, DRL system components or wiring, and any vehicle forward lighting as manufactured by General Motors.

## CMVSS 108 and FMVSS 108 – LAMPS, REFLECTIVE DEVICES AND ASSOCIATED EQUIPMENT
## Cargo and Passenger Van

**TYPE 1 The following statement is applicable to Cargo and Passenger Van types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 108 and FMVSS 108 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Back-up lamps
Body control module (BCM)
Center high mounted stop lamp
Daytime running lamps controls and wiring (Canada)
Front side marker lamps
Front side reflex reflectors
Front turn signal lamps
Hazard warning flasher
Hazard warning signal operating unit
Headlamps
Headlamp dimmer switch
Headlamp highbeam indicator
License plate lamp
Owner manual instructions
Park lamps
Rear side marker lamps
Rear side reflex lamps
Rear reflex reflectors
Rear turn signal lamps
Stop lamps
Tail lamps
Turn signal control

## CMVSS 108 and FMVSS 108 – LAMPS, REFLECTIVE DEVICES AND ASSOCIATED EQUIPMENT

## Cutaway Van

**TYPE 2 The following statement is applicable to Cutaway vans (unless otherwise noted on the cover):**

The cutaway van incomplete vehicle, when completed, will conform to CMVSS 108 and FMVSS 108 provided the following conditions are met:

A. Each of these devices installed on the incomplete vehicle have no alterations made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Body control module (BCM)
Daytime running lamps controls and wiring (Canada)
Front side marker lamps
Front side reflex reflectors
Front turn signal lamps
Hazard warning flasher
Hazard warning signal operating unit
Headlamps
Headlamp dimmer switch
Headlamp highbeam indicator
Owner manual instructions
Park lamps
Turn signal control

1. No part of the completed vehicle shall be installed so as to prevent any of the devices listed above from meeting their required photometric output at the specified test points. If such interference exists, the applicable devices may have to be relocated or additional devices added to meet the requirements of CMVSS 108 and FMVSS 108. Any CMVSS 108 or FMVSS 108 part shall not be painted.

2. The following additional devices must be installed on the body and meet all requirements of CMVSS 108 and FMVSS 108:

Back-up lamps
License plate lamp
Rear side marker lamps
Rear side reflex reflectors
Rear reflex reflectors
Rear turn signal lamps
Stop lamps
Tail lamps

3. The following additional device must be installed on the body and meet all requirements of CMVSS 108 and FMVSS 108 if the body width is less than 203.2 cm (80 in) and has a GVWR of 4536 kg (10,000 lb) or less:

Center high mounted stop lamp

4. The following additional devices must be installed on the body and meet all requirements of CMVSS 108 and FMVSS 108 if the body width is greater than or equal to 203.2 cm (80 in):

Front clearance lamps — Rear clearance lamps
Front identification lamps — Rear identification lamps

5. The following additional devices must be installed on the body and meet all requirements of CMVSS 108 and FMVSS 108 if the overall vehicle length is greater than or equal to 9.144 m (30 ft):

Intermediate side marker lamps — Intermediate side reflex reflectors

B. For School Buses and Multifunction School Activity Buses, the intermediate or final stage manufacturer is responsible for installing "School Bus Signal Lamps" that comply with CMVSS 108 and FMVSS 108.

**TYPE 3 The following statement is applicable to the turn signal lamp failure requirements Cutaway Van types of incomplete vehicles contained in this document completed with a body width less than 203.2 cm (80 in), and NOT equipped to tow a trailer (unless otherwise noted on the cover).**

Conformity with CMVSS 108 and FMVSS 108 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 110 and FMVSS 110 – TIRE SELECTION AND RIMS FOR MOTOR VEHICLES WITH A GVWR OF 4536 kg (10,000 lb) OR LESS
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 2 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 110 and FMVSS 110, providing:

A. No alterations are made which affect the function, physical or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to:

Owner Manual instructions — Wheels
Tires

B. GVWR, GAWR front and rear weight ratings as listed on the Incomplete Vehicle Label affixed to the front cover of this document are not exceeded.

C. The tire and wheel information shown on the Incomplete Vehicle Document Label must be transferred to the final stage manufacturer's Certification Label and Tire Placard providing statements A and B above have been met, and the final stage manufacturer labels the vehicle in compliance with CMVSR 6.6(1) and CMVSS 110 or FMVSR 567.5 and FMVSS 110.

NOTE: Incomplete Vehicles referenced in this document may be shipped with reduced tire pressures for shipping purposes only.

## CMVSS 111 and FMVSS 111 – REAR VISIBILITY
## Applies to Passenger Van, Cargo Van and Dual Rear Wheel Cutaway Incomplete Vehicles contained in this Document Without Shipped Loose Mirror, or Mirror Delete options, and NOT completed as a School Bus or Multifunction School Activity Bus

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document, without Shipped Loose Mirror, or Mirror Delete options, and NOT completed as a School Bus or Multifunction School Activity Bus (unless otherwise noted on the cover).**

The mirrors on the incomplete vehicle, as manufactured by General Motors, will conform to CMVSS 111 and FMVSS 111 providing:

A. No alterations or substitutions are made to the outside mirrors or inside mirrors furnished with the vehicle.

B. The driver's seat location is not altered.

C. The body width is not increased.

D. The body remains symmetrical about the vehicle centerline.

E. The GVWR is not changed.

## CMVSS 111 and FMVSS 111 – REAR VISIBILITY
## Applies to Single Rear Wheel Cutaway Incomplete Vehicles contained in this Document

**TYPE 3 The following statement is applicable to single rear wheel cutaway incomplete vehicles contained in this document with shipped loose mirror, or mirror delete options (unless otherwise noted on the cover).**

Conformity with CMVSS 111 and FMVSS 111 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 111 and FMVSS 111 – REAR VISIBILITY
## Applies to all types of Incomplete Vehicles contained in this Document With Shipped Loose Mirror, or Mirror Delete Options

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document with shipped loose mirror, or mirror delete options (unless otherwise noted on the cover).**

Conformity with CMVSS 111 and FMVSS 111 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 111 and FMVSS 111 – REAR VISIBILITY
## School Bus, Multifunction School Activity Bus

**TYPE 3 The following statement is applicable to incomplete vehicles completed as a School Bus or Multifunction School Activity (unless otherwise noted on the cover).**

Conformity with CMVSS 111 and FMVSS 111 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## FMVSS 111 – REAR VISIBILITY CAMERA SYSTEMS (FOR VEHICLES COMPLETED AFTER APRIL 30, 2018)
## Cargo and Passenger Van and Cutaway with a GVWR less than or equal to 4536 kg (10,000 lb)

**TYPE 1 The following statement is applicable to Cargo and Passenger van incomplete vehicles contained in this document 4536 kg (10,000 lb) GVWR or less (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to FMVSS 111 S6.2 rear camera visibility system requirements providing there are no accessories, paint or decals added that obscure the video camera and no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

- Body Control Module (BCM)
- Camera lens and mounting
- Video display
- Wiring for video and camera

**TYPE 3 The following statement is applicable to Cutaway van incomplete vehicles contained in this document, 4536 (10,000 lb) GVWR or less (unless otherwise noted on the cover).**

Conformity with FMVSS 111 S6.2 (rear camera visibility requirements) cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 113 and FMVSS 113 – HOOD LATCH SYSTEM
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 113 and FMVSS 113 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Hood latch systems, which may include but are not limited to:

- Hood latch (catch) assembly
- Hood latch cable release system including controls
- Hood latch pilot
- Hood latch striker plate (hook) and reinforcements
- Hood latch support assembly

## CMVSS 114 and FMVSS 114 – THEFT PROTECTION AND ROLLAWAY PREVENTION
## Applies to all types of Incomplete Vehicles Contained in this Document
## 4536 kg (10,000 lb) GVWR or less

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document, 4536 kg (10,000 lb) GVWR or less (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 114 and FMVSS 114 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

- Brake-transaxle/transmission interlock controls
- Electronic Immobilizer
- Engine electronics (BCM/ECM/PCM/TCM)
- Engine starter interlock controls
- Ignition key
- Ignition key warning chime system
- Owner Manual Instructions
- Steering column lock assembly
- Transaxle/Transmission assembly
- Transaxle/Transmission assembly neutral start switch and wiring

## CMVSS 115 – VEHICLE IDENTIFICATION NUMBER
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 115 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Vehicle Identification Number
VIN label or plate
VIN plate fasteners

## CMVSS 116 and FMVSS 116 – MOTOR VEHICLE BRAKE FLUIDS
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

The hydraulic brake fluid in this incomplete vehicle, as manufactured by General Motors, will conform to CMVSS 116 and FMVSS 116 providing no alterations are made which affect the physical or chemical properties of the brake fluid.

## CMVSS 118 and FMVSS 118 – POWER OPERATED WINDOW, PARTITION AND ROOF PANEL SYSTEMS
## Applies to all types of Incomplete Vehicles Contained in this Document 4536 kg (10,000 lb) GVWR or less

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document, 4536 kg (10,000 lb) GVWR or less (unless otherwise noted on the cover).**

This incomplete vehicle, if equipped by General Motors with power windows, when completed, will conform to CMVSS 118 and FMVSS 118 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below (if equipped):

Power window electrical system
Power window operating system
Power window operating system control logic
Window glazing material

Final compliance with CMVSS 118 and FMVSS 118 is the responsibility of the final stage manufacturer for any modifications, or added material, components, or systems.

## CMVSS 120 and FMVSS 120 – TIRE SELECTION AND RIMS FOR MOTOR VEHICLES WITH A GVWR OF MORE THAN 4536 kg (10,000 lb)
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 2 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 120 and FMVSS 120, providing:

A. No alterations are made which affect the function, physical or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to:

Owner Manual instructions
Tires
Wheels

B. GVWR, GAWR front and rear weight ratings as listed on the Incomplete Vehicle Label affixed to the front cover of this document are not exceeded.

C. The tire and wheel information shown on the Incomplete Vehicle Document Label must be transferred to the final stage manufacturer's Certification Label providing statements A and B above have been met, and the final stage manufacturer labels the vehicle in compliance with CMVSR 6.6(1) and CMVSS 120 or FMVSR 567.5 and FMVSS 120.

NOTE: Incomplete Vehicles referenced in this document may be shipped with reduced tire pressures for shipping purposes only.

## CMVSS 124 and FMVSS 124 – ACCELERATOR CONTROL SYSTEMS
## Refer to Vehicle Types, and Applicable "Mobility" Statements that follow

**TYPE 1 The following statement is applicable to all incomplete vehicle types contained in this document and not equipped with a Mobility Package (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 124 and FMVSS 124 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Accelerator/throttle control systems, including but not limited to:

- Attachment pin, hole or ball stud to fuel injection unit throttle lever
- Cable or rod, throttle or accelerator, and support bracket including seals
- Cruise control module, wiring and cable (if equipped)
- Electronic throttle control assembly and related wiring
- Floor covering material must not be installed under pedal or within 25.4 mm (1 in) of side of pedal
- Lever, throttle or accelerator and supporting bracket
- Pedal-throttle or accelerator and attachments
- Spring(s) - throttle or accelerator return

**TYPE 3 The following statement is applicable to all incomplete vehicle types contained in this document and equipped with a Mobility Package (unless otherwise noted on the cover).**

Conformity with CMVSS 124 and FMVSS 124 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## FMVSS 125 – WARNING DEVICES DESIGNED TO BE CARRIED IN MOTOR VEHICLES
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document if ordered with safety warning triangle option (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to FMVSS 125 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

- Safety warning triangles (if equipped)

## CMVSS 126 and FMVSS 126 – ELECTRONIC STABILITY CONTROL SYSTEMS

## Applies to all types of Incomplete Vehicles Contained in this Document 4536 kg (10,000 lb) GVWR or less

**TYPE 2 The following statement is applicable to all types of incomplete vehicles contained in this document, 4536 kg (10,000 lb) GVWR or less (unless otherwise noted on the cover).**

This incomplete vehicle when completed will conform to CMVSS 126 and FMVSS 126 provided it is completed in accordance with the following specific conditions by the (intermediate and) final stage manufacturer:

A. Providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

- Anti-Lock Brake, Traction Control and Electronic Stability control system, including sensors and control module
- Brake assemblies and components (service/ parking) - (i.e. power boosters, master cylinder, wheel cylinder, calipers, rotors, wheel speed sensor, wheel speed sensor wiring, brake lining etc.)
- Brake pedal, brake switch, parking brake hand lever or park brake switch and related mechanical components
- Brake system electrical controls and logic
- Gauges, warning devices and statements
- Hydraulic brake fluid and reservoirs
- Hydraulic brake lines, fittings and routings
- Hydraulic brake valves and components
- Master cylinder-warning statement
- Owner Manual instructions
- Parking brake actuator and related mechanical components
- Power steering or vacuum lines and routing
- Power steering or vacuum pump
- Tires and Wheels
- Stability control system, including control module, sensors and software calibrations
- Steering control system including related hardware
- Suspension components (i.e. bushings, control arms, shocks, springs, sway bars)
- Vacuum brake lines, fittings and routings
- Vehicle wiring harnesses
- Wheelbases

B. GVWR, GAWR front and rear weight ratings as listed on the Incomplete Vehicle Label affixed to the front cover of this document must not be exceeded.

C. The Tire Pressures as listed on the Incomplete Vehicle Label affixed to the front cover of this document must be followed

D. The Maximum Completed Vehicle Unloaded (Curb) restrictions as shown in CMVSS 301 and FMVSS 301 Table A, must not be exceeded.

E. The center of gravity of the total vehicle falls within the areas referenced on the CMVSS 126 and FMVSS 126 Compliance Certification "X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions" charts that follow. Instructions for determining the allowable center of gravity variation are listed below:

**G-VAN G23405/06, LT245/75R16 Bridgestone V-Steel and CMVSS 126 and FMVSS 126 Compliance Certification "X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions"**

| @ Maximum X Longitudinal CG Location from Front Axle CL cm (in) | Model Identification | @ Y – Lateral CG Offset Location cm (in) | | | | |
|---|---|---|---|---|---|---|
| | | -10 (-3.9) | -5 (-2) | 0 | 5 (2) | 10 (3.9) |
| 140 (55.1) | G23405/06 | 77.5 (30.5) | 77.5 (30.5) | 82.5 (32.5) | 77.5 (30.5) | 77.5 (30.5) |
| 150 (59.0) | G23405/06 | 85 (33.5) | 85 (33.5) | 85 (33.5) | 85 (33.5) | 85 (33.5) |
| 160 (62.9) | G23405/06 | 82.5 (32.5) | 85 (33.5) | 85 (33.5) | 85 (33.5) | 82.5 (32.5) |
| 170 (66.9) | G23405/06 | 82.5 (32.5) | 85 (33.5) | 85 (33.5) | 85 (33.5) | 82.5 (32.5) |
| 180 (70.9) | G23405/06 | 82.5 (32.5) | 85 (33.5) | 85 (33.5) | 85 (33.5) | 82.5 (32.5) |

| G-VAN G23405/06, LT245/75R16 Bridgestone V-Steel and CMVSS 126 and FMVSS 126 Compliance Certification "X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions" | | | | | | |
|---|---|---|---|---|---|---|
| @ Maximum X Longitudinal CG Location from Front Axle CL cm (in) | Model Identification | @ Y – Lateral CG Offset Location cm (in) | | | | |
| | | -10 (-3.9) | -5 (-2) | 0 | 5 (2) | 10 (3.9) |
| 190 (74.8) | G23405/06 | 82.5 (32.5) | 85 (33.5) | 85 (33.5) | 85 (33.5) | 82.5 (32.5) |
| 200 (78.7) | G23405/06 | 82.5 (32.5) | 82.5 (32.5) | 82.5 (32.5) | 82.5 (32.5) | 82.5 (32.5) |
| 210 (82.7) | G23405/06 | 80 (31.5) | 82.5 (32.5) | 82.5 (32.5) | 82.5 (32.5) | 80 (31.5) |
| | | ^^^ Maximum Z – Vertical CG Height Restriction Values ^^^ NOTE: Minimum Z – Vertical Height Restriction Value is 30 cm (11.8 in) for all models above | | | | |

| G-VAN G23705/06, LT245/75R16 Bridgestone V-Steel and CMVSS 126 and FMVSS 126 Compliance Certification "X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions" | | | | | | |
|---|---|---|---|---|---|---|
| @ Maximum X Longitudinal CG Location from Front Axle CL cm (in) | Model Identification | @ Y – Lateral CG Offset Location cm (in) | | | | |
| | | -10 (-3.9) | -5 (-2) | 0 | 5 (2) | 10 (3.9) |
| 180 (70.9) | G23705/06 | 82.5 (32.5) | 85 (33.5) | 87.5 (34.5) | 85 (33.5) | 82.5 (32.5) |
| 190 (74.8) | G23705/06 | 82.5 (32.5) | 85 (33.5) | 87.5 (34.5) | 85 (33.5) | 82.5 (32.5) |
| 200 (78.7) | G23705/06 | 82.5 (32.5) | 85 (33.5) | 87.5 (34.5) | 85 (33.5) | 82.5 (32.5) |
| 210 (82.7) | G23705/06 | 85 (33.5) | 87.5 (34.5) | 90 (35.5) | 87.5 (34.5) | 85 (33.5) |
| 220 (86.6) | G23705/06 | 85 (33.5) | 87.5 (34.5) | 90 (35.5) | 87.5 (34.5) | 85 (33.5) |
| 230 (90.6) | G23705/06 | 85 (33.5) | 87.5 (34.5) | 90 (35.5) | 87.5 (34.5) | 85 (33.5) |
| 240 (94.5) | G23705/06 | 80 (31.5) | 85 (33.5) | 87.5 (34.5) | 85 (33.5) | 80 (31.5) |
| 250 (98.4) | G23705/06 | 80 (31.5) | 85 (33.5) | 87.5 (34.5) | 85 (33.5) | 80 (31.5) |
| 260 (102.4) | G23705/06 | 80 (31.5) | 85 (33.5) | 87.5 (34.5) | 85 (33.5) | 80 (31.5) |
| | | ^^^ Maximum Z – Vertical CG Height Restriction Values ^^^ NOTE: Minimum Z – Vertical Height Restriction Value is 30 cm (11.8 in) for all models above | | | | |

| G-VAN G33405/06, LT245/75R16 Bridgestone V-Steel Tire CMVSS 126 and FMVSS 126 Compliance Certification "X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions" | | | | | | |
|---|---|---|---|---|---|---|
| @ Maximum X Longitudinal CG Location from Front Axle CL cm (in) | Model Identification | @ Y – Lateral CG Offset Location cm (in) | | | | |
| | | -10 (-3.9) | -5 (-2) | 0 | 5 (2) | 10 (3.9) |
| 140 (55.1) | G33405/06 | 80 (31.5) | 80 (31.5) | 80 (31.5) | 80 (31.5) | 80 (31.5) |
| 150 (59.0) | G33405/06 | 82.5 (32.5) | 82.5 (32.5) | 87.5 (34.5) | 82.5 (32.5) | 82.5 (32.5) |
| 160 (62.9) | G33405/06 | 85 (33.5) | 87.5 (34.5) | 87.5 (34.5) | 87.5 (34.5) | 85 (33.5) |
| 170 (66.9) | G33405/06 | 85 (33.5) | 87.5 (34.5) | 90 (35.5) | 87.5 (34.5) | 85 (33.5) |
| 180 (70.9) | G33405/06 | 87.5 (34.5) | 90 (35.5) | 92.5 (36.5) | 90 (35.5) | 87.5 (34.5) |
| 190 (74.8) | G33405/06 | 90 (35.5) | 92.5 (36.5) | 92.5 (36.5) | 92.5 (36.5) | 90 (35.5) |

| G-VAN G33405/06, LT245/75R16 Bridgestone V-Steel Tire<br>CMVSS 126 and FMVSS 126 Compliance Certification<br>"X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions" | | | | | | |
|---|---|---|---|---|---|---|
| **@ Maximum X Longitudinal CG Location from Front Axle CL cm (in)** | **Model Identification** | **@ Y – Lateral CG Offset Location cm (in)** | | | | |
| | | **-10 (-3.9)** | **-5 (-2)** | **0** | **5 (2)** | **10 (3.9)** |
| 200 (78.7) | G33405/06 | 90 (35.5) | 92.5 (36.5) | 92.5 (36.5) | 92.5 (36.5) | 90 (35.5) |
| 210 (82.7) | G33405/06 | 92.5 (36.5) | 92.5 (36.5) | 95 (37.5) | 92.5 (36.5) | 92.5 (36.5) |
| 220 (86.6) | G33405/06 | 92.5 (36.5) | 92.5 (36.5) | 95 (37.5) | 92.5 (36.5) | 92.5 (36.5) |
| 230 (90.6) | G33405/06 | 80 (31.5) | 85 (33.5) | 85 (33.5) | 85 (33.5) | 80 (31.5) |
| | | **^^^ Maximum Z – Vertical CG Height Restriction Values ^^^**<br>**NOTE: Minimum Z – Vertical Height Restriction Value is 30 cm (11.8 in) for all models above** | | | | |

| G-VAN G33705/06, LT245/75R16 Bridgestone V-Steel Tire<br>CMVSS 126 and FMVSS 126 Compliance Certification<br>"X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions" | | | | | | |
|---|---|---|---|---|---|---|
| **@ Maximum X Longitudinal CG Location from Front Axle CL cm (in)** | **Model Identification** | **@ Y – Lateral CG Offset Location cm (in)** | | | | |
| | | **-10 (-3.9)** | **-5 (-2)** | **0** | **5 (2)** | **10 (3.9)** |
| 180 (70.9) | G33705/06 | 87.5 (34.5) | 90 (35.5) | 92.5 (36.5) | 90 (35.5) | 87.5 (34.5) |
| 190 (74.8) | G33705/06 | 92.5 (36.5) | 95 (37.5) | 95 (37.5) | 95 (37.5) | 92.5 (36.5) |
| 200 (78.7) | G33705/06 | 92.5 (36.5) | 95 (37.5) | 97.5 (38.4) | 95 (37.5) | 92.5 (36.5) |
| 210 (82.7) | G33705/06 | 92.5 (36.5) | 95 (37.5) | 97.5 (38.4) | 95 (37.5) | 92.5 (36.5) |
| 220 (86.6) | G33705/06 | 92.5 (36.5) | 95 (37.5) | 97.5 (38.4) | 95 (37.5) | 92.5 (36.5) |
| 230 (90.6) | G33705/06 | 92.5 (36.5) | 95 (37.5) | 97.5 (38.4) | 95 (37.5) | 92.5 (36.5) |
| 240 (94.5) | G33705/06 | 87.5 (34.5) | 92.5 (36.5) | 95 (37.5) | 92.5 (36.5) | 87.5 (34.5) |
| 250 (98.4) | G33705/06 | 87.5 (34.5) | 90 (35.5) | 92.5 (36.5) | 90 (35.5) | 87.5 (34.5) |
| 260 (102.4) | G33705/06 | 85 (33.5) | 90 (35.5) | 92.5 (36.5) | 90 (35.5) | 85 (33.5) |
| | | **^^^ Maximum Z – Vertical CG Height Restriction Values ^^^**<br>**NOTE: Minimum Z – Vertical Height Restriction Value is 30 cm (11.8 in) for all models above** | | | | |

| G-VAN G33503 with Standard Taper Springs, LT245/75R16 Bridgestone V-Steel Tire<br>CMVSS 126 and FMVSS 126 Compliance Certification<br>"X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions" | | | | | | |
|---|---|---|---|---|---|---|
| @ Maximum X Longitudinal CG Location from Front Axle CL cm (in) | Model Identification | @ Y – Lateral CG Offset Location cm (in) | | | | |
| | | -10 (-3.9) | -5 (-2) | 0 | 5 (2) | 10 (3.9) |
| 140 (55.1) | G33503 | 82.5 (32.5) | 85 (33.5) | 90 (35.4) | 85 (33.5) | 82.5 (32.5) |
| 150 (59.0) | G33503 | 87.5 (34.5) | 92.5 (36.5) | 92.5 (36.5) | 92.5 (36.5) | 87.5 (34.5) |
| 160 (62.9) | G33503 | 90 (35.5) | 100 (39.4) | 100 (39.4) | 100 (39.4) | 90 (35.5) |
| 170 (66.9) | G33503 | 90 (35.5) | 95 (37.5) | 100 (39.4) | 95 (37.5) | 90 (35.5) |
| 180 (70.9) | G33503 | 85 (33.5) | 92.5 (36.5) | 97.5 (38.4) | 92.5 (36.5) | 85 (33.5) |
| 190 (74.8) | G33503 | 85 (33.5) | 92.5 (36.5) | 95 (37.5) | 92.5 (36.5) | 85 (33.5) |
| 200 (78.7) | G33503 | 85 (33.5) | 87.5 (34.5) | 90 (35.5) | 87.5 (34.5) | 85 (33.5) |
| 210 (82.7) | G33503 | 80 (31.5) | 82.5 (32.5) | 87.5 (34.5) | 82.5 (32.5) | 80 (31.5) |
| | | ^^^ Maximum Z – Vertical CG Height Restriction Values ^^^<br>NOTE: Minimum Z – Vertical Height Restriction Value is 30 cm (11.8 in) for all models above | | | | |

| G-VAN G33503 with "option 9Q4 - Spring Rear Lowered",<br>LT245/75R16 Bridgestone V-Steel Tire<br>CMVSS 126 and FMVSS 126 Compliance Certification<br>"X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions" | | | | | | |
|---|---|---|---|---|---|---|
| @ Maximum X Longitudinal CG Location from Front Axle CL cm (in) | Model Identification | @ Y – Lateral CG Offset Location cm (in) | | | | |
| | | -10 (-3.9) | -5 (-2) | 0 | 5 (2) | 10 (3.9) |
| 140 (55.1) | G33503 | 77.5 (30.5) | 82.5 (32.5) | 85 (33.5) | 82.5 (32.5) | 77.5 (30.5) |
| 150 (59.0) | G33503 | 80 (31.5) | 87.5 (34.5) | 92.5 (36.5) | 87.5 (34.5) | 80 (31.5) |
| 160 (62.9) | G33503 | 85 (33.5) | 92.5 (36.5) | 95 (37.5) | 92.5 (36.5) | 85 (33.5) |
| 170 (66.9) | G33503 | 85 (33.5) | 92.5 (36.5) | 95 (37.5) | 92.5 (36.5) | 85 (33.5) |
| 180 (70.9) | G33503 | 85 (33.5) | 90 (35.5) | 92.5 (36.5) | 90 (35.5) | 85 (33.5) |
| 190 (74.8) | G33503 | 85 (33.5) | 90 (35.5) | 92.5 (36.5) | 90 (35.5) | 85 (33.5) |
| 200 (78.7) | G33503 | 85 (33.5) | 87.5 (34.5) | 90 (35.5) | 87.5 (34.5) | 85 (33.5) |
| 210 (82.7) | G33503 | 85 (33.5) | 85 (33.5) | 85 (33.5) | 85 (33.5) | 85 (33.5) |
| | | ^^^ Maximum Z – Vertical CG Height Restriction Values ^^^<br>NOTE: Minimum Z – Vertical Height Restriction Value is 30 cm (11.8 in) for all models above | | | | |

| G-VAN G33503 with "option 9Q4 - Spring Rear Lowered", LT225/75R16E General Tire<br>CMVSS 126 and FMVSS 126 Compliance Certification<br>"X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions" | | | | | | |
|---|---|---|---|---|---|---|
| @ Maximum X Longitudinal CG Location from Front Axle CL cm (in) | Model Identification | @ Y – Lateral CG Offset Location cm (in) | | | | |
| | | -10 (-3.9) | -5 (-2) | 0 | 5 (2) | 10 (3.9) |
| 140 (55.1) | G33503 | 87.5 (34.5) | 87.5 (34.5) | 92.5 (36.5) | 87.5 (34.5) | 87.5 (34.5) |
| 150 (59.0) | G33503 | 87.5 (34.5) | 87.5 (34.5) | 92.5 (36.5) | 87.5 (34.5) | 87.5 (34.5) |
| 160 (62.9) | G33503 | 92.5 (36.5) | 92.5 (36.5) | 95 (37.5) | 92.5 (36.5) | 92.5 (36.5) |
| 170 (66.9) | G33503 | 95 (37.5) | 97.5 (38.4) | 100 (39.4) | 97.5 (38.4) | 95 (37.5) |
| 180 (70.9) | G33503 | 92.5 (36.5) | 95 (37.5) | 100 (39.4) | 95 (37.5) | 92.5 (36.5) |
| 190 (74.8) | G33503 | 92.5 (36.5) | 95 (37.5) | 100 (39.4) | 95 (37.5) | 92.5 (36.5) |
| 200 (78.7) | G33503 | 92.5 (36.5) | 95 (37.5) | 100 (39.4) | 95 (37.5) | 92.5 (36.5) |
| 210 (82.7) | G33503 | 92.5 (36.5) | 95 (37.5) | 100 (39.4) | 95 (37.5) | 92.5 (36.5) |
| | | ^^^ Maximum Z – Vertical CG Height Restriction Values ^^^<br>NOTE: Minimum Z – Vertical Height Restriction Value is 30 cm (11.8 in) for all models above | | | | |

| G-VAN G33503 with "option 9R5 - Spring Rear Recreational Vehicle",<br>LT245/75R16 Bridgestone V-Steel Tire<br>CMVSS 126 and FMVSS 126 Compliance Certification<br>"X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions" | | | | | | |
|---|---|---|---|---|---|---|
| @ Maximum X Longitudinal CG Location from Front Axle CL cm (in) | Model Identification | @ Y – Lateral CG Offset Location cm (in) | | | | |
| | | -10 (-3.9) | -5 (-2) | 0 | 5 (2) | 10 (3.9) |
| 140 (55.1) | G33503 | 85 (33.5) | 90 (35.5) | 95 (37.5) | 90 (35.5) | 85 (33.5) |
| 150 (59.0) | G33503 | 87.5 (34.5) | 92.5 (36.5) | 95 (37.5) | 92.5 (36.5) | 87.5 (34.5) |
| 160 (62.9) | G33503 | 92.5 (36.5) | 95 (37.5) | 95 (37.5) | 95 (37.5) | 92.5 (36.5) |
| 170 (66.9) | G33503 | 92.5 (36.5) | 95 (37.5) | 97.5 (38.4) | 95 (37.5) | 92.5 (36.5) |
| 180 (70.9) | G33503 | 92.5 (36.5) | 95 (37.5) | 97.5 (38.4) | 95 (37.5) | 92.5 (36.5) |
| 190 (74.8) | G33503 | 92.5 (36.5) | 95 (37.5) | 97.5 (38.4) | 95 (37.5) | 92.5 (36.5) |
| 200 (78.7) | G33503 | 92.5 (36.5) | 95 (37.5) | 97.5 (38.4) | 95 (37.5) | 92.5 (36.5) |
| 210 (82.7) | G33503 | 90 (35.5) | 92.5 (36.5) | 97.5 (38.4) | 92.5 (36.5) | 90 (35.5) |
| | | ^^^ Maximum Z – Vertical CG Height Restriction Values ^^^<br>NOTE: Minimum Z – Vertical Height Restriction Value is 30 cm (11.8 in) for all models above | | | | |

| G-VAN G33803, with "option 9R5 - Spring Rear Recreational Vehicle"<br>LT245/75R16 Bridgestone V-Steel Tire<br>CMVSS 126 and FMVSS 126 Compliance Certification<br>"X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions" | | | | | | |
|---|---|---|---|---|---|---|
| @ Maximum X Longitudinal CG Location from Front Axle CL cm (in) | Model Identification | @ Y – Lateral CG Offset Location cm (in) | | | | |
| | | -10 (-3.9) | -5 (-2) | 0 | 5 (2) | 10 (3.9) |
| 150 (59.0) | G33803 | 79 (31.3) | 79 (31.3) | 83 (32.6) | 79 (31.3) | 79 (31.3) |
| 160 (62.9) | G33803 | 83 (32.6) | 84 (33.0) | 90 (35.5) | 84 (33.0) | 83 (32.6) |
| 170 (66.9) | G33803 | 83 (32.6) | 84 (33.0) | 90 (35.5) | 84 (33.0) | 83 (32.6) |
| 180 (70.9) | G33803 | 83 (32.6) | 90 (35.5) | 90 (35.5) | 90 (35.5) | 83 (32.6) |
| 190 (74.8) | G33803 | 83 (32.6) | 90 (35.5) | 90 (35.5) | 90 (35.5) | 83 (32.6) |
| 200 (78.7) | G33803 | 83 (32.6) | 86 (33.7) | 90 (35.5) | 86 (33.7) | 83 (32.6) |
| 210 (82.7) | G33803 | 83 (32.6) | 86 (33.7) | 90 (35.5) | 86 (33.7) | 83 (32.6) |
| 220 (86.6) | G33803 | 83 (32.6) | 86 (33.7) | 86 (33.7) | 86 (33.7) | 83 (32.6) |
| 230 (90.6) | G33803 | 81 (32.1) | 86 (33.7) | 86 (33.7) | 86 (33.7) | 81 (32.1) |
| 240 (94.5) | G33803 | 80 (31.5) | 86 (33.7) | 86 (33.7) | 86 (33.7) | 80 (31.5) |
| | | ^^^ Maximum Z – Vertical CG Height Restriction Values ^^^<br>NOTE: Minimum Z – Vertical Height Restriction Value is 30 cm (11.8 in) for all models above | | | | |

| G-VAN G33803, with Standard Taper Springs<br>LT245/75R16 Bridgestone V-Steel Tire<br>CMVSS 126 and FMVSS 126 Compliance Certification<br>"X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions" | | | | | | |
|---|---|---|---|---|---|---|
| @ Maximum X Longitudinal CG Location from Front Axle CL cm (in) | Model Identification | @ Y – Lateral CG Offset Location cm (in) | | | | |
| | | -10 (-3.9) | -5 (-2) | 0 | 5 (2) | 10 (3.9) |
| 190 (74.8) | G33803 | 85 (33.5) | 90 (35.5) | 95 (37.5) | 90 (35.5) | 85 (33.5) |
| 200 (78.7) | G33803 | 85 (33.5) | 90 (35.5) | 95 (37.5) | 90 (35.5) | 85 (33.5) |
| 210 (82.7) | G33803 | 85 (33.5) | 90 (35.5) | 95 (37.5) | 90 (35.5) | 85 (33.5) |
| 220 (86.6) | G33803 | 85 (33.5) | 90 (35.5) | 95 (37.5) | 90 (35.5) | 85 (33.5) |
| 230 (90.6) | G33803 | 85 (33.5) | 90 (35.5) | 95 (37.5) | 90 (35.5) | 85 (33.5) |
| 240 (94.5) | G33803 | 85 (33.5) | 90 (35.5) | 95 (37.5) | 90 (35.5) | 85 (33.5) |
| 250 (98.4) | G33803 | 85 (33.5) | 90 (35.5) | 92.5 (36.5) | 90 (35.5) | 85 (33.5) |
| 260 (102.4) | G33803 | 85 (33.5) | 90 (35.5) | 92.5 (36.5) | 90 (35.5) | 85 (33.5) |
| | | ^^^ Maximum Z – Vertical CG Height Restriction Values ^^^<br>NOTE: Minimum Z – Vertical Height Restriction Value is 30 cm (11.8 in) for all models above | | | | |

| G-VAN G33803, with "option 9R5 - Spring Rear Recreational Vehicle"<br>LT225/75R16E General Tire<br>(C7A 10,000 lb. with dual rear wheels R05)<br>CMVSS 126 and FMVSS 126 Compliance Certification<br>"X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions" | | | | | | |
|---|---|---|---|---|---|---|
| @ Maximum X Longitudinal CG Location from Front Axle CL cm (in) | Model Identification | @ Y – Lateral CG Offset Location cm (in) | | | | |
| | | -10 (-3.9) | -5 (-2) | 0 | 5 (2) | 10 (3.9) |
| 190 (74.8) | G33803 | 85 (33.5) | 95 (37.5) | 97.5 (38.4) | 95 (37.5) | 85 (33.5) |
| 200 (78.7) | G33803 | 92.5 (36.5) | 97.5 (38.4) | 97.5 (38.4) | 97.5 (38.4) | 92.5 (36.5) |
| 210 (82.7) | G33803 | 95 (37.5) | 97.5 (38.4) | 100 (39.4) | 97.5 (38.4) | 95 (37.5) |
| 220 (86.6) | G33803 | 95 (37.5) | 100 (39.4) | 102.5 (40.4) | 100 (39.4) | 95 (37.5) |
| 230 (90.6) | G33803 | 97.5 (38.4) | 100 (39.4) | 102.5 (40.4) | 100 (39.4) | 97.5 (38.4) |
| 240 (94.5) | G33803 | 97.5 (38.4) | 100 (39.4) | 102.5 (40.4) | 100 (39.4) | 97.5 (38.4) |
| 250 (98.4) | G33803 | 97.5 (38.4) | 100 (39.4) | 102.5 (40.4) | 100 (39.4) | 97.5 (38.4) |
| 260 (102.4) | G33803 | 97.5 (38.4) | 100 (39.4) | 102.5 (40.4) | 100 (39.4) | 97.5 (38.4) |
| | | ^^^ Maximum Z – Vertical CG Height Restriction Values ^^^<br>NOTE: Minimum Z – Vertical Height Restriction Value is 30 cm (11.8 in) for all models above | | | | |

| GMT610 G33503, with Standard Taper Springs<br>LT225/75R16E General Tire<br>(C7A 10,000 lb. with dual rear wheels R05)<br>CMVSS 126 and FMVSS 126 Compliance Certification<br>"X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions" | | | | | | |
|---|---|---|---|---|---|---|
| @ Maximum X Longitudinal CG Location from Front Axle CL cm (in) | Model Identification | @ Y – Lateral CG Offset Location cm (in) | | | | |
| | | -10 (-3.9) | -5 (-2) | 0 | 5 (2) | 10 (3.9) |
| 160 (62.9) | G33503 | 92.5 (36.5) | 95 (37.5) | 95 (37.5) | 95 (37.5) | 92.5 (36.5) |
| 170 (66.9) | G33503 | 90 (35.5) | 95 (37.5) | 95 (37.5) | 95 (37.5) | 90 (35.5) |
| 180 (70.9) | G33503 | 90 (35.5) | 95 (37.5) | 97.5 (38.4) | 95 (37.5) | 90 (35.5) |
| 190 (74.8) | G33503 | 90 (35.5) | 95 (37.5) | 97.5 (38.4) | 95 (37.5) | 90 (35.5) |
| 200 (78.7) | G33503 | 95 (37.5) | 97.5 (38.4) | 100 (39.4) | 97.5 (38.4) | 95 (37.5) |
| 210 (82.7) | G33503 | 97.5 (38.4) | 100 (39.4) | 102.5 (40.4) | 100 (39.4) | 97.5 (38.4) |
| 220 (86.6) | G33503 | 97.5 (38.4) | 100 (39.4) | 102.5 (40.4) | 100 (39.4) | 97.5 (38.4) |
| 230 (90.6) | G33503 | 92.5 (36.5) | 97.5 (38.4) | 102.5 (40.4) | 97.5 (38.4) | 92.5 (36.5) |
| | | ^^^ Maximum Z – Vertical CG Height Restriction Values ^^^<br>NOTE: Minimum Z – Vertical Height Restriction Value is 30 cm (11.8 in) for all models above | | | | |

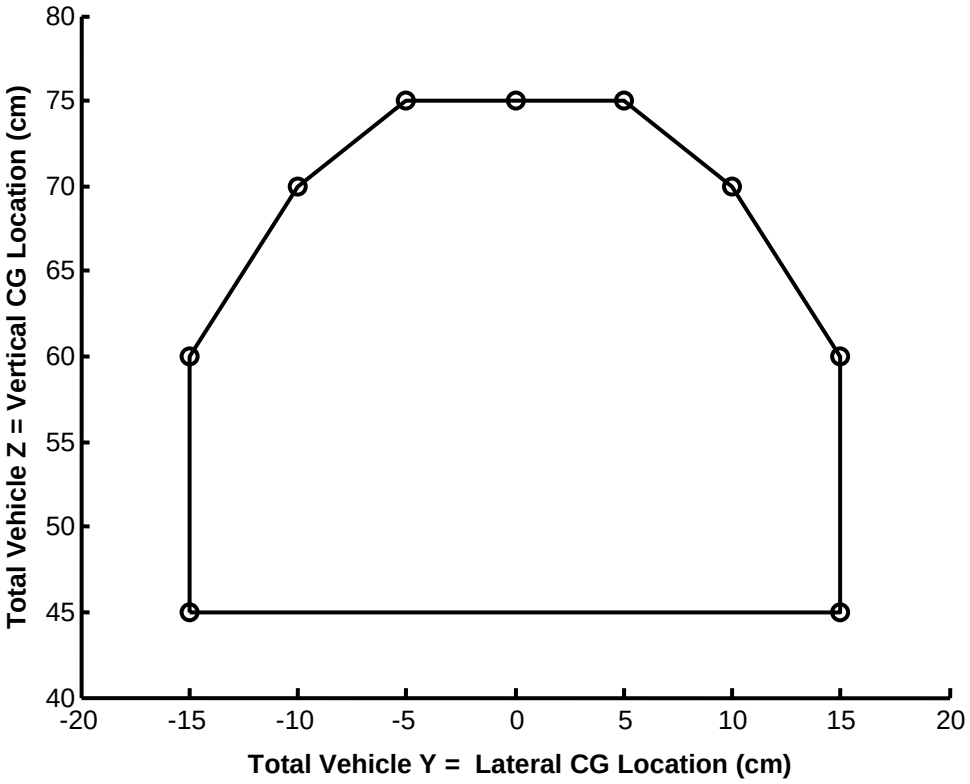
**GMT610 G33803, with Standard Taper Springs**
**LT225/75R16E General Tire**
**(C7A 10,000 lb. with dual rear wheels R05)**
**CMVSS 126 and FMVSS 126 Compliance Certification**
**"X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions"**

| @ Maximum X Longitudinal CG Location from Front Axle CL cm (in) | Model Identification | @ Y – Lateral CG Offset Location cm (in) | | | | |
|---|---|---|---|---|---|---|
| | | -10 (-3.9) | -5 (-2) | 0 | 5 (2) | 10 (3.9) |
| 190 (74.8) | G33803 | 95 (37.5) | 97.5 (38.4) | 100 (39.4) | 97.5 (38.4) | 95 (37.5) |
| 200 (78.7) | G33803 | 95 (37.5) | 97.5 (38.4) | 100 (39.4) | 97.5 (38.4) | 95 (37.5) |
| 210 (82.7) | G33803 | 95 (37.5) | 97.5 (38.4) | 100 (39.4) | 97.5 (38.4) | 95 (37.5) |
| 220 (86.6) | G33803 | 97.5 (38.4) | 100 (39.4) | 102.5 (40.4) | 100 (39.4) | 97.5 (38.4) |
| 230 (90.6) | G33803 | 97.5 (38.4) | 100 (39.4) | 102.5 (40.4) | 100 (39.4) | 97.5 (38.4) |
| 240 (94.5) | G33803 | 97.5 (38.4) | 100 (39.4) | 102.5 (40.4) | 100 (39.4) | 97.5 (38.4) |
| 250 (98.4) | G33803 | 97.5 (38.4) | 100 (39.4) | 102.5 (40.4) | 100 (39.4) | 97.5 (38.4) |
| 260 (102.4) | G33803 | 100 (39.4) | 102.5 (40.4) | 105 (41.4) | 102.5 (40.4) | 100 (39.4) |
| | | ^^^ Maximum Z – Vertical CG Height Restriction Values ^^^ NOTE: Minimum Z – Vertical Height Restriction Value is 30 cm (11.8 in) for all models above | | | | |

**GMT610 G33503, with "option 9R5 – Spring Rear Recreational Vehicle"**
**LT225/75R16E General Tire**
**(C7A 10,000 lb. with dual rear wheels R05)**
**CMVSS 126 and FMVSS 126 Compliance Certification**
**"X = Longitudinal, Y = Lateral and Z = Vertical Center of Gravity (CG) Restrictions"**

| @ Maximum X Longitudinal CG Location from Front Axle CL cm (in) | Model Identification | @ Y – Lateral CG Offset Location cm (in) | | | | |
|---|---|---|---|---|---|---|
| | | -10 (-3.9) | -5 (-2) | 0 | 5 (2) | 10 (3.9) |
| 160 (62.9) | G33503 | 90 (35.5) | 90 (35.5) | 92.5 (36.5) | 90 (35.5) | 90 (35.5) |
| 170 (66.9) | G33503 | 90 (35.5) | 92.5 (36.5) | 95 (37.5) | 92.5 (36.5) | 90 (35.5) |
| 180 (70.9) | G33503 | 90 (35.5) | 92.5 (36.5) | 97.5 (38.4) | 92.5 (36.5) | 90 (35.5) |
| 190 (74.8) | G33503 | 90 (35.5) | 95 (37.5) | 97.5 (38.4) | 95 (37.5) | 90 (35.5) |
| 200 (78.7) | G33503 | 95 (37.5) | 97.5 (38.4) | 100 (39.4) | 97.5 (38.4) | 95 (37.5) |
| 210 (82.7) | G33503 | 95 (37.5) | 97.5 (38.4) | 100 (39.4) | 97.5 (38.4) | 95 (37.5) |
| 220 (86.6) | G33503 | 95 (37.5) | 97.5 (38.4) | 100 (39.4) | 97.5 (38.4) | 95 (37.5) |
| 230 (90.6) | G33503 | 97.5 (38.4) | 100 (39.4) | 102.5 (40.4) | 100 (39.4) | 97.5 (38.4) |
| 240 (94.5) | G33503 | 100 (39.4) | 102.5 (40.4) | 105 (41.4) | 102.5 (40.4) | 100 (39.4) |
| | | ^^^ Maximum Z – Vertical CG Height Restriction Values ^^^ NOTE: Minimum Z – Vertical Height Restriction Value is 30 cm (11.8 in) for all models above | | | | |

**CMVSS 126 and FMVSS 126 Compliance Certification Y = Lateral and Z = Vertical Center of Gravity Restriction Visual Representation <u>EXAMPLE</u> shown in centimeters**




For upfitter use and applicable to CMVSS 126 and FMVSS 126, the longitudinal and vertical vehicle center of gravity location can be approximated by following the formula below and by referencing data elements within CMVSS 105 and FMVSS 105 – HYDRAULIC AND ELECTRIC BRAKE SYSTEMS or CMVSS 135 and FMVSS 135 LIGHT VEHICLE BRAKE SYSTEMS, … ALLOWABLE CENTER OF GRAVITY CHARTS.

$$d = \frac{[Wrc + Wrb]\ WB}{Wt}$$

$$h = \frac{[h1*Wc + h2*Wb]}{Wt}$$

| | | |
|---|---|---|
| d | = | horizontal distance from front wheels to completed vehicle center of gravity cm (in) |
| h | = | vertical distance from ground to completed vehicle center of gravity cm (in) |
| Wrc | = | rear component of Chassis weight kg (lb) |
| Wrb | = | rear component of body weight kg (lb) |
| WB | = | vehicle wheelbase cm (in) |
| Wt | = | total weight of chassis and body kg (lb) |
| h1 | = | center of gravity height from ground of the Bare Chassis: Based on model applicability, refer to the h1 values listed in this document within: CMVSS 105/FMVSS 105 - HYDRAULIC AND ELECTRIC BRAKE SYSTEMS, or CMVSS 135/FMVSS 135 - LIGHT VEHICLE BRAKE SYSTEMS. |
| Wc | = | total weight of vehicle as manufactured by General Motors kg (lb) |
| h2 | = | center of gravity height of body from ground cm (in) |
| Wb | = | total weight of body kg (lb) |

In addition, the equation to calculate the lateral vehicle center of gravity location from center of vehicle can be estimated by using the following formula:

lateral offset from centerline of vehicle = [{(RF corner weight kg (lb) + RR corner weight) kg (lb) / (total vehicle weight kg (lb))} - 0.5] * vehicle track width of 1721.0 mm (67.8in).

If the lateral offset from centerline of vehicle calculation above results in a positive number, the lateral vehicle offset center of gravity is toward the right side (passenger) of the vehicle.

Alternatively, if the lateral offset from centerline of vehicle calculation above results in a negative number, the lateral vehicle offset center of gravity is toward the left side (driver) of the vehicle.

## CMVSS 131 and FMVSS 131 – SCHOOL BUS PEDESTRIAN SAFETY DEVICES
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

Conformity with CMVSS 131 and FMVSS 131 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard.

## FMVSS 138 – TIRE PRESSURE MONITORING SYSTEMS (If Equipped)
## Applies to all types of Incomplete Vehicles Contained in this Document
## 4536 kg (10,000 lb) GVWR or less

**TYPE 2 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to FMVSS 138, providing the vehicle is equipped with a Tire Pressure Monitoring System (TPMS) installed by General Motors, and no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below (if equipped):

| | |
|---|---|
| Body control module | Tires and Wheels |
| Instrument panel cluster | TPMS receiver module |
| Owners Manual instructions | TPMS sensors integral to the valve stems |
| Remote start coax antennae (if equipped) | Vehicle wiring harness |

If equipped with a TPMS system as built by General Motors, incomplete vehicles shipped from the GM assembly plant will have tire pressures set for shipping purposes only. It is responsibility of the final stage manufacturer to label the vehicle in compliance to FMVSS 138. In addition, it is the responsibility of the final stage manufacturer to ensure the TPMS system is calibrated to the values printed on the final stage manufacturer's Tire Certification Label or Tire Information Label.

NOTES: Wheelbase alteration, and/or addition of components may interfere with the TPMS radio frequency signal that may result in a malfunction warning displayed in the Driver Information Center (DIC). **If this condition is observed, go to the GM Upfitter Integration website located at www.gmupfitter.com**

The TPMS is not required to monitor the spare tire, either when it is stowed or when it is installed on the vehicle.

## CMVSS 201 and FMVSS 201 – OCCUPANT PROTECTION IN INTERIOR IMPACT

**MVSS 201 contains two components: 201L (Lower Interior, FMVSS 201 Section S5 and CMVSS 201 equivalent) applies to instrument panels, seat backs, interior compartment doors, sun visors, door armrests and seat armrests, and 201U (Upper Interior FMVSS 201 Sections S6 –**

**S10) applies to the pillars, seat belt anchorages located on a pillar, front header, side roof rails, rear header, upper roof, sliding door track and door frames.**

## For All Models 4536 kg (10,000 lb) GVWR or less

### 201L (Lower Interior, FMVSS 201 Section S5 and CMVSS 201 equivalent)

**TYPE 1 The following statement is applicable to all models 4536 kg (10,000 lb) GVWR or less types of incomplete vehicles contained in this document (unless otherwise noted on the cover)**

This incomplete vehicle, when completed, will conform to 201L (Lower Interior, FMVSS 201 Section S5 and CMVSS 201 equivalent), providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Air bag system
Armrests, folding and stationary
Body structure
Center console
Center console compartment door (if equipped)
Door trim
Door structure
DVD rear entertainment system
Headliner
Instrument panel
Interior compartment doors
Interior door panel armrests
Overhead console
Seats
Seats (if equipped with folding armrest)
Seats, seat backs, and head restraints
Sun visor mounts
Sun visors
Upper interior trim

### 201L (Lower Interior, FMVSS 201 Section S5 and CMVSS 201 equivalent)

**TYPE 3 The following statement is applicable to all models 4536 kg (10,000 lb) GVWR or less types of incomplete vehicles contained in this document with respect to any seats, seat belts or seat assembly anchorages installed by the intermediate or final stage manufacturer (unless otherwise noted on the cover).**

Conformity with 201L (Lower Interior, FMVSS 201 Section S5 and CMVSS 201 equivalent), cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## Applicable to Passenger Van Models 4536 kg (10,000 lb) GVWR or less

### 201U (Upper Interior FMVSS 201 Sections S6 – S10)

**TYPE 1 The following statement is applicable to Passenger Van models 4536 kg (10,000 lb) GVWR or less types of incomplete vehicles contained in this document (unless otherwise noted on the cover)**

This incomplete vehicle, when completed, will conform to 201U (Upper Interior FMVSS 201 Sections S6 – S10), providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

A, B, C, D pillar structure
Assist handles
Door trim
Door structure
DVD rear entertainment system
Front seat air bags
Front seat adjusters
Headliner
Instrument panel
Overhead interior compartment doors
Overhead lighting and console
Roof structure
Roof rail airbag system
Sensing diagnostic module (SDM)
Sun visors
Upper interior trim

NOTE: Compliance to FMVSS 201, Section S6 – S10, requires trim and energy absorbing countermeaures either built into or underneath the headliner, garnish moldings, D-Ring covers, door trim and other interior trim components.

## Applicable to ONLY the Front Seating Positions of the Cargo or Cutaway Van models 4536 kg (10,000 lb) GVWR or less

**201U (Upper Interior FMVSS 201 sections S6 – S10)**

**TYPE 1 The following statement is applicable to ONLY the front seating positions of the Cargo or Cutaway Van models 4536 kg (10,000 lb) GVWR or less, types of incomplete vehicles contained in this document (unless otherwise noted on the cover)**

This incomplete vehicle, when completed, will conform to 201U (Upper Interior FMVSS 201 sections S6 – S10), providing no components or panels are installed by the subsequent stage manufacturer forward of a zone measured 300 mm (11.8 inches) rearward from the driver's seating reference point, and no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

A and B pillar structure
Assist handles
Door trim
Door structure
DVD rear entertainment system
Front seat air bags
Headliner
Instrument panel
Overhead interior compartment doors
Overhead lighting and console
Roof structure
Roof rail airbag system
Sensing diagnostic module (SDM)
Sun visors
Upper interior trim

NOTE: Compliance to 201U (Upper Interior FMVSS 201 sections S6 – S10), requires trim and energy absorbing countermeaures either built into or underneath the headliner, garnish moldings and D-Ring covers, door trim and other interior trim components. Incomplete Cargo Vans and Cutaway Vans as built by General Motors are fully trimmed for the driver and front passenger seating positions and will comply with FMVSS 201, Section S6 – S10.

## Applicable to Seating Positions OTHER THAN the Front Row for Cargo and Cutaway Van models 4536 kg (10,000 lb) GVWR or less

**201U (Upper Interior FMVSS 201 sections S6 – S10)**

**TYPE 3 The following statement is applicable to Seating Positions OTHER THAN the Front Row for Cargo and Cutaway Van models 4536 kg (10,000 lb) GVWR or less types of incomplete vehicles contained in this document.**

Conformity with 201U (Upper Interior FMVSS 201 sections S6 – S10), cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

NOTE: Applicable to all Cargo, Cutaway or Passenger Incomplete Vehicles, any seats installed by intermediate or final stage manufacturers must comply with CMVSS 201 and FMVSS 201. In addition, the "H" point of any seats installed by the intermediate or final stage manufacturers must be located as shown in the **GM Upfitter Integration website located at www.gmupfitter.com**

## CMVSS 202 and FMVSS 202A – HEAD RESTRAINTS
## Applies to all types of Incomplete Vehicles Contained in this Document

## 4536 kg (10,000 lb) GVWR or less

**TYPE 1 The following statement is applicable to all Front Seating Positions in all types of incomplete vehicles contained in this document, 4536 kg (10,000 lb) GVWR or less (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 202 and FMVSS 202A providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below

Front seat assemblies including head restraints
Owner Manual Instructions

**TYPE 3 The following statement is applicable to all designated seating positions in all types of incomplete vehicles contained in this document, 4536 kg (10,000 lb) GVWR or less, with any seat delete option and any seat installed by an intermediate or final stage manufacturer or when any alterations are made to Rear Seating Positions as manufactured by GM (unless otherwise noted on the cover).**

Conformity with CMVSS 202 and FMVSS 202A cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard.

NOTE: If the intermediate or final stage manufacturer adds or modifies seats as manufactured by General Motors, they are also responsible to provide an addendum to the Owner Manual in order to meet FMVSS 202A requirements.

## CMVSS 203 and FMVSS 203 – Impact Protection for the Driver from the Steering Control System
## Applies to all types of Incomplete Vehicles Contained in this Document
## 4536 kg (10,000 lb) GVWR or less

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document, 4536 kg (10,000 lb) or less (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 203 and FMVSS 203 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Driver's seat assembly
Instrument panel
Steering control system including related hardware
Steering wheel, column, and shaft

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document, 4536 kg (10,000 lb) GVWR or less, with any driver seat delete option (unless otherwise noted on the cover).**

Conformity with CMVSS 203 and FMVSS 203 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 204 and FMVSS 204 – STEERING CONTROL REARWARD DISPLACEMENT
## Applies to all types of Incomplete Vehicles Contained in this Document
## 4536 kg (10,000 lb) GVWR or less and an unloaded vehicle weight of 2495 kg (5,500 lb) or less

**TYPE 2 The following statement is applicable to all types of incomplete vehicles contained in this document, 4536 kg (10,000 lb) GVWR or less and an unloaded vehicle weight of 2495 kg (5,500 lb) or less (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 204 and FMVSS 204 providing the dimension and mass as well as other restrictions found in MVSS 301 Table A, are not exceeded, and no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below that would affect the steering control system displacement in a 48 k.p.h. (30 m.p.h.) fixed barrier impact:

- Frame assembly and mounting system
- Front impact bar assembly and mounting system
- Hood and hinge assemblies
- Powertrain and powertrain mounting system
- Steering control system including related hardware
- Steering wheel, column, and shaft assembly
- Tires and wheels
- Vehicle/body front end sheet metal components
- Vehicle/body front end structural components
- Vehicle/body roof structure and components

**TYPE 3 The following statement is applicable to any type of incomplete vehicle contained in this document, 4536 kg (10,000 lb) GVWR or less, with any driver seat delete option.**

Conformity with CMVSS 204 and FMVSS 204 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard.

## CMVSS 205 and FMVSS 205 – GLAZING MATERIALS
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 205 and FMVSS 205 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

- Glazing material
- The monogram
- Visibility of the monogram
- Windshield shade banding

Final compliance with CMVSS 205 and FMVSS 205 is the responsibility of the final stage manufacturer for any modifications, or added material, parts, components, or systems.

## CMVSS 206 and FMVSS 206 – DOOR LOCKS AND DOOR RETENTION COMPONENTS
## Applies to all types of Incomplete Vehicles Contained in this Document

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 206 and FMVSS 206 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Door and pillar systems, including but not limited to:

- Body rear end upper and lower panel
- Door hinges
- Door latch strikers and striker plates
- Door latches
- Door locks
- Door pillars
- Door track (for sliding door)
- Door wedges
- Doors
- Inside lock control linkages
- Interior and Exterior door handles

Final compliance with CMVSS 206 and FMVSS 206 is the responsibility of the final stage manufacturer for any modifications, or added material, parts, components, or systems.

**TYPE 3 The following statement is applicable to any type of incomplete vehicle contained in this document as manufactured by General Motors with any door delete option.**

Conformity with CMVSS 206 and FMVSS 206 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard.

## CMVSS 207 and FMVSS 207 – SEATING SYSTEMS
## Applies to all types of Incomplete Vehicles Contained in this Document

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 207 and FMVSS 207 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

- Floor pan assemblies
- Folding seat or seat back latch assembly
- Seat adjuster assembly
- Seat anchorage brackets, reinforcements, attachment hardware, etc.
- Seat assembly
- Seat or seat back latch assembly
- Seat or seat back latch release control
- Seat or seat back latch striker
- Seat riser

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document with respect to any seats, seat belt assemblies or seat belt assembly anchorages installed by the intermediate or final stage manufacturer (unless otherwise noted on the cover).**

Conformity with CMVSS 207 and FMVSS 207 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 208 and FMVSS 208 – OCCUPANT CRASH PROTECTION
## Applies to Incomplete Vehicle Types Designated Below

**TYPE 1 The following statement is applicable to all types of vehicles contained in this document (unless otherwise noted on the cover) with a GVWR greater than 3856 kg (8,500 lb), and built by General Motors with complete seats and seat belt assemblies.**

This incomplete vehicle, when completed, will conform to CMVSS 208 and FMVSS 208 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

- Owner Manual instructions
- Seat anchorages
- Seat assemblies
- Seat belt anchorages
- Seat belt assemblies
- Seat belt warning system

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document with respect to any seats, seat belt assemblies or seat belt assembly anchorages installed by the intermediate or final stage manufacturer (unless otherwise noted on the cover).**

Conformity with CMVSS 208 and FMVSS 208 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard.

## CMVSS 209 and FMVSS 209 – SEAT BELT ASSEMBLIES
## Applies to all types of Incomplete Vehicles Contained in this Document

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

The seat belt assembly provided by General Motors when mounted to its original attachments locations at any designated seating position, will conform to CMVSS 209 and FMVSS 209 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

- Owner Manual instructions
- Seat anchorages
- Seat assemblies
- Seat belt anchorages
- Seat belt assemblies

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document with respect to any seats, seat belt assemblies or seat belt assembly anchorages installed by the intermediate or final stage manufacturer (unless otherwise noted on the cover).**

Conformity with CMVSS 209 and FMVSS 209 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 210 and FMVSS 210 – SEAT BELT ASSEMBLY ANCHORAGES
## Applies to all types of Incomplete Vehicles Contained in this Document

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 210 and FMVSS 210 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

- B, C, and D-pillar structures
- Child restraint system including lower and top tether anchorages, seat brackets, plates and reinforcements
- Floor pan assembly
- Owner Manual instructions
- Roof structure
- Seat assemblies
- Seat belt assemblies
- Seat belt anchorage brackets, plates, and reinforcements
- Seat belt routing
- Seat position/adjustment capability

NOTE: The right front passenger seat as manufactured by General Motors (if equipped) will not comply with FMVSS 210 School Bus requirements for vehicles completed on or after October 21, 2011.

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document with respect to any seats, seat belt assemblies or seat belt assembly anchorages installed by the intermediate or final stage manufacturer (unless otherwise noted on the cover).**

Conformity with CMVSS 210 and FMVSS 210 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 210.1 – TETHER ANCHORAGES FOR RESTRAINT SYSTEMS
## Applies to Incomplete Vehicles Contained in this Document with 12 or 15 passenger seating to be completed as a Bus and not to be completed as a School Bus with a GVWR of 4536 kg (10,000 lb) or less

**TYPE 1 The following statement is applicable to a bus not to be completed as a school bus with a GVWR of 4536 kg (10,000 lb) or less as manufactured by General Motors with the seats supplied by General Motors for the following seat options (unless otherwise noted on the cover):**

Twelve passenger seating Fifteen passenger seating

This incomplete vehicle, when completed, will conform to CMVSS 210.1 provided the original equipment seats are not replaced, no seating positions are removed or added, and no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

- Air bag manual cut-off switch (if equipped)
- Child restraint system including lower and top tether anchorages, seat brackets, plates and reinforcements
- Access to lower anchorage system
- Head restraints/head rests
- Floor pan assembly
- Labeling requirements
- Owner Manual instructions
- Seat assemblies
- Seat belt assemblies
- Seat belt anchorage brackets, plates, and reinforcements
- Seat belt routing
- Seat position/adjustment capability

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document with respect to any seats, seat belt assemblies or seat belt assembly anchorages installed by the intermediate or final stage manufacturer (unless otherwise noted on the cover).**

Conformity with CMVSS 210.1 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 210.1 – TETHER ANCHORAGES

## Applies to Incomplete Vehicles contained in this Document completed as a school bus or multifunction school activity bus regardless of GVWR

**TYPE 3 The following statement is applicable to all incomplete vehicle types contained in this document completed as a school bus or multifunction school activity bus regardless of GVWR (unless otherwise noted on the cover).**

**.**

Conformity with CMVSS 210.1 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 210.2 – LOWER UNIVERSAL ANCHORAGE SYSTEMS FOR RESTRAINT SYSTEMS AND BOOSTER CUSHIONS

## Applies to Incomplete Vehicles Contained in this Document with 12 or 15 passenger seating to be completed as a Bus, and not to be completed as a School Bus with a GVWR of 4536 kg (10,000 lb) or less

**TYPE 1 The following statement is applicable to a bus not to be completed as a school bus with a GVWR of 4536 kg (10,000 lb) or less as manufactured by General Motors with the seats supplied by General Motors for the following seat options (unless otherwise noted on the cover):**

Twelve passenger seating Fifteen passenger seating

This incomplete vehicle, when completed, will conform to CMVSS 210.2 provided the original equipment seats are not replaced, no seating positions are removed or added, and no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Air bag manual cut-off switch (if equipped)
Child restraint system including lower and top tether anchorages, seat brackets, plates and reinforcements
Access to lower anchorage system
Floor pan assembly
Labeling requirements
Owner Manual instructions
Seat assemblies
Seat belt assemblies
Seat belt anchorage brackets, plates, and reinforcements
Seat belt routing
Seat position/adjustment capability

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document with respect to any seats, seat belt assemblies or seat belt assembly anchorages installed by the intermediate or final stage manufacturer (unless otherwise noted on the cover).**

Conformity with CMVSS 210.2 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 210.2 – LOWER UNIVERSAL ANCHORAGE SYSTEMS FOR RESTRAINT SYSTEMS AND BOOSTER CUSHIONS

## Applies to Incomplete Vehicles contained in this Document completed as a school bus or multifunction school activity bus regardless of GVWR

**TYPE 3 The following statement is applicable to all incomplete vehicle types contained in this document completed as a school bus or multifunction school activity bus regardless of GVWR (unless otherwise noted on the cover).**

Conformity with CMVSS 210.2 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 212 and FMVSS 212 – WINDSHIELD MOUNTING

## Cargo and Passenger Van 4536 kg (10,000 lb) GVWR or less

**TYPE 2 The following statement is applicable to Cargo and Passenger Van incomplete vehicles contained in this document (unless otherwise noted on the cover) with a 4536 kg (10,000 lb) GVWR or less when completed will conform to CMVSS 212 and FMVSS 212 if:**

A. No alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Air bag crash sensors
Air bag system including covers and module
Air bag system wiring harnesses, connectors, and fuses/relays
Dash panel and cowl assembly
Doors and hinge assemblies
Frame assembly and mounting system
Front impact bar assembly and mounting system
Hood and hinge assemblies
Powertrain and powertrain mounting system
Seat anchorages
Seat assemblies
Seat belt anchorages
Seat belt assemblies
Sensing and Diagnostic Module (SDM) and retainers/brackets
Steering control system including related hardware
Steering wheel, column, and shaft assembly
Sun visor assemblies
Vehicle/body front sheet metal components/reinforcements
Vehicle/body front structural components/reinforcements
Vehicle/body roof structure and components
Windshield and windshield mounting system
Windshield frame/frame reinforcement

B. The dimension and mass, as well as other restrictions found in MVSS 301 Table A, are not exceeded.

C. The minimum vertical clearance between the cab roof and any portion of the installed body or accessories that extends over the cab roof must not be less than 20 cm (8 in).

D. During a 48 k.p.h. (30 m.p.h.) frontal barrier impact test, no component installed by any intermediate or final stage manufacturer shall move forward from its permanently mounted position.

## CMVSS 212 and FMVSS 212 – WINDSHIELD MOUNTING
## Cutaway Vans 4536 kg (10,000 lb) GVWR or less

**TYPE 3 The following statement is applicable to Cutaway Van with a 4536 kg (10,000 lb) GVWR or less types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

Conformity with CMVSS 212 and FMVSS 212 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard.

## CMVSS 213.4 and FMVSS 213 – BUILT- IN CHILD RESTRAINT SYSTEMS AND BUILT-IN BOOSTER CUSHIONS
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

Conformity with CMVSS 213.4 and FMVSS 213 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard.

## CMVSS 214 and FMVSS 214 – SIDE IMPACT PROTECTION
## Cargo and Passenger Van 4536 kg (10,000 lb) GVWR or less – Static

**TYPE 1 The following statement is applicable to Cargo and Passenger Vans incomplete vehicles contained in this document with a 4536 kg (10,000 lb) GVWR or less for static requirements (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 214 and FMVSS 214 static test requirements providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Body structure including roof structure and components
Body sheet metal components/reinforcements
Door assemblies
Door hinges
Door latch mechanisms
Door latch strikers and striker plates
Door pillars
Door trim panels
Door wedges
Door window mechanisms
Seat anchorages
Seat assemblies
Seat belt anchorages
Seat belt assemblies
Side curtain airbag system (if equipped)
Tires and Wheels
Upper interior trim including headliner
Vehicle frame

## CMVSS 214 and FMVSS 214 – SIDE IMPACT PROTECTION
## Cutaway Van 4536 kg (10,000 lb) GVWR or less – Static

**TYPE 3 The following statement is applicable to Cutaway Van with a 4536 kg (10,000 lb) GVWR or less for static requirements (unless otherwise noted on the cover).**

Conformity with CMVSS 214 and FMVSS 214 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 214 and FMVSS 214 – SIDE IMPACT PROTECTION
## Cargo, Passenger and Cutaway Van 4536 kg (10,000 lb) GVWR or less – Oblique Vehicle to Pole Side Impact Requirements equipped with roof rail airbags and side impact air bags

**TYPE 1 The following statement is applicable to Passenger, Cargo and Cutaway vans equipped with a roof rail air bag system and GM front seats (equipped with side impact air bags) with a 4536 kg (10,000 lb) GVWR or less for oblique vehicle to pole side impact requirements (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 214 and FMVSS 214 oblique vehicle to pole side impact requiremnts providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

- Air bag crash sensors
- Air bag system including covers and module
- Air bag system wiring harnesses, connectors, and fuses/relays
- Body structure including roof structure and components
- Body sheet metal components/reinforcements
- Front door assemblies
- Front door hinges
- Front door latch mechanisms
- Front door latch strikers and striker plates
- Front door pillars
- Front door trim panels
- Front door wedges
- Front door window mechanisms
- Front seat air bag
- Front seat anchorages
- Front seat assemblies
- Front seat belt anchorages
- Front seat belt assemblies
- Sensing and Diagnostic Module (SDM) and retainers/brackets
- Roof rail air bag system (if equipped)
- Tires and Wheels
- Upper interior trim including headliner
- Vehicle frame

## CMVSS 214 and FMVSS 214 – SIDE IMPACT PROTECTION
## Cutaway Van 4536 kg (10,000 lb) GVWR or less – Oblique Vehicle to Pole Side Impact Requirements

**TYPE 3 The following statement is applicable all Passenger, Cargo and Cutaway Vans without roof rail air bags or without GM front seats (equipped with side impact air bags) or a Cutaway Van with a 9T7 door delete option with a 4536 kg (10,000 lb) GVWR or less for oblique vehicle to pole side impact requirements (unless otherwise noted on the cover).**

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Conformity with CMVSS 214 and FMVSS 214 oblique vehicle to pole side impact requiremnts cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

NOTE from FMVSS 214 S5(c):

Exclusions from S9 (vehicle-to-pole test). The following vehicles are excluded from S9 (vehicle-to-pole test) (wholly or in limited part, as set forth below):
(1) Motor homes;
(2) Ambulances and other emergency rescue/medical vehicles (including vehicles with firefighting equipment) except police cars;
(3) Vehicles with a lowered floor or raised or modified roof and vehicles that have had the original roof rails removed and not replaced;

(4) Vehicles in which the seat for the driver or right front passenger has been removed and wheelchair restraints installed in place of the seat are excluded from meeting the vehicle-to-pole test at that position; and
(5) Vehicles that have no doors, or exclusively have doors that are designed to be easily attached or removed so that the vehicle can be operated without doors.

## CMVSS 216 and FMVSS 216a – ROOF CRUSH RESISTANCE
## Cargo and Passenger Van 4536 kg (10,000 lb) GVWR or less

**TYPE 2 The following statement is applicable to cargo and passenger vans 4536 kg (10,000 lb.) or less contained in this document (unless otherwise noted on the cover) will conform to CMVSS 216 and FMVSS 216a if:**

A. No alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

- Doors and hinge assemblies
- Frame assembly and mounting system
- Seats
- Seat adjuster
- Roof rail air bags (if equipped)
- Vehicle A, B and C pillar structure
- Vehicle/body front structural components/reinforcements
- Vehicle/body roof structure and components
- Windshield and windshield mounting system
- Windshield frame/frame reinforcement

B. The unloded vehicle weight of the completed vehicle does not exceed 3606 kg (7950 lbs.)

## CMVSS 216 and FMVSS 216a – ROOF CRUSH RESISTANCE
## Applies to Cutaway Vans contained in this Document with a GVWR 4536 kg (10,000 lb) GVWR or less

**TYPE 2 The following statement is applicable to all cutaway vans with a GVWR of 4536 kg (10,000 lb) or less completed as a Truck. (unless otherwise noted on the cover).**

This incomplete vehicle, when completed as a Truck will conform to the performance requirements of CMVSS 216 and FMVSS 216a.

**TYPE 3 The following statement is applicable to cutaway vans with a GVWR of 4536 kg (10,000 lb) or less not completed as a Truck. (unless otherwise noted on the cover).**

Conformity with CMVSS 216 and FMVSS 216a cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 217 and FMVSS 217 – BUS EMERGENCY EXITS AND WINDOW RETENTION AND RELEASE
## Cargo Van and Cutaway Van with Bus and School Bus Option

**TYPE 3 The following statement is applicable to Cargo Van and Cutaway Van with Bus and School Bus Option incomplete vehicle types contained in this document (unless otherwise noted on the cover)**.

Conformity with CMVSS 217 and FMVSS 217 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard, other than the “Note” immediately following.

NOTE: The following windows installed on this vehicle by General Motors meet the window retention requirements of this standard:

Left hand front (driver) side door glass
Windshield
Right hand front (passenger) side door glass (if equipped)

## CMVSS 217 and FMVSS 217 – BUS EMERGENCY EXITS AND WINDOW RETENTION AND RELEASE
## 12 & 15 Passenger Van

**TYPE 1 The following statements are applicable 12 and 15 Passenger Van incomplete vehicle types contained in this document (unless otherwise noted on the cover)**.

This incomplete vehicle will conform to CMVSS 217 and FMVSS 217 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Access to all doors
All door systems
Windows (back or side)

## CMVSS 219 and FMVSS 219 – WINDSHIELD ZONE INTRUSION
## Applies to Cargo or Passenger Van types of Incomplete Vehicles contained in this Document
## 4536 kg (10,000 lb) GVWR or less

**TYPE 2 The following statement is applicable to all Cargo or Passenger Van types of incomplete vehicles contained in this document with a 4536 kg (10,000 lb) GVWR or less, (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 219 and FMVSS 219 providing:

A. No alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Antennae
Body roof structure and components/reinforcements
Body sheet metal components/reinforcements
Body structural components/reinforcements
Dash panel and cowl structure
Hood assembly
Hood mounts
Motor compartment structure and components
Windshield wiper
Windshield wiper motor

B. The dimension and mass, as well as other restrictions found in MVSS 301 Table A, are not exceeded.

C. during a 48 k.p.h. (30 m.p.h.) frontal barrier impact test:

1. no component installed by any intermediate or final stage manufacturer shall prevent the hood from folding in its designed folding pattern; and

2. no component installed by any intermediate or final stage manufacturer shall penetrate the windshield or protected zone.

## CMVSS 219 and FMVSS 219 – WINDSHIELD ZONE INTRUSION
## Cutaway Van 4536 kg (10,000 lb) GVWR or less

**TYPE 3 The following statement is applicable to Cutaway Van with a 4536 kg (10,000 lb) GVWR or less types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

Conformity with CMVSS 219 and FMVSS 219 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard.

## CMVSS 220 and FMVSS 220 – SCHOOL BUS ROLLOVER PROTECTION
## For School buses and Multifunction School Activty Buses regardless of GVWR Or used as an Alternative Compliance procedure for CMVSS 216 and FMVSS 216a on all Incomplete Vehicle Models 4536 kg (10,000 lb) GVWR or less Contained in this Document

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

Conformity with CMVSS 220 and FMVSS 220 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 221 and FMVSS 221 – SCHOOL BUS BODY JOINT STRENGTH
## Applies to all types of Incomplete Vehicles Contained in this Document

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

Conformity with CMVSS 221 and FMVSS 221 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 222 and FMVSS 222 – SCHOOL BUS PASSENGER SEATING AND CRASH PROTECTION
## Applies to all types of Incomplete Vehicles Contained in this Document

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

Conformity with CMVSS 222 and FMVSS 222 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## FMVSS 225 – CHILD RESTRAINT ANCHORAGE SYSTEMS
## Applies to all types of Incomplete Vehicles Contained in this Document 3856 kg (8,500 lb) GVWR or less, and to Buses 4536 kg (10,000 lb) or less

**TYPE 1 The following statements are applicable to all incomplete vehicle types contained in this document 4536 kg (10,000 lb) GVWR or less, and with 12 or 15 Passenger Van seating (Bus) (unless otherwise noted on the cover) with seats installed by General Motors**.

This incomplete vehicle, when completed, will conform to FMVSS 225 provided the original equipment seats are not replaced, no seating positions are removed or added, and no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Air bag manual cut-off switch (if equipped)
Child restraint system including lower and top tether anchorages, seat brackets, plates and reinforcements
Access to top tether and lower anchorage systems
Floor pan assembly
Head restraints/head rests
Owner Manual instructions
Seat assemblies
Seat belt assemblies
Seat belt anchorage brackets, plates, and reinforcements
Seat belt routing
Seat position/adjustment capability

**TYPE 3 The following statement is applicable to any incomplete vehicle contained in this document (unless otherwise noted on the cover) with seat or seat belt delete options in any seating position; or vehicles completed as a bus, school bus, multifunction school activity bus.**

Conformity with FMVSS 225 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 301 and FMVSS 301 – FUEL SYSTEM INTEGRITY
## Refer to Vehicle Types, GVWRs, and Applicable Statements that follow

**TYPE 2 The following statement is applicable to all types of incomplete vehicles contained in this document 4536 kg (10,000 lb) GVWR or less with any Incomplete Option (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 301 and FMVSS 301 providing it is completed in accordance with the following specific conditions by the (intermediate and) final stage manufacturer:

A. The following items when installed by General Motors will conform providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Fuel filler door assembly
Fuel filter
Fuel hose shields
Fuel pipes and hose assemblies
Fuel system
Fuel system attaching or protective structure
Fuel system control module
Fuel system fasteners and retainers
Fuel tank assembly
Fuel tank cap assembly
Fuel tank filler neck hose
Fuel tank filler neck/pipe assembly
Fuel tank filler neck/pipe fasteners
Fuel tank filler neck/pipe hose clamp/clamp assembly
Fuel tank filler neck/pipe housing assembly
Fuel tank filler neck/pipe plate
Fuel tank filler neck/pipe vent hose
Fuel tank filler neck/pipe vent hose clamp/strap
Fuel tank meter assembly
Fuel tank shields
Fuel vapor lines and canister assembly

B. This incomplete vehicle, when completed, will conform to CMVSS 301 and FMVSS 301 Fuel System Integrity if:

1. No alterations are made to the fuel system and attaching or protective structure, the contents or arrangement of the engine compartment, the powertrain and driveline, the cab structure, the chassis structure, the bumper system, door structure, or tires and wheels, as manufactured by General Motors.

2. The dimension and mass as well as other restrictions found in MVSS 301 Table A are not exceeded.

3. The final stage manufacturer completes the fuel filler neck and fuel level sender installation(s) according to “Best Practices” or “Special Applications (if applicable)” sections found within the **GM Upfitter Integration website located at www.gmupfitter.com**

4. During all barrier impact tests:

a. No component installed by any intermediate or final stage manufacturer impinges or causes distortion to the fuel system with sufficient energy to puncture or separate the fuel system.

b. No vehicle modification by any intermediate or final stage manufacturer results in any portion of the vehicle impinging upon or causing distortion to the fuel system with sufficient energy to puncture or separate the fuel system. Care should be taken that the structural integrity of the vehicle is restored following any modification of the structure.

c. Any body installed by an intermediate or final stage manufacturer is mounted securely to absorb loads and prevent movement relative to the frame which could cause any fuel system component to be punctured, separated or otherwise damaged when tested to applicable procedures of CMVSS 301 or FMVSS 301.

**TYPE 2 The following statement is applicable to Cutaway Van models G33503 with a GVWR of 4,581kg (10,100 lb) (RPO JFF), equipped with option B3D-Equipment School Bus, R04-Single Rear Wheel Configuration, and a 124 liter (33 gallon) mid-frame mounted fuel tank types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 301 and FMVSS 301 providing it is completed in accordance with the following specific conditions by the (intermediate and) final stage manufacturer:

A. The following items when installed by General Motors will conform providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Fuel filler door assembly
Fuel filter
Fuel hose shields
Fuel pipes and hose assemblies
Fuel system
Fuel system attaching or protective structure
Fuel system fasteners and retainers
Fuel tank assembly
Fuel tank cap assembly
Fuel tank filler neck hose
Fuel tank filler neck/pipe assembly
Fuel tank filler neck/pipe fasteners
Fuel tank filler neck/pipe hose clamp/clamp assembly
Fuel tank filler neck/pipe housing assembly
Fuel tank filler neck/pipe plate
Fuel tank filler neck/pipe vent hose
Fuel tank filler neck/pipe vent hose clamp/strap
Fuel tank meter assembly
Fuel tank shields
Fuel vapor lines and canister assembly

NOTE: The above statements exclude vehicles equipped with a temporary fuel tank as shipped from General Motors.

B. This incomplete vehicle, when completed, will conform to CMVSS 301 and FMVSS 301 Fuel System Integrity if:

1. No alterations are made to the fuel system and attaching or protective structure, the cab structure, the chassis structure, the tires and wheels, as manufactured by General Motors.

2. The dimension and mass as well as other restrictions found in MVSS 301 Table B, are not exceeded.

3. The final stage manufacturer completes the fuel filler neck and fuel level sender installation(s) according to “Best Practices” or “Special Applications (if applicable)” sections found within the **GM Upfitter Integration website located at www.gmupfitter.com**

4. During all barrier impact tests:

a. No component installed by any intermediate or final stage manufacturer impinges or causes distortion to the fuel system with sufficient energy to puncture or separate the fuel system.

b. No vehicle modification by any intermediate or final stage manufacturer results in any portion of the vehicle impinging upon or causing distortion to the fuel system with sufficient energy to puncture or separate the fuel system. Care should be taken that the structural integrity of the vehicle is restored following any modification of the structure.

c. Any body installed by an intermediate or final stage manufacturer is mounted securely to absorb loads and prevent movement relative to the frame, which could cause any fuel system component to be punctured, separated or otherwise damaged when tested to applicable procedures of CMVSS 301 or FMVSS 301.

5. The fuel system for the school bus will comply with the CMVSS 301 and FMVSS 301 Barrier Performance requirements based on the vehicle meeting the following condition that follows:

   a. The school bus body is constructed with the floor height NOT EXCEEDING a distance of:

      i. 110 mm (4.3 in) as measured from the top of the frame to the bottom surface of the interior floor, AND

      ii. 51 mm (2.0 in) as measured from the top of the frame to the bottom surface of the floor lateral support structure. NOTE: The floor lateral support structure must span from the frame rail outward to within 25 mm (1.0 in) of the body skirt.

   b. For all vehicle equipped with auxiliary batteries:

      i. The auxiliary battery must remain in the **left side** frame mounted battery bracket location (rearward of the rear cab mount and forward of the front spring hanger for the rear suspension), as manufactured by General Motors, OR

      ii. The auxiliary battery may be relocated by the subsequent stage manufacturer. The battery bracket may be installed on the right frame rail OR a battery enclosure may be added to the right side of the body in an area rearward of the rear cab mount and forward of the front spring hanger for the rear suspension.

**TYPE 2 The following statement is applicable to Cutaway Van models G33503 or G33803 with a GVWR of 5,579 kg (12,300 lb) (option C7N), equipped with option B3D - Equipment School Bus, option R05 - Dual Rear Wheel Configuration, and a 124 liter (33 gallon) mid-frame mounted fuel tank types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 301 and FMVSS 301 providing it is completed in accordance with the following specific conditions by the (intermediate and) final stage manufacturer:

A. The following items when installed by General Motors will conform providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Fuel filler door assembly
Fuel filter
Fuel hose shields
Fuel pipes and hose assemblies
Fuel system
Fuel system attaching or protective structure
Fuel system fasteners and retainers
Fuel tank assembly
Fuel tank cap assembly
Fuel tank filler neck hose
Fuel tank filler neck/pipe fasteners
Fuel tank filler neck/pipe hose clamp/clamp assembly
Fuel tank filler neck/pipe housing assembly
Fuel tank filler neck/pipe plate
Fuel tank filler neck/pipe vent hose
Fuel tank filler neck/pipe vent hose clamp/strap
Fuel tank meter assembly
Fuel tank shields
Fuel vapor lines and canister assembly

Fuel tank filler neck/pipe assembly

NOTE: The above statements exclude vehicles equipped with a temporary fuel tank as shipped from General Motors.

B. This incomplete vehicle, when completed, will conform to CMVSS 301 and FMVSS 301 Fuel System Integrity if:

1. No alterations are made to the fuel system and attaching or protective structure, the cab structure, the chassis structure, the tires and wheels, as manufactured by General Motors.

2. The dimension and mass as well as other restrictions found in MVSS 301 Table B, are not exceeded.

3. The final stage manufacturer completes the fuel filler neck and fuel level sender installation(s) according to "Best Practices" or "Special Applications (if applicable)" sections found within the **GM Upfitter Integration website located at www.gmupfitter.com**

4. During all barrier impact tests:

a. No component installed by any intermediate or final stage manufacturer impinges or causes distortion to the fuel system with sufficient energy to puncture or separate the fuel system.

b. No vehicle modification by any intermediate or final stage manufacturer results in any portion of the vehicle impinging upon or causing distortion to the fuel system with sufficient energy to puncture or separate the fuel system. Care should be taken that the structural integrity of the vehicle is restored following any modification of the structure.

c. Any body installed by an intermediate or final stage manufacturer is mounted securely to absorb loads and prevent movement relative to the frame, which could cause any fuel system component to be punctured, separated or otherwise damaged when tested to applicable procedures of CMVSS 301 or FMVSS 301.

5. The fuel system for the school bus will comply with the CMVSS 301 and FMVSS 301 Barrier Performance requirements based on the vehicle meeting one of the following two conditions listed in sections 5a and 5b that follow:

a. The school bus body is constructed with the floor height NOT EXCEEDING a distance of:

i. 110 mm (4.3 in) as measured from the top of the frame to the bottom surface of the interior floor, AND

ii. 51 mm (2.0 in) as measured from the top of the frame to the bottom surface of the floor lateral support structure. NOTE: The floor lateral support structure must span from the frame rail outward to within 25 mm (1.0 in) of the body skirt.

b. The school bus body is constructed utilizing RPO BNC [Soft Body Mount Cushions (or equivalent)], to mount the bus body to the frame, and:

i. with the floor height EXCEEDING a distance of 110 mm (4.3 in) as measured from the top of the frame to the bottom surface of the interior floor, OR

ii. with the floor height EXCEEDING a distance of 51 mm (2.0 in) as measured from the top of the frame to the bottom surface of the floor lateral support structure. NOTE: The floor lateral support structure must span from the frame rail outward to within 25 mm (1.0 in) of the body skirt.

iii. a fuel tank protective structure must be installed conforming with the design requirements of the Manufacturers Council of Small School Buses, design #0079_100 Rev 01/14/02, or design # 418-001, revision level "D".

iv. for diesel vehicles equipped with a fuel tank protective structure installed conforming with the design requirements of the Manufacturers Council of Small School Buses, design #0079_100 Rev 01/14/02:

(1) the auxiliary battery must be relocated to the right side of the vehicle in an area rearward of the rear cab mount and forward of the front spring hanger for the rear suspension

(2) the auxiliary battery must be attached securely to the vehicle's frame outboard side in such a manner that the durability of the battery mounting bracket and attachment structure is maintained and doesn't interfere with the installation or functionality of the sub-frame structure required for the flat floor school bus design.

**TYPE 2 The following statement is applicable to Cutaway Van models G338 (03) with a GVWR of 6,441 kg (14,200 lb), equipped with option B3D-Equipment School Bus, option R05-Dual Rear Wheel Configuration, and a 124 liter (33 gallon) mid-frame mounted fuel tank types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to CMVSS 301 and FMVSS 301 providing it is completed in accordance with the following specific conditions by the (intermediate and) final stage manufacturer

A. The following items when installed by General Motors will conform providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

Fuel filler door assembly
Fuel filter
Fuel hose shields
Fuel pipes and hose assemblies
Fuel system
Fuel system attaching or protective structure
Fuel system fasteners and retainers
Fuel tank assembly
Fuel tank cap assembly
Fuel tank filler neck hose
Fuel tank filler neck/pipe assembly
Fuel tank filler neck/pipe fasteners
Fuel tank filler neck/pipe hose clamp/clamp assembly
Fuel tank filler neck/pipe housing assembly
Fuel tank filler neck/pipe plate
Fuel tank filler neck/pipe vent hose
Fuel tank filler neck/pipe vent hose clamp/strap
Fuel tank meter assembly
Fuel tank shields
Fuel vapor lines and canister assembly

NOTE: The above statements exclude vehicles equipped with a temporary fuel tank as shipped from General Motors.

B. This incomplete vehicle, when completed, will conform to CMVSS 301 and FMVSS 301 Fuel System Integrity if:

1. No alterations are made to the fuel system and attaching or protective structure, the cab structure, the chassis structure, the tires and wheels, as manufactured by General Motors.

2. The dimension and mass as well, as other restrictions found in MVSS 301 Table B, are not exceeded.

3. The final stage manufacturer completes the fuel filler neck installation(s) according to "Best Practices" or "Special Applications (if applicable)" sections found within the **GM Upfitter Integration website located at www.gmupfitter.com**

4. During all barrier impact tests:

a. No component installed by any intermediate or final stage manufacturer impinges or causes distortion to the fuel system with sufficient energy to puncture or separate the fuel system.

b. No vehicle modification by any intermediate or final stage manufacturer results in any portion of the vehicle impinging upon or causing distortion to the fuel system with sufficient

energy to puncture or separate the fuel system. Care should be taken that the structural integrity of the vehicle is restored following any modification of the structure.

c. Any body installed by an intermediate or final stage manufacturer is mounted securely to absorb loads and prevent movement relative to the frame which could cause any fuel system component to be punctured, separated or otherwise damaged when tested to applicable procedures of CMVSS 301 or FMVSS 301.

5. The fuel system for the school bus will comply with the CMVSS 301 and FMVSS 301 Barrier Performance requirements based on the vehicle meeting one of the following two conditions listed in sections 5a and 5b that follow:

   a. The school bus body is constructed with the floor height NOT EXCEEDING a distance of:

      i. 110 mm (4.3 in) as measured from the top of the frame to the bottom surface of the interior floor, AND

      ii. 51 mm (2.0 in) as measured from the top of the frame to the bottom surface of the floor lateral support structure. NOTE: The floor lateral support structure must span from the frame rail outward to within 25 mm (1.0 in) of the body skirt.

   b. The school bus body is constructed utilizing RPO BNC [Soft Body Mount Cushions (or equivalent)], to mount the bus body to the frame, with the floor height EXCEEDING a distance of:

      i. 110 mm (4.3 in) as measured from the top of the frame to the bottom surface of the interior floor, OR

      ii. 51 mm (2.0 in) as measured from the top of the frame to the bottom surface of the floor lateral support structure. NOTE: The floor lateral support structure must span from the frame rail outward to within 25 mm (1.0 in) of the body skirt.

      iii. a fuel tank protective structure must be installed conforming with the design requirements of the Manufacturers Council of Small School Buses, design # 418-001, revision level “D”.

# TABLE A

| Models | GVWR kg (lb) | Engine | @ Maximum Unloaded Vehicle CMVSS/FMVSS 301 Weight kg (lb) | Maximum Frontal Area $m^2$ ($ft^2$) |
|---|---|---|---|---|
| G23405 | 3901 kg (8,600 lb)=C6P | 4.3L Gas=LV1 | 3039 kg (6,700 lb) | Not Applicable |
| G23405 | 3901 kg (8,600 lb)=C6P | 6.0L Gas=LC8 | 3039 kg (6,700 lb) | Not Applicable |
| G23405 | 3901 kg (8,600 lb)=C6P | 6.0L Gas=L96 | 3039 kg (6,700 lb) | Not Applicable |
| G23406 | 3901 kg (8,600 lb)=C6P | 6.0L Gas=L96 | 3039 kg (6,700 lb) | Not Applicable |
| G23705 | 3901 kg (8,600 lb)=C6P | 4.3L Gas=LV1 | 3039 kg (6,700 lb) | Not Applicable |
| G23705 | 3901 kg (8,600 lb)=C6P | 6.0L Gas=LC8 | 3039 kg (6,700 lb) | Not Applicable |
| G23705 | 3901 kg (8,600 lb)=C6P | 6.0L Gas=L96 | 3039 kg (6,700 lb) | Not Applicable |
| G33405 | 4354 kg (9,600 lb)=C6Y | 4.3L Gas=LV1 | 3039 kg (6,700 lb) | Not Applicable |
| G33405 | 4354 kg (9,600 lb)=C6Y | 6.0L Gas=LC8 | 3606 kg (7,950 lb) | Not Applicable |
| G33405 | 4354 kg (9,600 lb)=C6Y | 6.0L Gas=L96 | 3606 kg (7,950 lb) | Not Applicable |
| G33406 | 4354 kg (9,600 lb)=C6Y | 6.0L Gas=L96 | 3606 kg (7,950 lb) | Not Applicable |
| G33503 | 3901 kg (8,600 lb)=9E9 | 4.3L Gas=LV1 | 3479 kg (7,670 lb) | 6.9 (74) |

| Models | GVWR kg (lb) | Engine | @ Maximum Unloaded Vehicle CMVSS/FMVSS 301 Weight kg (lb) | Maximum Frontal Area $m^2$ ($ft^2$) |
|---|---|---|---|---|
| G33503 | 3901 kg (8,600 lb)=9E9 | 6.0L Gas=LC8 | 3479 kg (7,670 lb) | 6.9 (74) |
| G33503 | 3901 kg (8,600 lb)=9E9 | 6.0L Gas=L96 | 3479 kg (7,670 lb) | 6.9 (74) |
| G33503 | 4354 kg (9,600 lb)=C6Y | 4.3L Gas=LV1 | 3479 kg (7,670 lb) | 6.9 (74) |
| G33503 | 4354 kg (9,600 lb)=C6Y | 6.0L Gas=LC8 | 3606 kg (7,950 lb) | 6.9 (74) |
| G33503 | 4354 kg (9,600 lb)=C6Y | 6.0L Gas=L96 | 3606 kg (7,950 lb) | 6.9 (74) |
| G33503 | 4491 kg (9,900 lb)=C4M | 4.3L Gas=LV1 | 3479 kg (7,670 lb) | 6.9 (74) |
| G33503 | 4491 kg (9,900 lb)=C4M | 6.0L Gas=LC8 | 3606 kg (7,950 lb) | 6.9 (74) |
| G33503 | 4491 kg (9,900 lb)=C4M | 6.0L Gas=L96 | 3606 kg (7,950 lb) | 6.9 (74) |
| G33503 | 4536 kg (10,000 lb)=C7A | 4.3L Gas=LV1 | 3479 kg (7,670 lb) | 7.9 (85) |
| G33705 | 4354 kg (9,600 lb)=C6Y | 4.3L Gas=LV1 | 3039 kg (6,700 lb) | Not Applicable |
| G33705 | 4354 kg (9,600 lb)=C6Y | 6.0L Gas=LC8 | 3606 kg (7,950 lb) | Not Applicable |
| G33705 | 4354 kg (9,600 lb)=C6Y | 6.0L Gas=L96 | 3606 kg (7,950 lb) | Not Applicable |
| G33706 | 4354 kg (9,600 lb)=C6Y | 4.3L Gas=LV1 | 3039 kg (6,700 lb) | Not Applicable |
| G33706 | 4354 kg (9,600 lb)=C6Y | 6.0L Gas=LC8 | 3606 kg (7,950 lb) | Not Applicable |
| G33706 | 4354 kg (9,600 lb)=C6Y | 6.0L Gas=L96 | 3606 kg (7,950 lb) | Not Applicable |
| G33803 | 4491 kg (9,900 lb)=C4M | 4.3L Gas=LV1 | 3479 kg (7,670 lb) | 6.9 (74) |
| G33803 | 4491 kg (9,900 lb)=C4M | 6.0L Gas=LC8 | 3606 kg (7,950 lb) | 6.9 (74) |
| G33803 | 4491 kg (9,900 lb)=C4M | 6.0L Gas=L96 | 3606 kg (7,950 lb) | 6.9 (74) |
| G33803 | 4536 kg (10,000 lb)=C7A | 4.3L Gas=LV1 | 3479 kg (7,670 lb) | 7.9 (85) |

# TABLE B

| Models | B3D=School Bus Applicability | GVWR kg (lb) | Engine | @ Maximum Vehicle CMVSS/FMVSS 301 Test Weight kg (lb) | Maximum Frontal Area $m^2$ ($ft^2$) |
|---|---|---|---|---|---|
| G33503 | B3D=School Bus | 4581 kg (10,100 lb)=JFF | 4.3L Gas=LV1 | 4581 kg (10,100 lb) | 6.9 (74) |
| G33503 | B3D=School Bus | 5579 kg (12,300 lb)=C7N | 6.0L Gas=LC8 | 5579 kg (12,300 lb) | 7.9 (85) |
| G33503 | B3D=School Bus | 5579 kg (12,300 lb)=C7N | 6.0L Gas=L96 | 5579 kg (12,300 lb) | 7.9 (85) |
| G33803 | B3D=School Bus | 5579 kg (12,300 lb)=C7N | 6.0L Gas=LC8 | 5579 kg (12,300 lb) | 7.9 (85) |
| G33803 | B3D=School Bus | 5579 kg (12,300 lb)=C7N | 6.0L Gas=L96 | 5579 kg (12,300 lb) | 7.9 (85) |
| G33803 | B3D=School Bus | 6441 kg (14,200 lb)=C7I | 6.0L Gas=LC8 | 6441 kg (14,200 lb) | 7.9 (85) |
| G33803 | B3D=School Bus | 6441 kg (14,200 lb)=C7I | 6.0L Gas=L96 | 6441 kg (14,200 lb) | 7.9 (85) |

Notes:

- Final Stage Manufacturer completed vehicle weight should not exceed the **maximum unloaded vehicle weight** or **maximum test weight** or **maximum frontal area** shown in Table A. If weight is exceeded, re-certification by Final Stage Manufacturer may be required.
- The **Unloaded Vehicle FMVSS/CMVSS 301 Weight** means the weight of the Final Stage Manufacturer completed vehicle with the maximum capacity of all fluids necessary for the operation of the vehicle but without cargo or occupants.
- **For School Buses the Maximum FMVSS/CMVSS 301 Test Weight** is the **Maximum Unloaded Vehicle Weight** plus the minimum occupant weight allowance shall be 54.4 kg (120 lb) per passenger and 68 kg (150 lb) for the driver.
- Also see the Vehicle Emission Control Information Label in the vehicle engine compartment for maximum completed vehicle curb weight, GVWR, and frontal area restrictions, if applicable.
- Due to ongoing product development these weights are subject to change.
- For models completed as a "School Bus", Final Stage Manufacturers are required to provide propshaft guards as necessary to comply with School Bus regulations.

## CMVSS 301.1 LPG FUEL SYSTEM INTEGRITY
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

Conformity with CMVSS 301.1 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## CMVSS 302 and FMVSS 302 - FLAMMABILITY OF INTERIOR MATERIALS
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed will conform to CMVSS 302 and FMVSS 302 providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below:

All trim panels including door, front, rear and side panels
Arm rests
Compartment shelves
Console
Engine compartment covers
Floor coverings
Head restraints
Headlining
Instrument panel
Seat assemblies
Seat backs
Seat belts
Seat cushions
Shades
Sun visors
Wheel housing covers

NOTE: Any other interior materials, including padding and crash deployed elements that are designed to absorb energy on contact by occupants in the event of a crash.

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover). If the intermediate or final stage manufacturer installs any items but not limited to those listed above (examples: Curtains, Engine compartment cover, Mattress covers, Shades and Wheel housing covers, etc.), they must also meet the requirements of this CMVSS 302 and FMVSS 302.**

Conformity with CMVSS 302 and FMVSS 302 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard.

## CMVSS 301.2 and FMVSS 303 – CNG FUEL SYSTEM INTEGRITY
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

Conformity with CMVSS 301.2 and FMVSS 303 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## FMVSS 304 – COMPRESSED NATURAL GAS FUEL CONTAINERS
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

Conformity with FMVSS 304 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

## FMVSS 403 – PLATFORM LIFT SYSTEMS
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

Conformity with FMVSS 403 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard.

## FMVSS 404 – PLATFORM LIFT INSTALLATIONS IN MOTOR VEHICLES
## Applies to all types of Incomplete Vehicles contained in this Document

**TYPE 3 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

Conformity with FMVSS 404 cannot be determined based upon the components supplied on the incomplete vehicle, and General Motors makes no representation to conformity with the standard**.**

# PART II

## U.S. EPA, CALIFORNIA, AND CANADIAN EXHAUST & EVAPORATIVE EMISSION REQUIREMENTS AND EPA/NHTSA GREENHOUSE GAS EMISSIONS/FUEL ECONOMY REGULATIONS

Incomplete vehicles come in three major classifications: (1) Light Duty Vehicles, Light Duty Trucks, and Heavy Duty Vehicles (Including Medium Duty in California) are certified by the primary manufacturer and the vehicle is labeled as being in compliance with emission and fuel economy requirements. (2) Heavy Duty Vehicles are required to have an engine certified by the engine manufacturer and bear an engine emissions label, and if a gasoline vehicle, also bear an evaporative emissions label, (3) Light Duty Vehicles certified and labeled by the intermediate or final stage vehicle manufacturer as being in compliance with emission and fuel economy requirements.

Reference PART I CMVSS 301 and FMVSS 301 Table A and Table B, and PART II Table C. The completed vehicle Maximum Unloaded Vehicle (Curb) Weight, GVWR, and/or Maximum Frontal Area restrictions shown in Tables A, B and C should not be exceeded. If any of these restrictions are exceeded, re-certification by the final stage manufacturer will be required.

In addition, all gasoline/gasoline-ethanol blend powered Federal/California Light Duty, Medium Duty and Heavy Duty Vehicles are required to have an approved fuel evaporative emission control system. Vehicles certified to Heavy Duty gasoline emission standards also require special evaporative emission labeling. In order to assure that Environmental Protection Agency (EPA), National Highway Traffic Safety Administration (NHTSA), California and Canada Emission Certification and/or Greenhouse Gas/Fuel Economy regulations are met, this vehicle must be completed in strict accordance with all instructions contained in this manual, especially the following instructions which relate to:

**EMISSION RELATED COMPONENTS**

**TYPE 1 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

A. This incomplete vehicle, when completed, will conform to U.S. EPA, CALIFORNIA, AND CANADIAN EXHAUST & EVAPORATIVE EMISSION REQUIREMENTS AND EPA/NHTSA GREEENHOUSE GAS EMISSIONS/FUEL ECONOMY REGULATIONS providing the vehicle is completed in strict accordance with all statements included in this document, especially those that relate to: "EMISSION RELATED COMPONENTS, and no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the components, assemblies or systems, as manufactured by General Motors, including but not limited to those listed below (if equipped):

Air Injection Reaction (AIR) System
Axle
Brake System
Catalytic Converter
Components for All Wheel Drive (AWD) System: axle, Power Take-Off Unit (PTU), propshaft
Diesel Exhaust Emission Reduction Fluid (DEF) system, including, but not limited to: associated plumbing, fill neck assembly, heated delivery line, heater, injector, level sensor, pump, sensors, tank temperature sensor
Diesel Exhaust System, including, but not limited to: NOx Sensors, NOx Sensor Control Module, Diesel Exhaust (HCI) Direct Fuel Injector System, associated plumbing, injectors, injector controller and calibrations
Diesel/Bio-Diesel blend Particulate Filter (DPF) system, including, but not limited to: diesel/bio-diesel blend particulate filter assembly, diesel/bio-
Engine Assembly, including, but not limited to: cooling fan and drive system, crankcase emission control system, evaporative emission control system, Exhaust Gas Recirculation (EGR) system, fuel delivery and injection system, glow plugs, Glow Plug Control Module (GPCM), ignition system, Positive Crankcase Ventilation (PCV) system
Engine Electronics, including, but not limited to: coolant temperature sensor, ECM/GPCM/PCM/VCM, engine speed sensor, mass air flow sensor, calibrations/software, Exhaust oxygen sensors, Exhaust system
Intake System, including, but not limited to: air induction components/system, ducts, filter, mass air flow sensor, intake air heater
Onboard Diagnostics Emission System
Seating, the vehicle can remain with only two, or it must have 10 or more seats behind the

diesel blend oxidation catalyst assembly, exhaust system pressure differential assembly and/or plumbing, exhaust temperature sensor

driver (12 total with 2 in the front row), or it must have 13 or more total seats when completed.
Tires and Wheels
Transaxle/Transmission Assembly
Transaxle/Transmission Electronics, including, but not limited to: calibrations/software
Transmission Control Module (TCM)
Turbo Charging System, associated equipment and controls

NOTE: The Tailpipe Rear Cooler Assembly is non-emissions related. If equipped, to ensure adequate control of exhaust temperature, the intermediate or final stage manufacturer must complete tailpipe (loose kit) installations according to the instructions provided.

B. Cold tire pressure as listed for front and rear on the Incomplete Vehicle Label affixed to the front cover of this document must be maintained.

C. GVWR, GAWR front and rear weight ratings as listed on the Incomplete Vehicle Label affixed to the front cover of this document must not be exceeded.

# TABLE C

| Models | GVWR kg (lb) (RPO) | Engine (RPO) | Maximum Unloaded Vehicle Weight kg (lb) | Hi-Cube Van Body Type Maximum Frontal Area $m^2$ ($ft^2$) |
|---|---|---|---|---|
| G33503 | 4581 (10,100) (JFF) | 4.3 L Gasoline (LV1) | 3894 (8,585) | 6.9 (74) |
| G33503 | 4581 (10,100) (JFF) | 6.0 L Gasoline (L96/LC8) | 3894 (8,585) | 6.9 (74) |
| G33503 | 5579 (12,300) (C7N) | 6.0 L Gasoline (L96/LC8) | 4742 (10,455) | 7.9 (85) |
| G33803 | 4581 (10,100) (JFF) | 4.3 L Gasoline (LV1) | 3894 (8,585) | 6.9 (74) |
| G33803 | 4581 (10,100) (JFF) | 6.0 L Gasoline (L96/LC8) | 3894 (8,585) | 6.9 (74) |
| G33803 | 5579 (12,300) (C7N) | 6.0 L Gasoline (L96/LC8) | 4742 (10,455) | 7.9 (85) |
| G33803 | 6441 (14,200) (C7I) | 6.0 L Gasoline (L96/LC8) | 5474 (12,070) | 7.9 (85) |
| G33903 | 5579 (12,300) (C7N) | 6.0 L Gasoline (L96/LC8) | 4742 (10,455) | 7.9 (85) |
| G33903 | 6441 (14,200) (C7I) | 6.0 L Gasoline (L96/LC8) | 5474 (12,070) | 7.9 (85) |

Notes:

- **Table C above applies to ONLY incomplete vehicles (RPO: &VXT).**
- On page 2 within this document, before each vehicle illustration and after the word TYPE, is a list of types of vehicles into which the incomplete vehicle is designed to be manufactured.
- * The Maximum Frontal Area columns apply to: PART II, U.S. EPA, CALIFORNIA, AND CANADIAN EXHAUST & EVAPORATIVE EMISSION REQUIREMENTS AND EPA/NHTSA GREENHOUSE GAS/FUEL ECONOMY REGULATIONS.
- The completed vehicle Maximum Unloaded Vehicle (Curb) Weight, and/or GVWR, and/or frontal area should not be exceeded. If any of these restrictions are exceeded, re-certification by the final stage manufacturer will be required.
- Also see the Vehicle Emission Control Information Label in the vehicle engine compartment for maximum completed vehicle curb weight, GVWR, and frontal area restrictions, if applicable.
- GVWR refers to Gross Vehicle Weight Rating.

NOTES: All Federal/California gasoline/gasoline-ethanol blend powered heavy duty vehicles (except those equipped with option NJ2, Temporary Fuel Tank) will have an evaporative emission control system that is certified for a fuel tank capacity for the vehicle as built. Intermediate or Final Stage Manufacturers wishing to add fuel tank capacity beyond the original equipment fuel tank capacity must recertify that the Modified Fuel System meets Evaporative Emission Regulations in effect at the time of original vehicle manufacture. Compliance with applicable exhaust and evaporative emission requirements is the responsibility of the final stage manufacturer.

Vehicles equipped with option NJ2 - Temporary Fuel Tank do not have an evaporative emission control system.

D. Further compliance with applicable fuel evaporative emission requirements will be maintained providing the intermediate or final stage manufacturer completes the fuel filler neck and fuel level sender installation(s) according to "Best Practices" or "Special Applications (if applicable)" sections found within the Body Builder Manuals on the **GM Upfitter Integration website located at www.gmupfitter.com**

Compliance with applicable fuel evaporative emission regulations will be maintained if no alterations are made to change material or increase the size or length or position of the following non-metallic fuel and evaporative emission hoses:

Fuel feed hoses front and rear
Fuel return hoses front and rear
Fuel tank filler hoses to filler neck
Fuel tank vent hoses to filler neck
Fuel vapor lines at canister
Fuel vapor lines from engine to chassis pipes
Fuel vapor lines from fuel tank sender to: chassis pipes

**TYPE 2 The following statement is applicable to all types of incomplete vehicles contained in this document and having an auxiliary heat exchanger installed in the engine cooling system by a subsequent stage manufacturer (unless otherwise noted on the cover).**

To prevent setting of Service Engine Diagnostic codes, installation of an auxiliary heat exchanger in the engine cooling system by a subsequent stage manufacturer must be completed following specific supplemental technical information contained within the **GM Upfitter Integration website located at www.gmupfitter.com**

**SPECIFICATION FOR FILL PIPES AND OPENINGS OF 2016 AND SUBSEQUENT MODEL MOTOR VEHICLE FUEL TANKS (APPLICABLE ONLY TO CALIFORNIA GASOLINE/GASOLINE-ETHANOL BLEND POWERED VEHICLES)**

**TYPE 2 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to Title 13, California Code of Regulations Section 2235, and the "Specifications for Fill Pipes and Openings of 2015 and subsequent Model Year Motor Vehicle Fuel Tanks", dated March 22, 2012, providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment, location or vital spatial clearances of the fuel filler neck(s) and any intermediate or final stage manufacturer completes the fuel filler neck installation(s) according to the instructions which are furnished in the loose parts box.

**LABELS**

**TYPE 2 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to U.S. EPA, CALIFORNIA, AND CANADIAN EXHAUST & EVAPORATIVE EMISSION REQUIREMENTS AND EPA/NHTSA GREENHOUSE GAS EMISSIONS/FUEL ECONOMY REGULATION labeling requirements providing no alterations are made which affect the function, physical, chemical, or mechanical properties, environment,

location or vital spatial clearances of the Emission Control related Information Labels that are permanently affixed. The labels are required by government regulation and must not be obstructed from view or defaced so as to impair their visibility or legibility. In addition, an EPA/DOT Fuel Economy and Environment Label may be affixed to the window glass of the incomplete vehicle as manufactured by General Motors. If equipped, the label must remain in place until this vehicle is received by the ultimate customer.

NOTE: G-VAN Cutaway vehicles built with Diesel Engines include a "Ultra Low Sulfur Diesel Fuel Only" label that is provided in the shipped loose container. The "Ultra Low Sulfur Diesel Fuel Only" label must be affixed, clearly visible, near the fuel fill opening.

**SEATING**

**TYPE 2 The following statement is applicable to all types of incomplete vehicles contained in this document (unless otherwise noted on the cover).**

This incomplete vehicle, when completed, will conform to U.S. EPA, CALIFORNIA, AND CANADIAN EXHAUST & EVAPORATIVE EMISSION REQUIREMENTS AND EPA/NHTSA GREENHOUSE GAS EMISSIONS/FUEL ECONOMY REGULATION applicable to a Medium Duty Vehicle (MDV) provided that the seating configuration added by the upfitter does not result in classification of the completed vehicle as a Medium Duty Passenger Vehicle (MDPV), As defined in 40 CFR 86.1803-01, an MDPV is a heavy duty vehicle with a gross vehicle weight rating less than 10,000 pounds that is designed primarily for the transportation of passengers. GM's emissions certification applies only to completed vehicles that are classified as a Medium Duty Vehicle (MDV). If your completed vehicle has a GVWR below 10,000 pounds and falls within the definition of an MDPV, it will not be covered by GM's MDV emissions certification. For example, a completed vehicle under 10,000 pounds with a seating capacity of less than 12 persons or designed to seat less than 9 persons behind the driver, would be an MDPV and not covered by GM's MDV emissions certification.

# NOTES