GENERAL

MODEL IDENTIFICATION

BISCAYNE 153-15400 SERIES

MODEL 153-15469 4-DOOR SEDAN, 6-PASSENGER

BEL AIR 155-15600 SERIES

MODEL 155-15669 4-DOOR SEDAN, 6-PASSENGER

IMPALA 163-16400 SERIES

MODEL 163-16437 2-DOOR SPORT COUPE, 5-PASSENGER
MODEL 16447 2-DOOR CUSTOM COUPE, 5-PASSENGER
MODEL 16467 2-DOOR CONVERTIBLE, 5-PASSENGER
MODEL 163-16469 4-DOOR SEDAN, 6-PASSENGER
MODEL 16439 4-DOOR SPORT SEDAN, 6-PASSENGER

CAPRICE 16600 SERIES

MODEL 16647 2-DOOR CUSTOM COUPE, 5-PASSENGER
MODEL 16639 4-DOOR SPORT SEDAN, 6-PASSENGER

CHEVROLET STATION WAGONS

MODEL 15436 BROOKWOOD 4-DR STA WGN, 2-SEAT
MODEL 15636 TOWNSMAN 4-DR STA WGN, 2-SEAT
MODEL 15646 TOWNSMAN 4-DR STA WGN, 3-SEAT
MODEL 16436 KINGSWOOD 4-DOOR STATION WAGON, 2-SEAT
MODEL 16446 KINGSWOOD 4-DOOR STATION WAGON, 3-SEAT
MODEL 16636 KINGSWOOD ESTATE 4-DR STA WGN, 2-SEAT
MODEL 16646 KINGSWOOD ESTATE 4-DR STA WGN, 3-SEAT

ONLY BASIC DESIGNATIONS SHOWN

VEHICLE SERIAL NUMBER

6-Cylinder Example:

Model	Model Year 1970	Assembly Plant (Tarrytown)	Unit Number (1st unit)
15369	0	T	100001

Thus: The 1st model built at Tarrytown would be serial number 153690T100001

8-Cylinder Example:

Model	Model Year 1970	Assembly Plant (St. Louis)	Unit Number (1st unit)
15469	0	S	100001

Thus: The 1st model built at St. Louis would be serial number 15469OS100001

ASSEMBLY PLANTS

C– Southgate-GMAD
D– Doraville-GMAD
J– Janesville-GMAD
R– Arlington-GMAD
S– St. Louis
T– Tarrytown-GMAD
U– Lordstown-GMAD
Y– Wilmington-GMAD

Canadian Plant
No. "1" Oshawa
No. "2" Ste. Theresa

Starting unit number . . . . . 100001 and up at each assembly plant regardless of series
Location . . . . . Stamped on plate attached to top left hand of instrument panel

TRANSMISSION IDENTIFICATION

Example: QPS9E01D

Type Designation	Source Designation	Model Year 1969	Production° Month & Date
RR	M (Muncie)	0	E01D*

RR	3-Speed	L-6 engine	M - Muncie
RS	3-Speed	V-8 engines	M - Muncie
UD	Powerglide	L-6 engine	C - Cleveland T - Toledo
UF	Powerglide	V-8 engine	C - Cleveland T - Toledo
GP	Turbo Hydra-Matic	L-6 engine	X - Cleveland Y - Toledo
GW	Turbo Hydra-Matic	V-8 engine	X - Cleveland Y - Toledo
CK	Turbo Hydra-Matic	V-8 engine	— Ypsilanti

Location:
3-Speed . . . . . Stamped on left side on boss below side cover.
Powerglide & Turbo Hydra-Matic (Chevrolet) . . . . . Stamped on right hand side of pan.
Turbo Hydra-Matic . . . . . Nameplate tag on right hand side of the case.

o-Month: E denotes May; (see below) 01 denotes 1st day
Alpha Characters used in identifying the calendar Month

A - January
B - February
C - March
D - April
E - May
H - June
K - July
M - August
P - September
R - October
S - November
T - December

*-The letter "D" or "N" following the date numerals indicates day or night shift.

ENGINE IDENTIFICATION

Example: F1210CA

Source Designation	Production* Month & Date	Type Designation
F (Flint)	1210	CCG

Turbo-Thrift 250, 250 Cubic Inch L-6, Base Engine

CCG - Regular production engine, 3-speed
- Regular production engine, Powerglide

Turbo-Fire 350, 350 Cubic Inch V-8, Base Engine

CNI - Regular production engine, 3-speed
CNM - Regular production engine, Powerglide
CNN - Regular production engine, Turbo Hydra-Matic (Chevrolet)

Turbo-Fire 350, 350 Cubic Inch V-8 (RPO-L48)

CNQ - Optional, 3-speed, 4-bbl. carb.
CNS - Optional, Powerglide trans, 4-bbl. carb.
CNR - Optional, Turbo Hydra-Matic, 4-bbl. carb. (Chevrolet)
- Optional, Turbo Hydra-Matic, 4-bbl. carb.

Turbo-Fire 400, 400 Cubic Inch V-8 (RPO-LF6)

CGR - Optional, 3-speed, 2-bbl. carb.
- Optional, Turbo Hydra-Matic, 2-bbl. carb.

Turbo-Jet 454, 454 Cubic Inch V-8 (RPO-LS4)

CGV - Optional, 3-speed, 4-bbl. carb.
- Optional, Turbo Hydra-Matic; 4-bbl. carb.

Turbo-Jet 454, 454 Cubic Inch V-8 (RPO-LS5)

CGU - Optional, 3-speed, 4-bbl. carb.
- Optional, Turbo Hydra-Matic, 4-bbl. carb.

Location:
6-cylinder engine . . . . . Stamped on pad on right side of cylinder block to rear of distributor
8-cylinder engine . . . . . Stamped on pad at front right side of cylinder block

*-Month: December, 12; 10th day of December, 10

REAR AXLE IDENTIFICATION

Location, Identification Number

Bottom left or right of axle tube adjacent to carrier housing.

See Power Train Section for additional Information.

STANDARD EXTERIOR EQUIPMENT

FRONT	BISCAYNE & BROOKWOOD 153-15400	BEL AIR & TOWNSMAN 155-15600	IMPALA & KINGSWOOD - 163-16400	CAPRICE & KINGSWOOD ESTATE 16600
Radiator Grille Name - Script "Chevrolet"	X	X	X	X
Radiator Grille "Bow Tie" Emblem	X	X	X	X
Windshield Reveal Moldings	X	X	X	X
Hood Rear and Fender Moldings	X	X	X	X
Parking Lights in Valance Panel, Amber Lens, White on Caprice	X	X	X	X
Argent Painted Upper and Lower Radiator Grille and Bright Headlamp Bezels	X (a)	X (a)	X (b)	X (b)
Concealed Windshield Wipers with Articulated Left Blade	X	X	X	X
SIDE				
Front Valance and Rear Quarter Marker Lamps (c)	X	X	X	X
Front Fender Series Nameplate	69	69	37, 39, 67, 69	
Front Fender Engine I.D. (V-8 Only)	X	X	X	X
Rectangular 5" Outside L.H. Rear View Mirror	X	X	X	X
Rocker Panel Moldings–Bright	X		X	39, 47
Body Side Moldings, Front Fender, Doors, and Rear Quarter – Bright		X	X(d)	39, 47(h)
Sail Panel Nameplate			47	39, 47
Roof Rail Weatherstrip Moldings–Bright			37, 39, 47	39, 47
Wheel Trim Covers				X
Hub Caps	X	X	X	
Windshield Pillar and Roof Drip Moldings–Bright			37, 39, 47	X
Rear Quarter Window Reveal Moldings	36 (e)	36, 46 (e)	36, 46 (f)	36, 46 (f)
Body Side Wood-Grain Insert and Limed Oak Border Moldings				36, 46
Door Upper Frame Moldings – Bright			36, 46, 69	36, 46
Wheel Opening Moldings			X	X
Rear Belt Molding			67	
Rear Quarter Nameplate	36	36, 46	36, 46	36, 46
Roof Sail Panel Molding			47 (g)	47 (g)

(a) Body Color Valance Panel
(b) With 2 Horizontal Bright Upper Grille Bars, Chrome Valance Panel
(c) Body Color Bezels on Rear Quarter Markers, Brown Bezel on Kingswood Estate
(d) With Colored Plastic Insert in 5 Colors
(e) Painted
(f) Bright
(g) Textured Black Paint Fill (Black, White, Dark Blue, Dark Gold and Dark Green with Vinly Roof Option)
(h) 15 Body Color Vinyl Inserts

STANDARD EXTERIOR EQUIPMENT

REAR	BISCAYNE & BROOKWOOD 153-15400	BEL AIR & TOWNSMAN 155-15600	IMPALA & KINGSWOOD 163-16400	CAPRICE & KINGSWOOD ESTATE 16600
Tailgate Nameplate--"Chevrolet"	36	36, 46	36, 46	36, 46
Deck Lid Nameplate "Chevrolet"	Except 36, 46	Except 36, 46	Except 36, 46	
Deck Lid Nameplate – "Caprice by Chevrolet"				39, 47
Rear Deck or Tailgate Upper and Lower Moldings			X	X (a)
Tailgate Wood - Grain Insert and Limed Oak Moldings				X
Rear Window or Tailgate Window Reveal Moldings – Bright	X (b)	X (b)	Except 67	X
Rear Bumper Reflex	36	36, 46	36, 46	36, 46
Two Tail and Back-Up Lamps in Bumper	69	Except 36, 46		
Two Tail and Back-Up Lamps in Body	36	36, 46		
Four Tail Lamps and Two Back-Up Lamps in Bumper			Except 36, 46	Except 36, 46
Four Tail Lamps and Two Back-Up Lamps in Body			36, 46	36, 46

(a) Limed Oak Tailgate Molding
(b) Tailgate Window Upper Molding Only on 36 and 46

STANDARD INTERIOR EQUIPMENT

ROOF AND PILLARS	BISCAYNE & BROOKWOOD 153-15400	BEL AIR & TOWNSMAN 155-15600	IMPALA & KINGSWOOD 163-16400	CAPRICE KINGSWOOD ESTATE 16600
Headlining Vinyl Coated, "Premiere," Plain	X	X		
Headlining Vinyl Coated, "Premiere," Perforated			Exc. 67	X
Rear Window Plastic Finish Lace-Trim Color	X	X	Except 67	X
Rear View Mirror, 12" Prismatic with Gray Padded Edges	X	X	X	X
Rear View Mirror Support, Non-Hook, Dull Chrome	X			
Rear View Mirror Support, Hook Type, Dull Chrome		X	X	X
Rear View Mirror Support Cover, Plastic - Trim Color	X	X	X	X
Windlace–Fabric	X	X	36, 46, 69	36, 46
Windlace–Coated Fabric	36 (b)	36, 46 (b)	Except 69 (b)	X (b)
Sunshade, Padded, Non-Hook	X			
Sunshade, Padded, Hook Type		X	X	X
Roof Side Rail Garnish Molding – Painted		37, 39, 47	39, 47	
Rear Window Molding – Painted			37, 39, 47	39, 47
Windshield Upper Garnish Moldings – Painted	X	X	X	X
Windshield Side Garnish Moldings – Painted	X	X	X (a)	X
Center Pillar Lower Molded Plastic	X	X	Except 37,39,47,67	Except 39, 47
Center Pillar Upper Molding – Painted Textured Steel	36, 69	36, 46, 69	36, 46	36, 46
Center Pillar Cover Molding – Plastic			39	39
Coat Hooks, Plastic – Trim Color	X	X	Except 67	X
Center Dome Light-Plastic	X	X	Except 67	X
Front Door Jamb Switch, Key Reminder and Dome Lamp, L. H. Pillar	X	X	X	X
Tailgate Finish Lace	36	36, 46	36, 46	36, 46
Rear Door Jamb Switch				36, 39, 46
Roof Rail Shoulder Harness Spring Clips	X	X	Except 67	X

(a) Padded on Convertible
(b) Tailgate only.

STANDARD INTERIOR EQUIPMENT

SEATS AND FLOOR COVERING	BISCAYNE & BROOKWOOD 153-15400	BEL AIR & TOWNSMAN 155-15600	IMPALA & KINGSWOOD 163-16400	CAPRICE & KINGSWOOD ESTATE 16600
Front Seat Cushion, 1.25" Poly and Cotton	X	X		
Front Seat Cushion, 1.75" Poly and Cotton			X	X
Rear Seat Cushion, .50 Jute and Cotton	X	X		
Rear Seat Cushion, 1.75" Poly and Cotton			X	X
Third Seat Cushion, .75" Poly and Cotton		46	46	46
Package Shelf Cover and Edge Trim	69	69	37,39,47,69 (b)	39, 47 (b)
Folding Second Seat Back Latches	36	36, 46	36, 46	36, 46
Folding Front Seat Back Locks - Bright			37, 47, 67	47
Front Seat Center Armrest				39
Floor Mat - Vinyl Coated Rubber - Third Seat		46	46	46
Stowage Compartment Rubber Mat	36	36	36	36
Third Seat Courtesy Lamp		46	46	46
Carpet – Floor Covering	X	X	X	X
Luggage Compartment Light			37, 39, 47, 69, 67	39, 47
Luggage Compartment Spatter Paint	69	Except 36, 46	Except 36, 46	Except 36, 46
Luggage Compartment Mat – Vinyl Coated Cotton on Latex Foam			Except 36, 46	Except 36, 46
Front Seat End Trim Panels – Bright				39, 47
Bright Pedal Pad Trim				X
Front and Rear Seat Belts and Front Retainers (a)	X	X	X	X
Front Seat Shoulder Harness	X	X	X	X
Front Seat Head Restraint – Conventional Bench	X	X	X	X

(a) Includes Wagon Third Seat
(b) Fabric only on 39

STANDARD INTERIOR EQUIPMENT

DOOR AND QUARTER PANEL	BISCAYNE & BROOKWOOD 153-15400	BEL AIR & TOWNSMAN 155-15600	IMPALA & KINGSWOOD 163-16400	CAPRICE & KINGSWOOD ESTATE 16600
Front Door Armrest, Padded	X	X	X	X
Rear Door or Rear Quarter Padded Armrest with Ash Tray	36, 69	36,46,69	36,39,46,69	36,39,46 (c)
Bale Type Door Handle Remote Control	X	X	X	X
Rear Quarter Window Garnish Moldings – Painted		36,46,	36, 46	36, 46
Door Bead Trim Moldings			X	X
Rear Quarter Window Bead Trim Moldings			37, 47, 67	47
Rear Quarter Panel Padded Armrest and Ash Tray, Built-in		37, 47, 67	47	
Window Control Handle Knobs Clear Plastic, Bright Insert	X	X	X	X
Door Lock Buttons – Bright	X	X	X	X
Door Trim Panel Carpet				47, 39
Wood-Grain Door Panel Inserts			X	X
Front and Rear Door Locks 2 Position Free Wheeling	X	X	X	X

(a) With Bright Back Plate

STANDARD INTERIOR EQUIPMENT

INSTRUMENT PANEL AND STEERING WHEELS	BISCAYNE & BROOKWOOD 153-15400	BEL AIR & TOWNSMAN 155-15600	IMPALA & KINGSWOOD 163-16400	CAPRICE & KINGSWOOD ESTATE 16600
Glove Compartment Light		X	X	X
Cigarette Lighter	X	X	X	X
"Astro-Ventilation" Outlets, Bright (a)	X	X	X	X
Clock Electric				X
Clock Hole Cover	X	X	X	
Instrument Panel Knobs – Paint Filled	X	X	X	X
Convertible Top Switch and Knob			67	
Instrument Panel Pad – Upper	X	X	X	X
Instrument Panel Upper Trim Plate with Series Nameplate	X (a)	X (a)	X (b)	X (c)
Ash Tray Face Plate – Painted	X	X	X	X
Windshield Wiper and Washer, Two Speed	X	X	X	X
Cowl Kick Pad, Upper and Lower Vent Control Knobs – Bright	X	X	X	X
Instrument Panel Courtesy Lights (e)			67	X
Turn Signal and Shift Lever Knobs – Color Keyed	X	X	X	X
Steering Column Ignition Lock	X	X	X	X
Steering Wheel, Oval – Deluxe Trim, Shroud Mounted Horn Tabs and Center Emblem (e)	X	X	X	X
"Astro-Ventilation" L. H. Nameplate	X	X	X	X

(a) Bright Paint Filled Plastic
(b) Bright Wood Grain
(c) Bright - Brushed Aluminum - Wood-Grained
(d) Includes Pressure Valve in Lock Pillar (Except Wagons)
(e) Colored Shroud on Biscayne and Bel Air, Wood-Grain on Impala and Caprice.

STANDARD INTERIOR EQUIPMENT

GLASS	BISCAYNE & BROOKWOOD 153-15400	BEL AIR & TOWNSMAN 155-15600	IMPALA & KINGSWOOD 163-16400	CAPRICE & KINGSWOOD ESTATE 16600
Windshield, Laminated Safety Plate Glass	X	X	X	X
Backlight or Tailgate Window, Safety Solid Plate Tempered Glass	X	X	X	X
Door Windows, Safety Solid Plate Tempered Glass	X	X	X	X
Rear Quarter Windows, Safety Solid Tempered Plate Glass		36, 46	37,47,67 36, 46	36, 46
Convertible Rear Window, Tempered Glass			67	
STATION WAGON LOAD AREA				
Load Floor, Textured Metal – Vinyl Coated	X	X	X	X
Wheelhouse Trim Panel – Vinyl Coated, Textured Steel	X	36		
Inner Quarter Panel – Soft Trim	X	X	X	X
Wheelhouse – Soft Trim		X	X	X
Tailgate Window Control – Manual	36	36	36	36
Tailgate Window Control – Electric		46	46	46

EQUIPMENT	RPO/ACC		MODELS (1)
Air Conditioning			
Confortron (2)	C75		154-156-164-16600
Four-Season	C60		154-156-164-16600
GM-Chevrolet		ACC	15-16000
Appearance Guard Group (3)	ZP5		
Door Edge Guards	B93	ACC	15-16000, exc. 16636-46
Twin Front and Rear Floor Mats	B37	ACC	15-16000
Front Bumper Guards	V31	ACC	15-16000
Rear Bumper Guards	V32	ACC	15-16000 exc. Wgn.
Visor Vanity Mirror	D34	ACC	15-16000
Axles			
Positraction Ratios (See Power Train Sections)	G80		15-16000
Battery, Heavy Duty	T60		15-16000
Belts, Seat and Shoulder			
Deluxe Seat Belts and Front Shoulder Belts (4)	AK1		15-16000 exc. Conv.
Deluxe Seat Belts, Front and Rear (4)	A39		16467
Deluxe Shoulder Belts, Front	A85		16467
Deluxe Shoulder Belts, Rear	AS4		15-16000
Seat Belt Retractors, Front		ACC	15-16000
Child Safety Seat		ACC	15-16000
Clock, Electric (5)	U35	ACC	15-16000, exc. 16600
Compass, Auto		ACC	15-16000
Cruise Control	K30	ACC	154-156-164-16600
Deflectors			
Rain Deflectors		ACC	15-16000 exc. 69-36-46
Tailgate Window Air Deflector	C51	ACC	15-16000 Wgn.
Defoggers			
Electro-Clear Rear Window Defogger	C49		164-16647
Forced Air Rear Window Defogger (6)	C50	ACC	15-16000
Engines (See Power Train Sections			
Exhaust Systems			
Dual Exhaust	N10		154-156-164-16600
Evaporative Emission Control (7)	NA9		15-16000
Fan Drive		ACC	15-16000
Fender Skirts, Rear	T58		15-16000 exc. Wgn.
Fire Extinguisher			
Dry Chemical Extinguisher		ACC	15-16000
Recharge Kit		ACC	15-16000
Generator, 63-Ampere	K85		15-16000
Glass, Tinted			
All Windows	A01		15-16000
Windshield (Fleet Sales)	A02		15-16000
Guards			
Door Edge Guards (8)	B93	ACC	15-16000 exc. 16636-46
Front Bumper Guards (8)	V31	ACC	15-16000
Rear Bumper Guards (8)	V32	ACC	15-16000 exc. Wgn.
Headlight Delay System (9)	T81		15-16000
Heater, Engine Block	K05	ACC	15-16000
Highway Emergency Kit		ACC	15-16000

(1) Includes 119" wheelbase Station Wagons.
(2) Used only with C60.
(3) Items also available as independent options.
(4) Merchandised as YAI.
(5) Merchandised as independent option or through ZQ2 group.
(6) Not available as accessory for Station Wagon, Convertible, El Camino.
(7) California requirement.
(8) Merchandised as independent option or through ZP5 group.
(9) Merchandised as independent option or through ZQ2 group.

EQUIPMENT	RPO/ACC		MODELS
Infant Safety Carrier		ACC	15-16000
Lighting, Auxiliary (1)	ZJ9		
Courtesy Lights (2)			150-163-16400 exc. Conv.
Glove Compartment Light (2)			153-15400
Luggage Compartment Light (2)			15-16000 exc. Wgn.
Mirror Map Light			15-16000
Seat Belt, Door Ajar and Low Fuel Warning Light			15-16000
Underhood Light (2)			15-16000
Windshield Washer Fluid Monitor Light (2)			15-16000
Light Monitoring System, Front and Rear	U46		15-16000
Liquid Tire Chain		ACC	15-16000 exc. Wgn.
Locks			
Gas Cap Lock		ACC	15-16000
Station Wagon Rear Compartment Lock	A96	ACC	15-16000 2-Seat Wgn.
Rear Door Lock Guard		ACC	15-16000
Spare Wheel Lock		ACC	15-16000
Luggage Carriers			
Deck Lid Luggage Carrier		ACC	15-16000 exc. Wgn.
Roof Luggage Carrier	V55	ACC	15-16000 Wgn.
Roof Luggage Carrier Cover		ACC	15-16000 Wgn.
Mats, Floor			
Clear Vinyl Twin Front and Rear Mats		ACC	15-16000
Full-Width Front Mat		ACC	15-16000
Full-Width Heavy Duty Front Mat	B34		15000
Full-Width Heavy Duty Rear Mat	B35		15000
Load Floor Carpet	B39		164-16636-46
Load Floor Mat		ACC	15-16000 Wgn.
Twin Front and Rear Mats (3)	B37	ACC	15-16000
Mirrors			
Remote Control Outside Mirror (4)	D33		15-16000
Right Hand Outside Mirror		ACC	15-16000
Visor Vanity Mirror (3)	D34	ACC	15-16000
Molding			
Door and Window Frame Molding	B90		15000
Operating Convenience Group (5)	ZQ2		
Electric Clock	U35	ACC	15-16000 exc. 16600
Headlight Delay System	T81		15-16000
Remote Control Outside Mirror	D33		15-16000
Forced Air Rear Window Defogger	C50	ACC	15-16000
Pedal Trim Kit		ACC	15-16000 exc. 16600
Police Car	B07		15000
Power Assists			
Automatic Seat Back Latch (6)	AQ2		15-16000 2-Door
Electric Door Locks	AU3		15-16000
Electric Trunk Opener	A90		15-16000 exc. Wgn.
Power Brakes	J50	ACC	15-16000
Power Front Disc Brakes (7)	JL2		15-16000
6-Way Power Seat	A42		155-156-16000
Power Steering	N40		15-16000
Power Tailgate Window	A33		15-16000 2-Seat Wgn.
Power Windows	A31		15569, 15636-46-69, 16000

(1) Available from factory as option only.
(2) Available as separate dealer installation.
(3) Merchandised as independent option or through ZP5 group.
(4) Merchandised as independent option or through ZQ2 group.
(5) Items also available as independent options.
(6) Used only with RPO AU3.
(7) Standard on models 16447, 16600

EQUIPMENT	RPO/ACC		MODELS
Radiator, Heavy Duty	V01		15-16000
Radio Equipment			
AM Radio (1)	U63	ACC	15-16000
AM/FM Radio (1)	U69	ACC	15-16000
AM/FM Stereo Radio (2)	U79		15-16000
Stereo Tape System with AM Radio (2)	UM1		15-16000
Stereo Tape Sys. with AM/FM Stereo Radio (2)	UM2		15-16000
Stereo Tape Player (3)		ACC	15-16000
Rear Speaker	U80	ACC	15-16000
Stereo Tape Cartridge Holder		ACC	15-16000
Roof Cover, Vinyl	C08		15-16000 exc. conv. & wgn.
Seats			
Heavy Duty Front Seat	A75		15000
Heavy Duty Rear Seat	A76		15000 exc. Wgn.
Deluxe Front Seat Cushion	B55		15000
Shock Absorbers			
Superlift	G66		15-16000
Automatic Level Control	G67		15-16000
Ski Racks			
Demountable Ski Rack		ACC	15-16000
Roof Luggage Ski Rack		ACC	15-16000 Wgn.
Spotlight, Portable		ACC	15-16000
Steering Wheels			
Comfortilt	N33		15-16000
Cushioned Rim Steering Wheel	NK1		15-16000
Suspension			
Heavy Duty Front and Rear	F40		15-16000 exc. Wgn.
Taxicab	B02		153-15469
Tires (See Chassis Sections)			
Tissue Dispenser and Litter Container		ACC	15-16000
Tops			
Folding Top Colors	C05		16467
Trailer Equipment			
Equalizing Trailer Hitch		ACC	15-16000
Trailer Hitch		ACC	15-16000
Trailer Wiring Harness		ACC	15-16000
Transmissions (See Power Train Sections)			
Trim, Interior (See Interior-Exterior Color Combination Sections)			
Two-Tone Finish (See Interior-Exterior Color Combinations Sections)			
Wheel Covers			
Deluxe Wheel Covers	P02	ACC	15-16000
Full Wheel Covers	P01	ACC	150-163-16400
Mag-Style Wheel Covers		ACC	15-16000
Simulated Wire Wheel Covers		ACC	15-16000
Wheels			
Rally Wheel	ZJ7		15-16000
15 x 6 JK Wheel	P49		15-16000 exc. Wgn.
Windshield Wiper Control, Finger Tip	CD3		15-16000

(1) Concealed antenna for option; front mast for accessory.
Single front speaker for B, X; A and G without A/C.
Dual front speakers on top of instrument panel for A and G with A/C.
(2) Dual front speakers on top of instrument panel for B, A, G.
Dual front speakers on kick panel for X.
Dual rear speakers for B, A, G, X.
(3) With or without radio (AM or AM/FM). Two front, two rear speakers.

TAXI-CAB-RPO B02

MODELS: Biscayne 4-Dr. Sedan

BODY EQUIPMENT

SEATS . . . . . Heavy duty front and rear seats (front seat low profile); heavy duty black rubber front and rear floor mats with special mastic sound deadener underpad; jamb switches at front and rear doors for dome lamp; open door warning lamp on instrument panel.

CHASSIS EQUIPMENT

BODY MOUNTS . . . . . Heavy duty units at selected locations.

FRAME . . . . . Heavy duty, special gusseted frame with reinforced front upper control arm brackets.

FRONT SUSPENSION . . . . . Heavy duty metal lined spherical joints with special seals; heavy duty springs and shock absorbers.

REAR SUSPENSION . . . . . Two upper control arms with heavy duty bushings; heavy duty track bar; heavy duty 8-7/8 ring gear axle; heavy duty springs; heavy duty shock absorbers.

BRAKES . . . . . Heavy duty primary linings, front and rear; heavy duty brake drum webs front and rear; extra thick linings front and rear; heat resistant brake shoe retracting springs.

WHEELS . . . . . 15 x 6

TIRES Dependent On Optional Equipment . . F78 x 15 or G78-15

POWER TRAIN EQUIPMENT

STANDARD ENGINES: 250 Cu.In. L-6 and 350 Cu.In. V-8

L-6 ENGINE FEATURES . . . . . Economy carburetor; extra durable compression and oil control piston rings; hardened tip valve push rods; starter with special road splash sealing; take-apart engine ventilation valve; heavy duty radiator (automatic transmission only); heavy duty 61 A.H. battery; heavy duty lower rear crankshaft main bearing (automatic only); high-capacity 11-inch diameter diaphragm spring clutch (manual transmission).

AUTOMATIC TRANS. FEATURES . . . . . Heavy duty 11-3/4-inch heavy duty converter; additional clutch plate; larger gearset; positive shift characteristics on Turbo Hydra-Matic.

V-8 ENGINE FEATURES . . . . . Heavy duty compression rings, special oil control Piston Rings, valve rotators aluminized valves, hardened-tip valve pushrods, special hydraulic valve lifters, special rocker arms, special rocker arm balls.

MODELS: All Biscayne and Bel Air, Townsman and Brookwood

BODY EQUIPMENT

(Mandatory Option A75, Heavy Duty Front Seat)

SPEEDOMETER . . . . . 140 MPH Speedometer with 2 MPH graduations; 2 MPH accuracy over entire speed range.

FRONT SEAT . . . . . *Heavy duty low profile front seat;* special police car instrument cluster.

CHASSIS EQUIPMENT

BODY MOUNTS . . . . . Heavy duty units at selected locations.

FRAME . . . . . Heavy duty.

FRONT SUSPENSION . . . . . Heavy duty metal lined spherical joints with special seals; heavy duty strut rod bushing; heavy duty stabilizer bar; lower control arms with heavy duty frame pivot bushings; heavy duty springs; heavy duty shock absorbers.

REAR SUSPENSION . . . . . Two upper control arms with heavy duty bushings; heavy duty track bar; heavy duty 8-7/8 ring gear axle; heavy duty springs; heavy duty shock absorbers.

BRAKES . . . . . Front disc brakes with power assist standard; heavy duty extra thick primary rear linings; heavy duty brake drum webs and special brake shoe retracting springs.

WHEELS . . . . . 15 x 6.0

TIRES Dependent On Optional Equipment . . F78 x 15B or G78 x 15B
Station Wagons: H78-15D

POWER TRAIN EQUIPMENT

STANDARD ENGINES: 250 Cu.In. L-6 and 350 Cu.In. V-8.
(Mandatory Option T60; Heavy Duty starting package including 80 ampere hour sealed terminal battery)

L-6 ENGINE FEATURES . . . . . Extra durable compression and oil control piston rings; hardened-tip valve push rods; starter with special road splash sealing; take-apart engine ventilation valve; heavy duty radiator (automatic only); 5-blade fan; heavy duty lower rear crankshaft main bearing (automatic only); truck-type hydraulic valve lifters; high capacity 11-inch diameter diaphragm spring clutch.

L-6 AUTOMATIC TRANS FEATURES . . . 11-3/4-inch *heavy duty converter additional clutch plate;* large gear set; extra capacity transmission oil cooler in radiator; radiator fan shroud.

V-8 ENGINE FEATURES . . . . . Heavy duty clutch with manual transmission; 5-blade, 18-in.; heavy duty radiator (automatic transmission).

V-8 AUTOMATIC TRANS. FEATURES . . . Heavy duty oil pump, valve body and low and drive *regulator valve;* extra capacity transmission oil cooler in radiator.

COMFORTRON AUTOMATIC TEMPERATURE CONTROL (RPO C75)

Integral air cooling and heater system. Used only with RPO C60 system. Automatically controlled by pre-setting on instrument control panel. Control assembly consists of horizontal lever and vertical temperature wheel. In-car sensor located on instrument panel; ambient sensor located beneath air intake cowl.

FOUR SEASON (RPO C60)

Integral air cooling and heater system. Manually controlled by two horizontal levers on instrument control panel plus 4-speed fan switch. Upper lever (mode selector control) uses vacuum supply and electrical switches to operate mode doors and compressor. Lower lever uses bowden cable to operate temperature door. Five air outlets: 1 center, 2 side, 2 lower.

BASIC COMPONENTS

Control panel, evaporator, blower, condenser, receiver-dehydrator, refrigerant (freon) tank, air intake assembly and duct assembly for both systems. Comfortron also includes sensors, transducer and power servo unit for automatic operation.

EQUIPMENT (Used in addition to or in place of base equipment)

CHASSIS

Front and Rear Springs	Heavy duty
Rear Axle Ratio - Refer to Power Trains Section.	

POWER TRAINS

Fan Blade	7 blade
Fan Clutch	Thermomodulated fluid coupling
Crankshaft Pulley	Dual
Water Pump & Fan Pulley	Single
Compressor & Crankshaft Belt	One
Generator	63 Ampere
Radiator	Heavy duty

CUSTOM AIR CONDITIONING (ACCESSORY)

Air cooling unit dealer-installed beneath instrument panel. Manually controlled by two knobs: Upper knob for cool air volume, with 3-speed twin centrifugal blower; lower knob for cool/warm temperature control. Two front grille louver outlets, two round side outlets.

BASIC COMPONENTS

Evaporator and blower, compressor, condenser, receiver-dehydrator.

EQUIPMENT

It is recommended that heavy duty cooling equipment be used on all vehicles for securing maximum air conditioning performance.

DIMENSIONS AND WEIGHTS

INTERIOR DIMENSIONS

FRONT COMPARTMENT

CODE	DESCRIPTION	SEDAN		COUPES		CONVERT-IBLE	STATION WAGON
		Std.	Sport	Sport	Custom		
H-3	Seat cushion height	11.5					11.6
H11	Entrance height	30.2	29.8	29.7		30.4	30.2
H13	Steering wheel thigh clearance	3.4					3.5
H30	H point to heel point	9.2					
H32	Seat cushion deflection	4.4					4.2
H50	Upper body opening to ground	49.9	49.5	48.4		50.1	49.9
H58	H point rise	0.7					
H61	Effective headroom	38.8	38.0	38.3	37.7	38.5	39.0
H70	H point to body O line	14.2					
H75	Effective 'T' point headroom	39.0	38.2	38.5	37.9	38.7	39.2
W3	Shoulder room	62.3		61.8			62.3
W5	Hip room	63.5	63.6	63.5	63.6	63.5	63.7
L7	Steering wheel torso clearance	12.1					11.5
L17	H point travel	4.8					
L34	Effective leg room	42.3					41.4

REAR COMPARTMENT

H8	Seat cushion height	14.9	14.7	13.5	13.2	13.5	14.7
H12	Entrance height	30.0	29.8		---		29.8
H31	H point to heel point	11.8	10.9	10.9	10.7	10.9	11.9
H33	Seat cushion deflection	4.0	4.9	4.1			4.5
H51	Upper body opening to ground	49.7	48.8		---		49.8
H63	Effective headroom	37.8	37.6	37.8	37.5	37.9	38.8
H71	H point to body O line	14.2	13.5	13.3			14.5
H76	Effective 'T' point headroom	37.7	37.2	37.7	37.2	37.9	38.8
W4	Shoulder room	61.2	61.3	61.0			61.4
W6	Hip room	62.7	62.6	55.5			63.0
L3	Rear compartment room	27.3		25.3		24.5	27.9
L50	H point couple distance	35.5	35.2	32.5			34.8
L51	Effective leg room	38.1	37.4	33.9			37.1

STATION WAGON THIRD SEAT

W85	Shoulder room	49.7
W86	Hip room	49.2
H86	Effective headroom	36.2
L86	Effective leg room	33.3
L87	Knee room	12.8

LUGGAGE COMPARTMENT

---	Opening width						
---	Interior height						
---	Interior width						
---	Interior length						
H195	Liftover height	27.5	27.6	27.1	27.0	27.2	
V1	Usable luggage capacity (cu.ft.)	18.5		18.1	18.6	17.5	
---	Total volume (cu.ft.)						

STATION WAGON CARGO SPACE

H201	Maximum cargo height	30.7
H202	Rear opening height	28.8
H250	Tailgate to ground height	24.1
W200	Cargo width-front	63.1
W201	Cargo width-wheelhouse	49.7
W203	Rear opening width at floor	52.4
W204	Rear opening width at belt	52.4
W205	Rear opening width above belt	52.4
L200	Maximum cargo length-front seat	122.8
L201	Maximum cargo length-second seat	88.6
L202	Cargo length at floor-front seat	96.0
L203	Cargo length at floor-second seat	61.7
L204	Cargo length at belt-front seat	86.0
L205	Cargo length at belt-second seat	49.7
V2	Total cargo index volume (cu.ft.)	93.8(a)

(a) 9.0 cu. ft. hidden compt. on 2-seat and 6.4 cu. ft. hidden compt. on 3-seat station wagon.

LENGTHS

CODE	DESCRIPTION	SEDANS		COUPES		CONVERT-IBLES	STATION WAGON
		Std.	Sport	Sport	Custom		
L101	Wheelbase	119.0					
L102	Tire size (standard)	(a)					H78-15
L103	Overall length	216.0					216.7
L104	Overhang - front	37.4					37.3
L105	Overhang - rear	59.6					60.4
—	Overall length - less bumpers						
L127	Body O line to C/L of rear wheels	100.0					
L128	Hood length at centerline	59.8					

WIDTHS

W101	Tread - front	63.4					63.5
W102	Tread - rear	63.3					63.4
W103	Maximum overall width of car	79.8					
W106	Front fender overall width	79.8					
W107	Rear fender overall width	79.6					79.8
W120	Overall car width, front doors open	141.0		161.5			141.0
W121	Overall car width, rear doors open	145.1		—			145.1

HEIGHTS

H101	Overall height (design)	56.0	55.0	54.8	54.3	54.7	57.1
—	Overall height (curb)						
H102	Front bumper to ground	12.9		12.3	12.6	12.4	14.0
H104	Rear bumper to ground	13.2		12.7	12.6	12.8	11.9
H111	Rocker panel to ground - rear	8.3		7.8		7.9	10.0
H112	Rocker panel to ground - front	8.9		8.4	8.5	8.5	10.4
H114	Hood at rear to ground	39.8		39.3	39.4	39.4	40.8
H115	Step height - front (design)	13.2		12.7	12.8		14.0
H116	Step height - rear (design)	12.9		—			13.6
H125	Headlamp to ground	21.4	21.3	20.7	21.0	20.9	22.5
H126	Tail lamp to ground	16.5	16.6	16.1	16.0	16.2	21.7
H130	Step height - front (curb)	15.0		14.6		14.5	15.1
H131	Step height - rear (curb)	14.9		—			14.9
H136	Body O line to ground - front	6.2		5.6	5.8	5.7	7.2
H137	Body O line to ground - rear	5.9		5.4		5.5	6.5

CLEARANCES

H106	Angle of approach (degrees)	25.5					26.3
H107	Angle of departure (degrees)	18.0		17.0			19.0
H147	Ramp breakover angle (degrees)	17.0		16.6			14.5
H148	Front suspension to ground	7.1	7.0	6.4	6.7	6.6	8.1
H149	Oil pan to ground	6.2	6.2	5.6	5.8	5.7	7.2
H150	Flywheel housing to ground	6.5		5.9	6.1	6.0	7.5
H151	Frame to ground	8.5		8.0			9.2
H152	Exhaust system to ground	6.3	6.2	5.7	5.8		7.1
H153	Rear axle to ground						
H154	Fuel tank to ground	8.5	8.4	8.0		8.1	10.9
H155	Tire well to ground	—					8.4
H156	Minimum ground clearance	6.2		5.6	5.8	5.7	7.1
—	Location	H149					H152

(a) F78-15 Biscayne and Bel Air models, G78-15 Impala and Caprice models.

VEHICLE WEIGHTS

BISCAYNE

MODEL SYMBOL		VEHICLE TYPE	SHIPPING WEIGHT			CURB WEIGHT		
6-Cyl.	V-8	Description	Front	Rear	Total	Front	Rear	Total
15369	--	4-Door Sedan	1908	1692	3600	1880	1849	3729
--	15469		2030	1729	3759	2002	1886	3888

BEL AIR

15569	--	4-Door Sedan	1911	1693	3604	1883	1851	3734
--	15669		2032	1731	3763	2004	1887	3891

IMPALA

16369	--	4-Door Sedan	1937	1718	3655	1909	1875	3784
--	16469		2053	1749	3802	2025	1906	3931
16337	--	2-Door Sport Coupe	1930	1711	3641	1902	1869	3771
--	16437		2045	1743	3788	2017	1899	3916
--	16447	2-Door Custom Coupe	2053	1748	3801	2025	1905	3930
--	16439	4-Door Sport Sedan	1071	1800	3871	2043	1958	4001
--	16467	2-Door Convertible	2037	1806	3843	2009	1964	3973

CAPRICE

--	16647	2-Door Custom Coupe	2063	1758	3821	2035	1915	3950
--	16639	4-Door Sport Sedan	1089	1816	3905	2061	1972	4033

BROOKWOOD

--	15436	4-Door, 2-Seat Station Wagon	1892	2312	4204	1854	2479	4333

TOWNSMAN

--	15636	4-Door, 2-Seat Station Wagon	1894	2314	4208	1856	2481	4337
--	15646	4-Door, 3-Seat Station Wagon	1876	2387	4263	1838	2554	4392

KINGSWOOD

--	16436	4-Door, 2-Seat Station Wagon	1921	2348	4269	1883	2515	4398
--	16446	4-Door, 3-Seat Station Wagon	1901	2420	4321	1863	2587	4450

KINGSWOOD ESTATE

--	16636	4-Door, 2-Seat Station Wagon	1933	2362	4295	1895	2529	4424
--	16646	4-Door, 3-Seat Station Wagon	1919	2442	4361	1881	2609	4490

SHIPPING WEIGHT: Weight of basic vehicle with regular equipment, including grease, oil and (3) gallons of gasoline, and engine coolant to capacity.

CURB WEIGHT: Shipping weight plus gasoline to capacity.

OPTIONAL EQUIPMENT

RPO	OPTION	WITH	WEIGHT
AQ2	Electric Seat Back Lock Release		+ 6
AU3	Electric Door Locks	2-Door	+ 10
		4-Door	+ 13
A31	Power Windows		+ 24
A33	Power Tailgate Window	2-Seat Wagon	+ 7
A42	Power Seats		+ 21
B39	Load Floor Carpet	Station Wagon	+ 14
C08	Vinyl Roof Cover	47-39 Models	+ 9
		37-69 Models	+ 7
C60	Air Conditioning		+ 98
C75	Comfortron	C60	+ 6
JL2	Power Disc Brakes	J50	+ 27
J50	Power Drum Brakes		+ 9
–	250 Cu.In. 6 Cyl. Engine (155 H.P.)	Powerglide	- 5
		Turbo Hydra-Matic	+ 32
–	350 Cu.In. V8 Engine (250 H.P.)	Powerglide	+ 11
		Turbo Hydra-Matic	+ 36
L48	350 Cu.In. V8 Engine (300 H.P.)	Turbo Hydra-Matic	+ 63
LF6	400 Cu.In. V8 Engine (265 H.P.		+ 58
LS4	454 Cu.In. V8 Engine (345 H.P.)		+245
LS5	454 Cu.In. V8 Engine (390 H.P.)		+296
N40	Power Steering		+ 28
P02	Deluxe Wheel Trim Covers	Exc. Caprice	+ 28
		Caprice	+ 26
UM1	AM Pushbutton Radio & Tape Player		+ 25
UM2	AM-FM Pushbutton Radio & Tape Player		+ 39
U63	AM Pushbutton Radio		+ 8
U69	AM-FM Pushbutton Radio		+ 9
U79	Radio Stereo Equipment		+ 17
ZK1	Body Insulation Package (Fleet)		+ 22

BODY

EXTERIOR PAINT PROCESS

1. RUSTPROOFING. Assembled car bodies are chemically sprayed to clean and etch the metal surfaces for corrosion resistance and paint adhesion. Unassembled sheet metal parts follow the same process.

2. BODY AND SHEET METAL PRIMERS. Four corrosion resistant primers, specially formulated, are hand sprayed on the body in areas where rust might develop. Lower areas considered especially vulnerable are coated with another rust inhibiting compound.

3. PRIMER COAT is applied to all outside and inside surfaces of front fenders and hoods. The parts are mechanically dipped or flow-coated to insure coating in all seams and secluded areas, and baked at 390 degrees F. for 30 minutes. A coat of sealer is then applied by hand spray to all surfaces requiring another coat of lacquer.

4. FLASH PRIMER AND PRIMER-SURFACER COATS. An air-dry flash primer coat is hand sprayed on surfaces below the body belt line. Then a gray primer-surfacer coat is hand sprayed on all outside surfaces of the body and oven baked for 45 minutes at 285 degrees F.

5. INITIAL SANDING. Power wet sanding, followed by hand sanding, is done on all body surfaces requiring lacquering. This insures a smooth surface for the lacquer finish. To remove the water, the body is wiped and run through an infra-red oven.

6. LACQUERING. Three coats of acrylic lacquer are spread on the exterior surfaces of the body and sheet metal parts to build up a finish of the required thickness for each color.

7. INITIAL BAKING. To harden the paint for final sanding, the body and sheet metal parts are baked for approximately 10 minutes at 200 degrees F.

8. FINAL SANDING. To remove body surface defects, power and hand sanding is done with fine grit sandpaper and mineral spirits as a wetting agent. Sanded areas are wiped to insure a clean surface before final baking.

9. FINAL BAKING. To assure a durable, hard, high luster finish the lacquer is baked for 30 minutes at 275 degrees F. Reheating the lacquer after final sanding permits paint film to soften, allowing surface blemishes and sanding scratches to disappear during the thermo-reflow process.

10. UNDERCOATING. To block out road noise, an asbestos fiber sound deadener with asphalt base is sprayed inside the wheel housings and on the bottom of the underbody at designated areas.

11. PAINT REPAIR AND PROTECTION. Mars, nicks, or scratches that occur during final assembly are corrected at the factory before shipment. When required, light "slush" polishing brings painted surfaces to a high luster finish. Wax is applied to all horizontal surfaces of each vehicle and polished out for protection during shipment. The wax contains no silicones, thus eliminating any paint contamination problem.

BISCAYNE 153-400 SERIES
BEL AIR 155-600 SERIES

SERIES	MODEL	TYPE SEAT	INTERIOR TRIM COLORS AND RPO NUMBERS						
			Black		Medium Blue		Dk. Green	Medium Gold	
			Cloth	Vinyl	Cloth	Vinyl	Cloth	Cloth	Vinyl
Biscayne	69	Std. Bench		802		815			843
Bel Air			803	804	818	819	848	836	

RPO	EXTERIOR COLORS							
19	Tuxedo Black	X	X	X	X	X	X	X
14	Cortez Silver	X	X	X	X	X		
34	Misty Turquoise	X	X					
10	Classic White	X	X	X	X	X	X	X
28	Fathom Blue	X	X		X			
75	Cranberry Red	X	X					
25	Astro Blue	X	X		X			
50	Gobi Beige	X	X			X	X	X
48	Forest Green	X	X			X	X	X
45	Green Mist	X	X			X		
58	Autumn Gold	X	X			X	X	X
63	Desert Sand	X	X			X		
55	Champagne Gold	X	X				X	X
78	Black Cherry	X	X					
17	Shadow Gray	X	X	X	X			

RPO		TWO-TONES							
Lwr.	Upr.								
25	10	Astro Blue Classic White	X	X	X	X			
34	10	Misty Turquoise Classic White	X	X					
25	28	Astro Blue Fathom Blue	X	X	X	X			
55	10	Champagne Gold Classic White	X	X			X	X	X
58	10	Autumn Gold Classic White	X	X			X	X	X
28	25	Fathom Blue Astro Blue	X	X	X	X			
63	10	Desert Sand Classic White	X	X					

IMPALA 163-400 SERIES

MODELS					SEATS	INTERIOR TRIM COLORS AND RPO NUMBERS											
						Black		Medium Blue		Saddle	Dark Green		Med. Gold		Tur-quoise	Sandal-wood	Red
69	37	47	39	67	Std. Bench	Cloth	Vinyl	Cloth	Vinyl	Vinyl	Cloth	Vinyl	Cloth	Vinyl	Cloth	Vinyl	Vinyl
X					X	805	806	820	821		860		837		844		
			X		X	805	806	820	821		860	861	837		844	828	
	X				X	805	806	820	821	830	860	861	837		844	828	866
		X			X	805	806	820	821	830	860	861	837	841	844	828	
				X	X	805	806	820		830	860	861	837		844		866

RPO	EXTERIOR COLOR												
19	Tuxedo Black	X	X	X	X	X	X	X	X	X	X	X	X
14	Cortez Silver	X	X	X	X	X	X	X			X	X	X
34	Misty Turquoise	X	X								X	X	
10	Classic White	X	X	X	X	X	X	X	X	X	X	X	X
28	Fathom Blue	X	X		X							X	
75	Cranberry Red	X	X			X						X	X
25	Astro Blue	X	X		X							X	
50	Gobi Beige	X	X			X	X	X	X	X		X	
48	Forest Green	X	X			X	X	X	X	X		X	
45	Green Mist	X	X			X	X	X				X	
58	Autumn Gold	X	X			X	X	X	X	X		X	
63	Desert Sand	X	X			X	X	X				X	
55	Champagne Gold	X	X			X			X	X		X	
78	Black Cherry	X	X			X						X	X
17	Shadow Gray	X	X	X	X	X						X	

RPO		TWO-TONES @												
Lwr.	Upr.													
25	10	Astro Blue Classic White	X	X	X	X							X	
34	10	Misty Turquoise Classic White	X	X								X	X	
25	28	Astro Blue Fathom Blue	X	X	X	X							X	
55	10	Champagne Gold Classic White	X	X			X	X	X	X	X		X	
58	10	Autumn Gold Classic White	X	X			X	X	X	X	X		X	
28	25	Fathom Blue Astro Blue	X	X	X	X							X	
63	10	Desert Sand Classic White	X	X			X						X	

FOLDING TOP COLOR
White–Regular Production
Black–RPO

@–Not available on Convertible models.

CAPRICE 16600 SERIES

MODELS		SEAT TYPE	INTERIOR TRIM COLORS AND RPO NUMBERS						
			Black	Med. Blue	Dark Green	Med. Gold	Tur-quoise	Dark Blue	Sandal-wood
			Knit Cloth	Cloth	Knit Cloth	Cloth	Cloth	Knit Cloth	Cloth
47	39	Std. Bench	813	822	855	840	845	826	870

RPO	EXTERIOR COLOR							
19	Tuxedo Black	X	X	X	X	X	X	X
14	Cortez Silver	X	X	X		X	X	X
34	Misty Turquoise	X				X		X
10	Classic White	X	X	X	X	X	X	X
28	Fathom Blue	X					X	X
75	Cranberry Red	X						X
25	Astro Blue	X					X	X
50	Gobi Beige	X		X	X			X
48	Forest Green	X		X	X			X
45	Green Mist	X		X				X
58	Autumn Gold	X		X	X			X
63	Desert Sand	X		X				X
55	Champagne Gold	X			X			X
78	Black Cherry	X						X
17	Shadow Gray	X	X					X

RPO		TWO-TONES						
Lwr.	Upr.							
25	10	Astro Blue Classic White	X	X				X	X
34	10	Misty Turquoise Classic White	X				X		X
25	28	Astro Blue Fathom Blue	X	X				X	X
55	10	Champagne Gold Classic White	X		X	X			X
58	10	Autumn Gold Classic White	X		X	X			X
28	25	Fathom Blue Astro Blue	X	X				X	X
63	10	Desert Sand Classic White	X						X

STATION WAGON SERIES

		INTERIOR TRIM COLORS AND RPO NUMBERS				
		Black	Med. Blue	Saddle	Dark Green	Med. Gold
	Seat Type	Vinyl	Vinyl	Vinyl	Vinyl	Vinyl
Brookwood	Std. Bench	802	815	831	–	
Townsman	Std. Bench	804	819	838	–	839
Kingswood	Std. Bench	806	821	830	861	841
Kingswood Estate	Std. Bench	806	821	830	861	841

RPO	EXTERIOR COLOR					
19	Tuxedo Black	X	X	X	X	X
14	Cortez Silver	X	X	X	X	
34	Misty Turquoise	X				
10	Classic White	X	X	X	X	X
28	Fathom Blue	X	X			
75	Cranberry Red	X		X		
25	Astro Blue	X	X			
50	Gobi Beige	X		X	X	X
48	Forest Green	X		X	X	X
45	Green Mist	X		X	X	
58	Autumn Gold	X		X	X	X
63	Desert Sand	X		X	X	
55	Champagne Gold	X		X		X
78	Black Cherry	X		X		
17	Shadow Gray	X	X	X		

RPO Lwr.	RPO Upr.	TWO-TONES*					
25	10	Astro Blue Classic White	X	X			
34	10	Misty Turquoise Classic White	X				
25	28	Astro Blue Fathom Blue	X	X			
55	10	Champagne Gold Classic White	X		X	X	X
58	10	Autumn Gold Classic White	X		X	X	X
28	25	Fathom Blue Astro Blue	X	X			
63	10	Desert Sand Classic White	X		X		

* – Except Kingswood Estate

VINYL ROOF COLORS

RPO	EXTERIOR COLOR	VINYL ROOF COLORS				
		Black	White	Dark Blue	Dark Green	Dark Gold
19	Tuxedo Black	X	X			
14	Cortez Silver	X	X	X		
78	Black Cherry	X	X			
10	Classic White	X	X	X	X	
17	Shadow Gray	X				
75	Cranberry Red	X	X			
25	Astro Blue	X	X	X		
55	Champagne Gold	X	X			X
58	Autumn Gold	X	X			X
50	Gobi Beige	X	X			X
45	Green Mist	X	X		X	
48	Forest Green	X	X		X	
63	Desert Sand	X	X			
34	Misty Turquoise	X	X			
28	Fathom Blue	X	X	X		

Roof Sail Panel Moldings for 164-16647 models one color keyed to vinyl roof colors.

WINDSHIELD PILLAR MOLDING COLORS

INTERIOR TRIM COLOR	PILLAR MOLDING COLOR
Black	Black
Medium Blue	Dark Blue
Dark Blue	Dark Blue
Medium Saddle	Dark Saddle
Dark Green	Dark Green
Medium Turquoise	Dark Turquoise
Medium Red	Dark Red
Medium Gold	Dark Gold
Medium Sandalwood	Dark Sandalwood

All pillar moldings are painted metal except painted padding on metal for Convertible models.

SEAT BELT AND SHOULDER BELT COLORS

INTERIOR TRIM	STANDARD (a)	DELUXE (b)
	Seat Belts, Shoulder Belts, Roof Rail Retainers, Belt Retractor Colors	
Black	Black	Black
Medium Blue	Dark Blue	Dark Blue
Dark Blue	Dark Blue	Dark Blue
Medium Saddle	Black	Medium Saddle
Medium Turquoise	Black	Dark Turquoise
Medium Red	Black	Medium Red
Dark Green	Dark Green	Dark Green
Medium Gold	Medium Gold	Medium Gold
Sandalwood	Black	Medium Sandalwood

(a) Seat Belt and Shoulder Belt Buckles are plastic, same color as belts.
(b) Seat Belt and Shoulder Belt Buckles and brushed finish (includes Passenger-Driver Mini-Buckles).

BODY CONSTRUCTION AND GLASS AREA

GENERAL

Type . . . . . Unisteel, with cowl, roof, underbody and body panels welded to form body shell. Doors, front and rear lids are of double-panel construction and hinge assembled to body. Separate frame and bolt-on front end sheet metal, with protective inner fender skirts.

DOORS AND LOCKS

Door construction . . . . . Double steel panels, with side-guard doors hinged at front

Door handles . . . . . Push-button with fork type door locks. 2-position free-wheeling inside door handles on all doors.

Front door glass . . . . . Full ventless windows on all models.

HOOD AND TRUNK LID

Type . . . . . Counterbalanced, with spring loaded toggle action hinges on rear of hood and boxed hinges on trunk lid with torsion rod.

Hood release . . . . . External, top of grille, off center, with finger press release.

VENTILATION

High level air intake for passenger compartment . . . . . with double wall plenum chamber; providing washing and air drying of rocker panels for corrosion resistance. Air and water travel through rocker panels and drain at ends of rocker inner panels. Astro Ventilation with instrument panel outlets standard on all.

SEAT CONSTRUCTION

Type

Front seat cushion

1.25 poly pad 153-154-155-15600

1.75 poly pad 163-164-16600

Rear seat cushion

Jute and cotton 153-154-155-15600

1.75 poly pad 163-16400; 16636, 39, 46, 47

3rd seat cushion

0.75 poly pad 155-156-163-164-16646

WINDSHIELD WIPERS AND WASHERS

Type . . . . . Concealed dual 2-speed electric

Linkage . . . . . Parallel acting with articulated left arm.

HEADLIGHTS . . . . . Dual, horizontal at outer ends of grille above blade type bumper.

SPARE TIRE AND TOOLS

Location . . . . . Sedans and Sport Coupe, angled on center of shelf in trunk compartment; Station wagon, vertically in right hand side of cargo compartment rear of wheelhouse behind removable cover. Convertible, right side of trunk compartment rearward of wheelhouse. Tools consist of bumper jack with combination lever handle and wheel nut wrench mounted on diagonal brace in R.H. wheelhouse.

DUAL ACTION TAILGATE

Type . . . . . Standard on all station wagons. Two separate latches unlock the tailgate either as a gate or door.

BODY GLASS VISIBILITY AREA

	MODELS					
	69	39	37	47	67	36-46
Windshield	1396.2	1354.4				1396.2
Front Door Window	753.8	782.8	959.4			753.8
Rear Door Window	658.4	671.8	–			684.0
Rear Quarter Window	–		406.6	390.2	372.2	1187.4
Back Window	1230.4	1334.9	1029.1	933.2	767.3	923.4
Total Area (Sq. In.)	4038.8	4143.9	3929.5	3637.2	3453.3	4944.8

All window glass curved safety solid plate except curved laminated safety windshield and safety solid plate fixed convertible rear window.

CHASSIS

FRAME AND FRONT SUSPENSION

FRAME

Description . . . . . All welded perimeter frame, with front crossmember, rear axle upper control arm crossmember, rear shock absorber crossmember, and rear crossmember. Center sections and rear axle kickup are box welded construction. Body Mounting: Convertible - 8 biscuits + 6 cushions; Station Wagons - 8 biscuits + 4 cushions; all others - 8 biscuits + 2 cushions.

FRONT SUSPENSION

Description . . . . . Independent, SLA type with coil springs and concentric shock absorbers and spherical joint steering knuckle pivots for each wheel. Strut supported lower control arm.

Wheel travel (design)

Total	8.14
Jounce	3.85
Rebound	4.29
Wheel to spring, travel ratio	1.94

CONTROL ARMS

Description . . . . . Reinforced steel stamping with pre-loaded, steel encased rubber bushings at pivot.

STEERING KNUCKLES

Description . . . . . Forged steel, with integral brake cylinder mounting, and heat treated spindle detachable steering knuckle arm.

Spindle diameters

Inner bearing	1.2495
Outer bearing	.7494
Spindle thread size	3/4-20 NEF-3 (modified)

Wheel bearing

Type	Taper roller
Number	Two per spindle

SPHERICAL JOINTS

Type . . . . . Ball studs, upper self-adjusting for wear

Bearing surfaces

Upper	Two bearings; upper surface teflon coated phenolic; lower surface teflon cotton composition
Lower	One bearing; steel

SHOCK ABSORBERS

Type	Direct, double-acting, hydraulic
Piston diameter	1.00

STABILIZER BAR

Type	Link
Material	HR steel
Diameter	0.81

FRONT WHEEL ALIGNMENT (Curb)

Camber (degrees)	N1/4 to P3/4
Caster (degrees)	P1/4 to P1-1/4
Toe-in (total)	1/8 to 1/4
Steering axis inclination (degrees)	7 to 8

GENERAL SUSPENSION PROVISIONS

Car leveling	Front stabilizer bar
Anti-dive control	Angle of front upper control arm
Anti-squat control	Rear suspension geometry

FRONT SPRINGS

Selected from a family of springs by Electronic Data Processing which identifies the correct springs for the weight of the vehicle including optional equipment ordered by the customer.

FRONT SPRING SPECIFICATIONS

Part Number	Assembly Code	Cut-Off Length	Wire Dia.	Total Coils	Deflection Rate (lbs per inch)	HEIGHTS	
						Free	Working (In. @ lbs.)
3953901	QA	127.182	0.614	9.0	290	16.891	11.76 @ 1470
3953902	QB	127.207	0.614	9.0	290	17.064	11.76 @ 1520
3953903	QC	127.233	0.614	9.0	290	17.236	11.76 @ 1570
3953904	QD	127.258	0.614	9.0	290	17.409	11.76 @ 1620
3953905	QE	127.284	0.614	9.0	290	17.581	11.76 @ 1670
3953906	QF	141.715	0.636	10.0	290	17.753	11.76 @ 1720
3953907	QG	141.738	0.636	10.0	290	17.926	11.76 @ 1770
3953908	QJ	157.111	0.681	11.0	330	18.155	11.76 @ 2090
3953909	QK	157.137	0.681	11.0	330	18.367	11.76 @ 2160
3953910	QL	113.894	0.641	8.0	390	15.284	11.76 @ 1350
3953911	QM	113.919	0.641	8.0	390	15.450	11.76 @ 1415
3953912	QN	113.944	0.641	8.0	390	15.617	11.76 @ 1480
3953913	QO	113.969	0.641	8.0	390	15.784	11.76 @ 1545
3953914	QP	113.995	0.641	8.0	390	15.950	11.76 @ 1610
3953915	QQ	128.559	0.668	9.0	390	16.117	11.76 @ 1675
3953916	QR	128.581	0.668	9.0	390	16.283	11.76 @ 1740
3953917	QS	128.604	0.668	9.0	390	16.450	11.76 @ 1805
3953918	QT	128.628	0.668	9.0	390	16.617	11.76 @ 1870
3953919	QU	128.651	0.668	9.0	390	16.783	11.76 @ 1935
3953920	QV	143.329	0.692	10.0	390	16.950	11.76 @ 2000
3953921	QW	143.350	0.692	10.0	390	17.116	11.76 @ 2065
3953922	QX	143.371	0.692	10.0	390	17.283	11.76 @ 2130
3953923	QY	114.969	0.688	8.0	500	14.761	11.76 @ 1470
3953924	QZ	114.998	0.688	8.0	500	14.961	11.76 @ 1570
3953925	CA	115.026	0.688	8.0	500	15.161	11.76 @ 1670
3953926	CB	115.055	0.688	8.0	500	15.361	11.76 @ 1770
3953927	CC	115.085	0.688	8.0	500	15.561	11.76 @ 1870
3953928	CD	129.868	0.716	9.0	500	15.761	11.76 @ 1970
3953929	CE	129.895	0.716	9.0	500	15.961	11.76 @ 2070
3953930	CF	129.921	0.716	9.0	500	16.161	11.76 @ 2170
3954603	CG	141.762	0.636	10.0	290	18.098	11.76 @ 1820
3954604	CH	141.785	0.636	10.0	290	18.270	11.76 @ 1870
3954605	CJ	141.809	0.636	10.0	290	18.443	11.76 @ 1920
3954606	CK	156.336	0.657	11.0	290	18.615	11.76 @ 1970
3954607	CL	156.357	0.657	11.0	290	18.787	11.76 @ 2020
3972764	CM	157.071	0.681	11.0	330	17.760	11.76 @ 1980
3972765	CN	157.092	0.681	11.0	330	17.942	11.76 @ 2040

37 Sprint

STEERING, DRIVELINE, WHEELS AND TIRES

MANUAL STEERING (Standard)
- Description . . . . . Semi-reversible, recirculating ball nut gear; and a collapsible steering column for safety. Tilt steering wheel optional.
- Ratios . . . . . Gear, 24:1; overall, 30.8:1
- Turning diameters (ft)
  - Outside front, wall to wall 45.5
  - Outside front, curb to curb 42.5
- Number of wheel turns, lock to lock 5.1
- Outside wheel angle with inside wheel @ 20° . . 22.5°
- Linkage . . . . . Parallelogram, rear of wheels, 2 tie rods
- Steering wheel
  - Type . . . . . oval
  - Diameter . . . . . 15.5 x 16.25

POWER STEERING, RPO N40
(Same as standard manual steering except as shown)
- Type . . . . . Integral power piston and vane-type pump driven by crankshaft pulley providing hydraulic pressure. Variable ratio steering gear for all except wagons.
- Ratios
  - All except wagons . . . . . Gear 16.0:1 on center, 12.4:1; overall 19.3:1 on center to 15.5:1
  - Wagons . . . . . Gear: 17.5:1 overall: 21.2:1
- Number of wheel turns, lock-to-lock
  - All except wagons 2.71
  - Wagons 3.54

DRIVELINE
- Type . . . . . Tubular, exposed
- Number used . . . . . One
- Diameter (OD) 3.25
- Length (C/L of U-joints)
  - 3-speed 61.57
  - Powerglide
    - All except Caprice 61.57
    - Caprice 61.76
  - Turbo Hydra-Matic with 307 V-8 . . . . . 60.21
  - Turbo Hydra-Matic with optional engines
    - All except Caprice 61.17
    - Caprice 60.06
- Wall thickness 065
- Prop Shaft Damper . . . . . On Caprice and Kingswood Estate model equipped with automatic transmission
- Universal joints
  - Type . . . . . Cross
  - Number used . . . . . Two
  - Bearings . . . . . Prepack, anti-friction
- Drive and torque . . . . . Through rear suspension control arms

WHEELS, REGULAR PRODUCTION
- Type . . . . . Short spoke spider
- Attachment to hub . . . 5 hex nuts, 7/16-20 UNF 2-B, arranged on a 4.75 diameter bolt circle
- Size
  - Except Wagons . . . . . 15 x 5
  - Wagons . . . . . 15 x 6
- Offset
  - 15 x 5 12
  - 15 x 6 06

WHEELS, RALLY-TYPE, RPO ZJ7
- Type . . . . . large ventilation slots
- Attachment to hub . . . . . Same as regular production
- Size . . . . . 15 x 6
- Offset 0.06

TIRES, STANDARD EQUIPMENT
- Construction . . . . . Fiberglass bias belted
- Load range . . . . . B
- Size
  - F78 x 15 or G78 x 15 (All 6-cyl. and Biscayne and Bel-Air with base V-8)
    - Static loaded radius F–12.7 G–12.9
    - Loaded rev/mi @ 45 mph F–765 G–755
    - Capacity @ 24 psi . . . . . F–N/A G–N/A
  - G78 x 15 (All except station wagons with L48 or LF6, and Impala and Caprice with base V-8)
    - Static loaded radius 12.9
    - Loaded rev/mi @ 45 mph 755
    - Capacity @ 24 psi . . . . . N/A
  - H78 x 15 (All except wagons with 454 CID)
    - Static loaded radius 13.1
    - Loaded rev/mi @ 45 mph 740
    - Capacity @ 24 psi . . . . . N/A
  - H78 x 15D (Station Wagons)
    - Static loaded radius . . . . . N/A
    - Loaded rev/mi @ 45 mph . . . . . N/A
    - Capacity @ 24 psi . . . . . N/A

REAR AXLE

Description . . . . . Semi-floating; housing consists of two welded tubes pressed into crossbore of cast iron differential carrier. Carrier contains an overhung pinion and hypoid gear supported by two taper roller bearings.
Pinion offset . . . . . (Vert) 1.50
Hypoid gear PD
2.56, 2.73, 3.08 . . . . . 8.125
2.56, 2.73, 3.07, 3.31 . . . . . 8.875
Pinion bearing adjustment . . . . . .Shim
Lubricant
Type . . . . . Military Spec. MIL-L-2105-B
Viscosity SAE80
Capacity (pts)
8.125 . . . . . 3.75
8.875 . . . . . 4.25

AXLE SHAFT

Type . . . . . Forged and hardened steel with integral drive flange
Wheel bearings . . . . . Single row cylindrical roller, one per wheel
Oil seal . . . . . Steel encased, spring loaded synthetic rubber

RING AND PINION GEAR TOOTH COMBINATIONS

8.125 Ring gear diameter
2.56 41,16
2.73 41,15
3.08 37,12

RING AND PINION GEAR TOOTH COMBINATIONS

8.875 Ring gear diameter
2.56 41,16
2.73 41,15
3.07 43,14
3.31 43,13

POSITRACTION DIFFERENTIAL (See Power Trains)

Type . . . . . .Two pinion with single disc clutch

REAR SUSPENSION, REGULAR PRODUCTION

Description . . . . . Link type. 2 and 4-door pillar models with base V-8 and with any transmission and 2 & 4-door hardtops with manual transmission and 350, 2-bbl engine: 3 link - 2 lower control arms, 1 upper control arm and tie rod from axle to frame. Others: 2 upper and 2 lower control arms and tie rod. Drive and torque through control arms.
Wheel travel (design)
Total 9.29
Jounce 3.85
Rebound 5.44
Wheel to spring, travel ratio 1.52

SHOCK ABSORBERS

Type . . . . . Direct double acting, hydraulic
Piston diameter 1.00

REAR SPRINGS

Selected from a family of springs by Electronic Data Processing which identifies the correct springs for the weight of the vehicle including optional equipment ordered by the customer.

REAR SPRING SPECIFICATIONS

Part Number	Assembly Code	Cut-Off Length	Wire Dia.	Total Coils	Deflection Rate (lbs per inch)	HEIGHTS	
						Free	Working (In. @ lbs.)
3953932	JV	148.221	0.626	10.4	230	17.836	12.37 @ 1250
3953933	JW	148.246	0.626	10.4	230	18.032	12.37 @ 1295
3953934	JX	148.271	0.626	10.4	230	18.227	12.37 @ 1340
3953935	JY	155.829	0.636	10.9	230	18.423	12.37 @ 1385
3953936	JZ	155.854	0.636	10.9	230	18.618	12.37 @ 1430
3953937	JA	161.920	0.643	11.3	230	18.814	12.37 @ 1475
3953938	JB	161.944	0.643	11.3	230	19.010	12.37 @ 1520
3953939	JC	145.923	0.647	10.2	265	17.212	12.37 @ 1275
3953940	JD	145.947	0.647	10.2	265	17.401	12.37 @ 1325
3953941	JE	145.970	0.647	10.2	265	17.590	12.37 @ 1375
3953944	DW	141.169	0.685	9.8	340	16.386	12.37 @ 1355
3953945	DX	141.194	0.685	9.8	340	16.592	12.37 @ 1425
3953946	DZ	141.220	0.685	9.8	340	16.798	12.37 @ 1495
3953947	DI	150.449	0.698	10.4	340	17.004	12.37 @ 1565
3953948	JM	150.473	0.698	10.4	340	17.209	12.37 @ 1635
3953950	JO	134.161	0.697	9.3	385	15.985	12.37 @ 1380
3953951	JP	134.186	0.697	9.3	385	16.180	12.37 @ 1455
3953952	JH	140.366	0.707	9.7	385	16.375	12.37 @ 1530
3953953	JI	140.390	0.707	9.7	385	16.569	12.37 @ 1605
3953954	JJ	149.126	0.751	10.2	450	16.545	12.37 @ 1865
3953955	JK	149.147	0.751	10.2	450	16.723	12.37 @ 1945
3953956	JL	149.168	0.751	10.2	450	16.900	12.37 @ 2025
3981247	DA	149.147	0.751	10.2	450	16.727	12.37 @ 1785
3981248	DB	148.217	0.626	10.4	230	17.805	12.37 @ 1160
3981249	DC	148.242	0.626	10.4	230	18.000	12.37 @ 1205

SERVICE BRAKES, REGULAR PRODUCTION

Type . . . . . Duo-servo 4-wheel hydraulic; dual circuit hydraulic system with warning lamp, and reverse self-adjusting feature.
Line pressure at 100 lb pedal load 739
Braking ratios
- Pedal 5.80
- Hydraulic 4.82
- Overall 27.9

Wheel cylinder area distribution (percent) . . . 62F;38R
Brake drum
- Diameter 11.0
- Construction . . . . . Composite, web cast into rim
- Material
  - Web . . . . . HR steel
  - Rim . . . . . Cast iron alloy
- Swept drum area 328.3

Brake lining
- Material . . . . . Asbestos composition; wet extruded front, compression molded rear. *Grooved primaries front & rear.*
- Length
  - Primary, front and rear 9.25
  - Secondary, front and rear 11.63
- Width
  - Front linings 2.75
  - Rear linings 2.00
- Thickness, minimum @ C/L 0.168
- Method of attachment . . . . . Bonded
- Total effective area 184.3
- Gross lining area 198.4

Master cylinder
- Piston diameter 1.00
- Piston travel (with available pedal travel) . . 1.22

Wheel cylinders
- Piston Diameter
  - Front 1.1875
  - Rear 1.00

Foot pedal travel 7.08

PARKING BRAKE

Type . . . . . Mechanical: Pull rods and cables operate rear service brakes; parking brake "ON" warning lamp provided.
Total effective area 76.5
Control . . . . . Pendulum foot pedal; released by T handle located below instrument panel to left os steering column.

POWER BRAKES, RPO J50

(Same as regular production service brakes except as follows)
Type . . . . . Vacuum power unit added to assist master cylinder; integral system.
Pedal effort . . . . . Approximately 30 percent less than regular production service brakes at same deceleration rate.
Braking ratios
- With regular production service brakes
  - Pedal 3.38
  - Hydraulic 4.82
  - Overall 16.3
- With front wheel disc brake system (See front wheel disc brakes)

Master cylinder
- Piston travel (with available pedal travel) 1.44

Foot pedal travel 4.92

FRONT WHEEL DISC BRAKES, RPO J52

(Regular production service brakes at rear wheels; Power assist required.
Type . . . Hub mounted front discs, with self-adjusting single piston caliper units mounted on the steering knuckle. A metering valve is provided for balance between front and rear brakes.
Braking ratios
- Pedal 3.41
- Hydraulic 15.2
- Overall 51.5

Total effective lining area, disc & drum 114.6
Gross lining area, disc & drum 124.3
Disc
- Diameter 11.75
- Material . . . . . Cast iron
- Swept area per disc 115.0
- Swept disc and drum area 368.4

Disc lining
- Material . . . . . Wet compression molded asbestos
- Size . . . . . 5.96 x 2.21 x .41
- Method of attachment . . . . . Riveted
- Total effective area per lining 9.5
- Gross lining area per lining 10.6

Master cylinder
- Piston diameter 1.125
- Piston travel (with available pedal travel) 1.44

Wheel cylinders
- *Front calipers*
  - Number per wheel 1
  - Diameter 2.938
- Rear drums
  - Diameter 1.00

Foot pedal travel 4.92

BULBS AND LAMPS

BULBS AND LAMPS	NUMBER REQUIRED ALL TRADE NUMBER	CANDLE POWER PER LAMP
Automatic transmission column	1-194	2
Back-up	2-1156	32
Brake warning	1-194	2
Courtesy		
Instrument panel	2-631	6
Rear quarter (9-passenger)	1-90	6
Direction signal indicator	2-194	2
Dome		
Roof center	1-211	12
Generator indicator	1-194	2
Glove compartment	1-1895	2
Headlamp hi-beam indicator	1-194	2
Headlamp Outer	2-4002	High beam 37.5W Low beam 55.0W
Inner	2-4001	High beam 37.5W
Heater controls	1-1895	2
Instrument cluster	5-194	2
License plate, rear	1-67	4
Luggage compartment	1-1003	15
Oil pressure indicator	1-194	2
Parking		
Park	2-1157	3
Turn		32
Side Marker - Front	2-194	2
Side Marker - Rear	2-194	2
Radio	1-1893	2
Spot lamp -- Portable	1-4416	30W
Tail		
Tail, stop and turn	15000, 2-1157	Tail, 3; stop & turn, 32
	16000, 4-1157	Tail, 3; stop & turn, 32
Temperature indicator	1-194	2
Underhood	1-93	15

CIRCUIT	TYPE OF PROTECTION	LOCATION AND CIRCUIT*
Air conditioning	AGC 25 fuse	In line
	AGC 25 fuse	Fuse panel (g)
Auto. trans. position pattern lamp	AGC 5 fuse	Fuse panel (c)
Back-up lamps	AGC 20 fuse	Fuse panel (d)
Brake warning lamp	AGC 10 fuse	Fuse panel (d)
Cigarette lighter	AGC 20 fuse	Fuse panel (b)
Clock	AGC 20 fuse	Fuse panel (b)
Courtesy lamps	AGC 20 fuse	Fuse panel (b)
Defroster rear window	AGC 20 fuse	Fuse panel (e)
Direction signal indicator lamps	AGC 20 fuse	Fuse panel (c)
Dome lamps	AGC 20 fuse	Fuse panel (b)
Fuel gage	AGC 10 fuse	Fuse panel (d)
Folding top motor	40 amp CB	Hinge pillar
Generator indicator lamp	AGC 10 fuse	Fuse panel (d)
Glove compartment lamp	AGC 20 fuse	Fuse panel (b)
Headlamps	15 amp CB	Light switch
Headlamps hi-beam indicator lamp	15 amp CB	Light switch
Heater	AGC 10 fuse	Fuse panel (g)
Heater controls lamps	AGC 5 fuse	Fuse panel (c)
Ignition switch lamp	AGC 4 fuse	Fuse panel (c)
Instrument cluster lamps	AGC 5 fuse	Fuse panel (c)
License plate lamp, rear	AGC 20 fuse	Fuse panel (d)
Luggage compartment lamp	AGC 20 fuse	Fuse panel (a)
Oil pressure indicator lamp	AGC 10 fuse	Fuse panel (d)
Park and turn lamp	20 amp CB	Light switch
Power seats	40 amp CB	Hinge pillar
Power windows	40 amp CB	Hinge pillar
Radio and radio lamp	AGC 10 fuse	Fuse panel (e)
Side Marker lamp - Front	AGC 20 fuse	Light switch
Side Marker lamp - Rear	AGC 20 fuse	Light switch
Speed cruise control	AGC 10 fuse	Fuse panel (e)
Speed warning device	AGC 20 fuse	Fuse panel (b)
Spot lamp – Portable	AGC 20 fuse	Fuse panel (b)
Tail, stop and turn lamps	AGC 20 fuse	Fuse panel (a)
Tailgate motor	40 amp CB	Hinge pillar
Temperature gage	AGC 10 fuse	Fuse panel (d)
Temperature indicator lamps	AGC 10 fuse	Fuse panel (d)
Traffic hazard indicator	AGC 20 fuse	Fuse panel (b)
Underhood lamp	SAE 4 fuse	In line
Windshield wiper, two-speed	SAE 20 fuse	Fuse panel (f)
	14 amp CB	Switch

* Letter suffix indicates same circuit

POWER TRAINS

POWER TEAM COMBINATIONS

ENGINE	TRANSMISSION	MODEL APPLICATION	AXLE RATIOS* STD.	A/C
Turbo Thrift 250 250 Cubic Inch L-6 155 HP Standard	3-Speed (2.85:1 low)	Sedans & Coupes (A)	3.08:1	NA
	Powerglide		3.08:1	NA
	Turbo Hydra-Matic		2.73:1	NA
Turbo-Fire 350 350 Cubic Inch V-8 250 HP Standard	3-Speed (2.54:1 low)	All Models except Station Wagons	3.08:1	3.08:1
	Powerglide		2.73:1	2.73:1
	Turbo Hydra-Matic		2.56:1	2.56:1
	3-Speed (2.54:1 low)	Station Wagons	3.36:1	3.36:1
	Powerglide			
	Turbo Hydra-Matic		2.56:1	2.56:1
Turbo-Fire 350 350 Cubic Inch V-8 300 HP RPO L48	Powerglide	All Models except Station Wagons	3.08:1	3.08:1
	Turbo Hydra-Matic		2.73:1	2.73:1
	Powerglide	Station Wagons	3.07:1	3.07:1
	Turbo Hydra-Matic		2.73:1	2.73:1
Turbo-Fire 400 400 Cubic Inch V-8 265 HP RPO LF6	Turbo Hydra-Matic	All Models	2.56:1	2.56:1
Turbo-Jet 454 454 Cubic Inch V-8 345 HP RPO LS4	Turbo Hydra-Matic	All Models	2.56:1	2.56:1
Turbo-Jet 454 454 Cubic Inch V-8 390 HP RPO LS5	Turbo Hydra-Matic	All Models	2.73:1	2.73:1

A–Not available with Impala Convertible, Sport Sedan, Custom Coupe & Caprice models.

*–Positraction axles available optionally for all ratios

MULTIPLICATION FACTORS

WITH MANUAL TRANSMISSIONS

ENGINE	CARBURETION	TRANSMISSION	TOTAL GEAR REDUCTION*					AXLE RATIO
			1st	2nd	3rd	4th	Rev	
250 Cu.In. L-6 155 HP Standard	Single Barrel	3-Speed	8.78	5.17	3.08		9.09	3.08
350 Cu.In. V-8 250 HP Standard	2-Barrel	3-Speed	7.82	4.62	3.08		8.10	3.08

WITH AUTOMATIC TRANSMISSIONS

ENGINE	TRANSMISSION	SELECTOR POSITION	TOTAL TORQUE MULTIPLICATION*	AXLE RATIO
250 Cu.In. L-6 155 HP Standard	Powerglide	Drive	11.77:1 - 3.08:1	3.08:1
		Low & Reverse	11.77:1 - 5.61:1	
	Turbo Hydra-Matic	Drive	14.44:1 - 2.73:1	2.73:1
		Low	14.44:1 - 6.88:1	
		Second	14.44:1 - 4.15:1	
		Reverse	11.06:1 - 5.27:1	
350 Cu.In. V-8 250 HP Standard	Powerglide	Drive	10.10:1 - 2.73:1	2.73:1
		Low & Reverse	10.10:1 - 4.80:1	
	Turbo Hydra-Matic	Drive	13.54:1 - 2.56:1	2.56:1
		Low	13.54:1 - 6.45:1	
		Second	13.54:1 - 3.89:1	
		Reverse	10.37:1 - 4.94:1	
350 Cu. In. V-8 300 HP RPO L48	Powerglide	Drive	11.40:1 - 3.08:1	3.08:1
		Low & Reverse	11.40:1 - 5.42:1	
	Turbo Hydra-Matic	Drive	14.44:1 - 2.73:1	2.73:1
		Low	14.44:1 - 6.88:1	
		Second	14.44:1 - 4.15:1	
		Reverse	11.06:1 - 5.27:1	
400 Cu.In. V-8 265 HP RPO LF6	Turbo Hydra-Matic	Drive	13.34:1 - 2.56:1	2.56:1
		Low	13.34:1 - 6.35:1	
		Second	13.34:1 - 3.79:1	
		Reverse	11.19:1 - 5.32:1	
454 Cu.In. V-8 345 HP RPO LS4	Turbo Hydra-Matic	Drive	13.34:1 - 2.56:1	2.56:1
		Low	13.34:1 - 6.35:1	
		Second	13.34:1 - 3.79:1	
		Reverse	11.19:1 - 5.32:1	
454 Cu.In. V-8 390 HP RPO LS5	Turbo Hydra-Matic	Drive	14.22:1 - 2.73:1	2.73:1
		Low	14.22:1 - 6.77:1	
		Second	14.22:1 - 4.04:1	
		Reverse	11.93:1 - 5.68:1	

* Axle ratio x transmission ratio

GENERAL DATA

Engine Type		L-6 OHV	V-8 OHV					
Piston Displacement (Cu.In.)		250	350			400	454	
Availability		Standard	Standard		L48	LF6	LS4	LS5
Number of Cylinders		Six	Eight					
Bore and Stroke (nominal)		3.875 x 3.53	4.00 x 3.48			4.125 x 3.75	4.251 x 4.00	
Compression Ratio		8.5:1	9.00:1		10.25:1	9.00:1	10.25:1	
Taxable (SAE) Horsepower		36.0	51.2			54.4	57.8	
Firing Order		1-5-3-6-2-4	1-8-4-3-6-5-7-2					
Idling Speed	3-Speed (in Neutral)	700						
	Powerglide (in Drive)	600						
	Turbo Hydra-matic (in Drive)	600						
Compression Press. (PSI) @ Cranking Speed, Engine Hot		140	150			160		
Power Plant Mountings	Front	Two, combination compression and shear type						
	Rear	One; full shear type						
Measurements	Fan to rear of engine block	34.49	30.69		30.16	30.69	33.97	
	Top of air cleaner to bottom of oil pan	27.44	29.29		26.79	29.29	27.62	
	Width - including air cleaner	30.15	27.34		27.97	27.34	30.00	

ADVERTISED ENGINE RATING

Engine Designation	Turbo-Thrift 250 L-6 155 HP	Turbo-Fire 350 V-8 250 HP	Turbo-Fire 350 V-8 300 HP	Turbo-Fire 400 V-8 265 HP	Turbo-Jet 454 V-8 345 HP	Turbo-Jet 454 V-8 390 HP
Availability	Standard	Standard	RPO L48	RPO LF6	RPO LS4	RPO LS5
Carburetor	Single Barrel	Two Barrel	Four Barrel	Two Barrel	Four Barrel	Four Barrel
Gross Brake HP @ RPM	155 @ 4200	250 @ 4800	300 @ 4800	265 @ 4400	345 @ 4400	390 @ 4800
Gross Torque @ RPM (lb-ft)	235 @ 1600	345 @ 2800	380 @ 3200	400 @ 2400	500 @ 3000	500 @ 3400

TURBO-THRIFT 250 L-6 ENGINE

Transmission		3-Speed	Turbo Hydra-Matic	Powerglide
Rear Axle Ratio		3.08:1	2.73:1	3.08:1
Tire Size		F78 x 15		
Crankshaft Revolutions per Mile		2350.0	2083.0	2350.0
Crankshaft RPM @ 1 MPH	Low	111.6	87.5	71.3
	Second	65.8	52.8	
	Third	39.2	34.7 (direct)	39.2 (direct)
	Reverse	115.5	67.0	71.3
Piston Travel (ft/mile)		1382.6	1225.5	1382.6

TURBO-FIRE 350 V-8 ENGINE

Transmission		3-Speed	Powerglide	Turbo Hydra-Matic
Rear Axle Ratio		3.08:1 (b)	2.73:1 (b)	2.56:1
Tire Size		G78 x 15 (a)		
Crankshaft Revolutions per Mile		2310.0	2047.5	1920.0
Crankshaft RPM @ 1 MPH	Low	97.8	60.1	80.6
	Second	57.8		48.6
	Third	38.5	34.1 (direct)	32.0 (direct)
	Reverse	101.3	60.1	61.8
Piston Travel (ft/mile)		1339.8	1187.6	1113.6

(a) H78 x 15D standard on Station Wagons. (b) 3.36:1 on Station Wagons.

TURBO-FIRE 350 V-8 ENGINE (RPO L48)

Transmission		Powerglide	Turbo Hydra-Matic
Rear Axle Ratio		3.08:1 (a)	2.73:1
Tire Size		G78 x 15 (a)	
Crankshaft Revolutions per Mile		2310.0	2047.5
Crankshaft RPM @ 1 MPH	Low	67.8	86.0
	Second		51.9
	Third	38.5 (direct)	34.1 (direct)
	Reverse	67.8	65.9
Piston Travel (ft/mile)		1339.8	1187.5

(a) H78 x 15D standard on Station Wagons. (b) 3.07 on Station Wagons.

TURBO-FIRE 400 V-8 ENGINE (RPO LF6)

Transmission		Turbo Hydra-Matic	
		RPO M38	RPO M40
Rear Axle Ratio		2.56:1	
Tire Size		G78-15 (a)	
Crankshaft Revolutions per Mile		1920.0	
Crankshaft RPM @ 1 MPH	Low	80.6	79.4
	Second	48.6	47.4
	Third	32.0 (Direct)	
	Reverse	61.8	66.6
Piston Travel (ft/mile)		1200.0	

(a) H78 x 15D standard on Station Wagons.

TURBO-JET 454 V-8 ENGINES

Transmission		Turbo Hydra-Matic	
		RPO LS4	RPO LS5
Rear Axle Ratio		2.56:1	2.73:1
Tire Size		H78-15 (a)	
Crankshaft Revolutions per Mile		1881.6	2006.6
Crankshaft RPM @ 1 MPH	Low	77.7	82.9
	Second	46.4	49.5
	Third	31.4	33.4
	Reverse	65.2	69.6
Piston Travel (ft/mile)		1254.4	1337.7

(a) H78 x 15D standard on Station Wagons.

VEHICLE PERFORMANCE FACTORS

ENGINE	BASE 250 CU.IN. 155 HP	BASE 350 CU.In. 250 HP	RPO L48 350 CU.IN. 300 HP	RPO LF6 400 CU.IN. 265 HP	RPO LS4 454 CU.IN. 345 HP	RPO LS5 454 CU.IN. 390 HP
MODEL	15569	15669	15669	15669	15669	15669

3-SPEED TRANSMISSION

Performance Weight (pounds)	4334	4491				
Pounds per Gross Horsepower	27.96	17.96				
Pounds per Cu.In. Displacement	17.34	12.83				
Gross HP per Cu.In. Displacement	.620	.714				
Power Displacement (cu.ft./mile)	169.99	233.94				
Displacement Factor (cu.ft./ton mile)	78.34	103.51				

TURBO HYDRA-MATIC

Performance Weight (pounds)	4336	4518	4540	4549	4736	4787
Pounds per Gross Horsepower	28.17	18.07	15.13	17.17	13.73	12.27
Pounds per Cu.In. Displacement	17.46	12.91	12.97	11.37	10.43	10.54
Gross HP per Cu.In. Displacement	.620	.714	.857	.662	.760	.859
Power Displacement (cu.ft./mile)	150.68	194.44	207.35	222.22	247.21	263.60
Displacement Factor (cu.ft./ton mile)	69.44	86.04	91.34	97.89	104.30	110.29

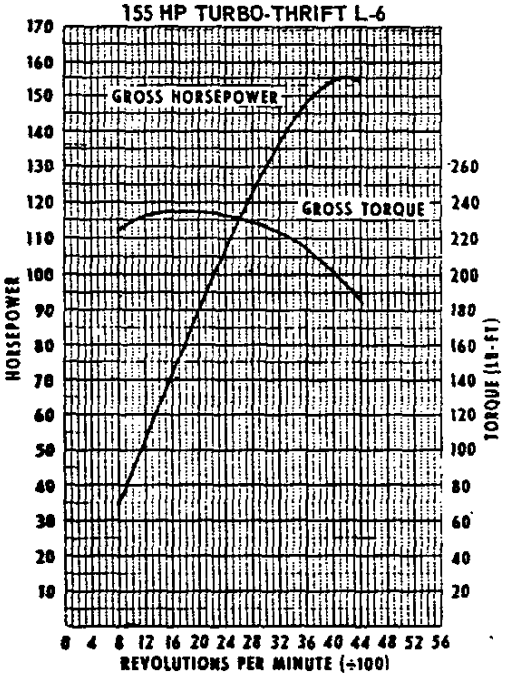
POWERGLIDE

Performance Weight (pounds)	4329	4502	4527			
Pounds per Gross Horsepower	27.92	18.01	15.09			
Pounds per Cu.In. Displacement	17.32	12.86	12.93			
Gross HP per Cu.In. Displacement	.620	.714	.857			
Power Displacement (cu.ft./mile)	169.99	207.35	233.93			
Displacement Factor (cu.ft./ton mile)	78.70	92.16	103.51			

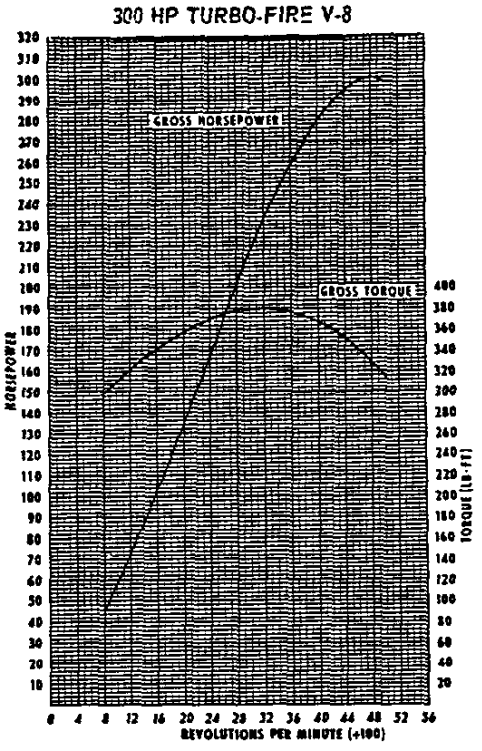
GLOSSARY

Performance Weight	Curb Weight plus 600 Lb.* (weight of four 150 lb passengers)
Power Displacement	$\frac{\text{Crankshaft Revs/Mi x Piston Displacement}}{2 \times 1728}$
Displacement Factor	$\frac{\text{Power Displacement}}{\text{Performance Wt (tons)}}$

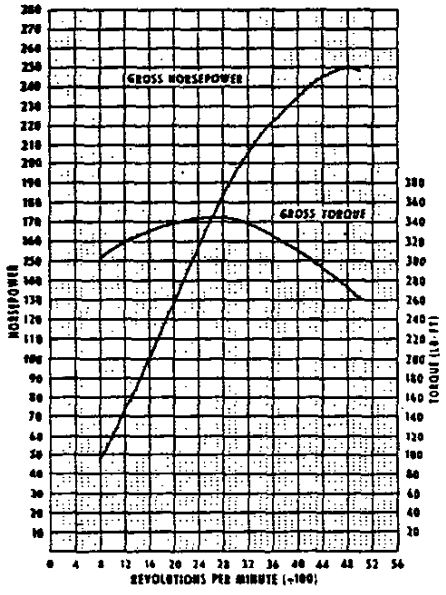
155 HP TURBO-THRIFT L-6



300 HP TURBO-FIRE V-8



250 HP TURBO-FIRE V-8



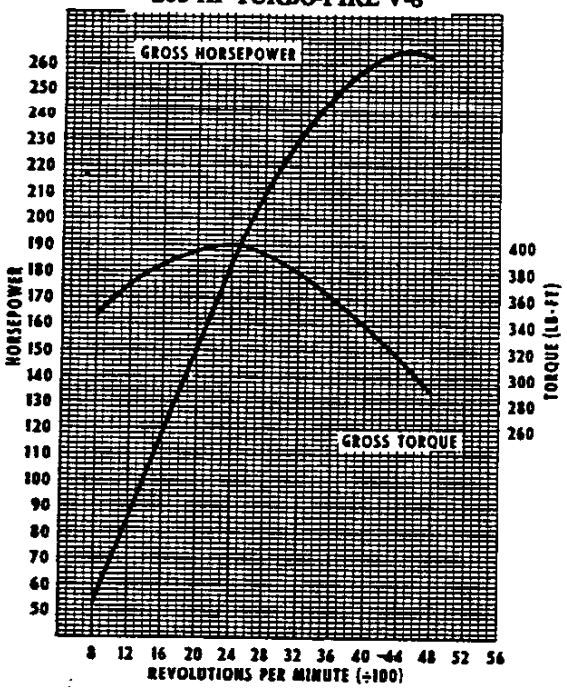
The engine output curves represent full throttle performance as obtained from dynamometer test data corrected to standard barometric pressure 29.92 inches of mercury and standard temperature of 60 degrees F.

GROSS POWER and TORQUE were obtained in a regular dynamometer test with the dynamometer exhaust system, no fan, generator not charging, optimum spark advance, and optimum fuel setting.

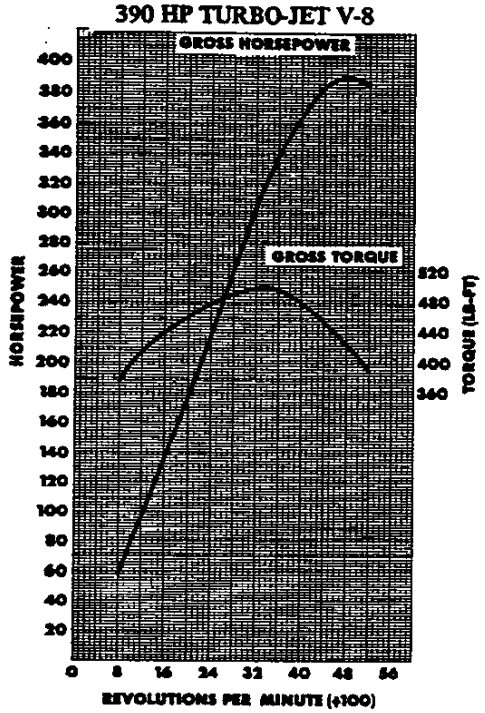
NET POWER and TORQUE were obtained from a dynamometer test simulating actual operating conditions when the engine is in its vehicle, except the generator is not charging.

ENGINE OUTPUT CURVES

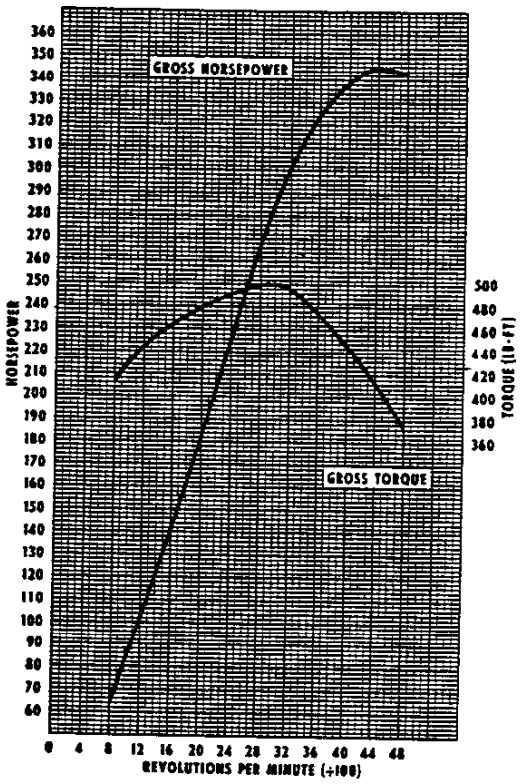
265 HP TURBO-FIRE V-8



390 HP TURBO-JET V-8



345 HP TURBO-JET V-8



The engine output curves represent full throttle performance as obtained from dynamometer test data corrected to standard barometric pressure 29.92 inches of mercury and standard temperature of 60 degrees F.

GROSS POWER and TORQUE were obtained in a regular dynamometer test with the dynamometer exhaust system, no fan, generator not charging, optimum spark advance, and optimum fuel setting.

NET POWER and TORQUE were obtained from a dynamometer test simulating actual operating conditions when the engine is in its vehicle, except the generator is not charging.

CYLINDER BLOCK

Material . . . . . Cast alloy iron
Bore diameter
L6-250 Cu.In. 3.8745-3.8775
V8-350 Cu.In. 3.9995-4.0025
V8-400 Cu.In. 4.1245-4.1275
V8-454 Cu.In. 4.2496-4.2524
No. of Bulkheads
L6 7
V8 5
Water Jacket . . . . . Full length around each cylinder
Cylinder Numbering Arrangement
L6 1-2-3-4-5-6
V8 . . . . . Left Bank 1-3-5-7
Right Bank 2-4-6-8
●Bore Spacing (Centerline to Centerline)
L6-250 Cu.In. 4.4
V8-350 & 400 Cu.In. 4.4
V8-454 Cu.In. 4.84

CYLINDER HEAD

Material . . . . . High chrome cast alloy iron
Bolt No. & Size
L6-250 Cu.In. . . . . 10; .500 dia. 13 threads/in.
V8-350 Cu.In. . . . . 34; .4375 dia. 14 threads/in.
V8-400 & 454 Cu.In. . 32; .4375 dia. 14 threads/in.

COMBUSTION CHAMBER VOLUME

(Total chamber volume of assembled engine with piston at top center)
L6-250 Cu.In. . . . . 5.73 Cu.In.
V8-350 Cu.In. . . . . 5.62 Cu.In.
V8-350 Cu.In. (RPO L48) . . . . . 4.83 Cu.In.
V8-400 Cu.In. . . . . 6.34 Cu.In.
V8-454 Cu.In. . . . . 6.31 Cu.In.

INLET MANIFOLD

Material . . . . . Cast alloy iron
Type
L6 . . . . . 3 port, rectangular section
V8 . . . . . 8 port, double deck

EXHAUST MANIFOLD

Material . . . . . Cast alloy iron
Type
L6-250 Cu.In. 4 port, rectangular, center takedown
V8-350 Cu.In. . . . . Dual, 4 port, center takedown
V8-400 & 454 Cu.In. . . . . Dual, 4 port, rear takedown
Outlet Diameter (Nominal)
L6-250 Cu.In. 2.0
V8-350 & 400 Cu.In. 2.0
V8-454 Cu.In. 2.5

CRANKSHAFT

Material
L6-250 Cu.In. . . . . Cast nodular iron
V8-350 & 400 Cu.In. . . . . Cast nodular iron
V8-454 Cu.In. . . . . Forged steel
End Play
L6-250 Cu.In. 002-.006
V8-350 & 400 Cu.In. 002-.006
V8-454 Cu.In. 006-.010
Counter Weights
L6 12
V8 6
Crank Arm Length
L6-250 Cu.In. 1.765
V8-350 Cu.In. 1.74
V8-400 Cu.In. 1.88
V8-454 Cu. In. 2.00
Torsional Damper . . . . . Rubber mounted inertia
Timing Gear
L6 . . . . . Steel, helical cut
V8 . . . . . Steel; sprocket & chain
Pulley Pitch Diameter 6.64

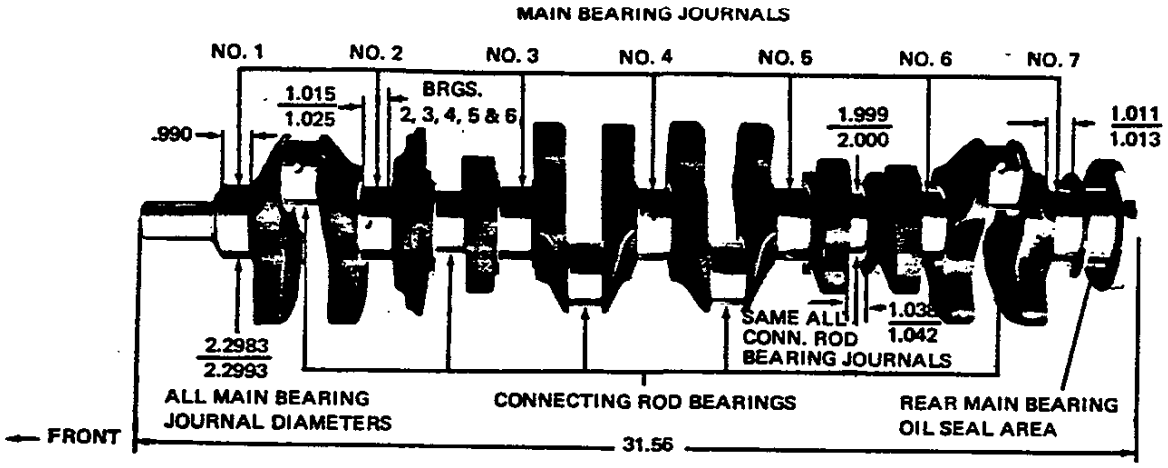
MAIN BEARINGS

Material . . . . . Steel backed insert; *(copper lead alloy or* premium aluminum lining selected for specific engine application)
Type . . . . . Precision removable
Thrust Against Bearing . . . . . No. 7 (L-6); No. 5 (V-8)
Clearance
L6-250 Cu.In. 0003-.0029
V8-350 & 400 Cu.In.
No. 1 . . . . . .0008-.0020
No. 2, 3 & 4 . . . . . .0011-.0023
No. 5 . . . . . .0017-.0033
V8-454 Cu.In.
No. 1 . . . . . .0007-.0019
No. 2, 3 & 4 . . . . . .0013-.0025
No. 5 . . . . . .0019-.0035

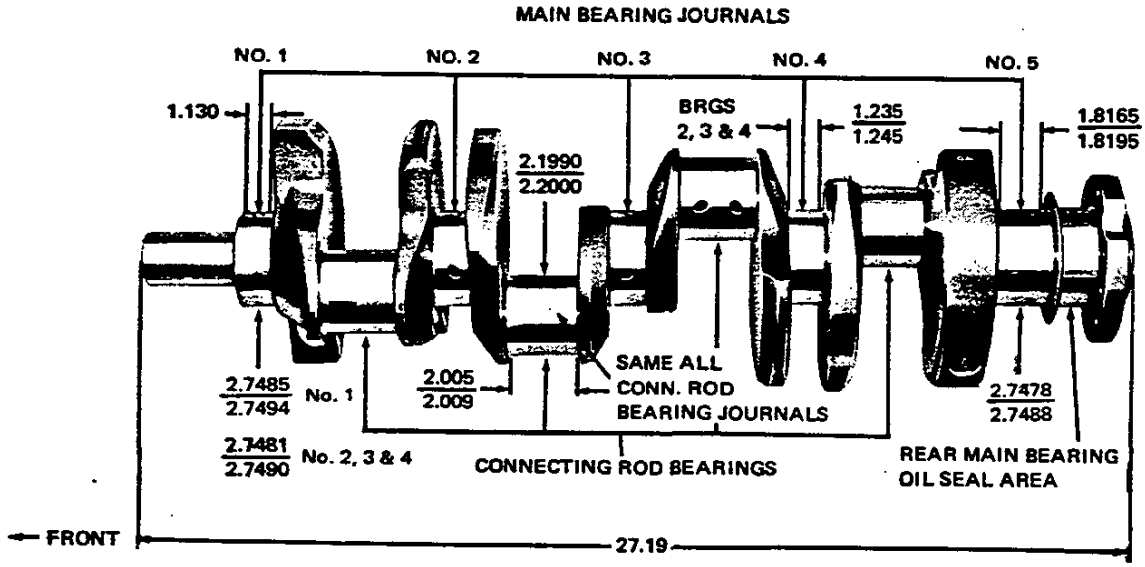
Dimensions	Theoretical Inner Dia.	Effective Length	Projected Area
L6-250 Cu.In.			
Bearing No. 1-6	2.3004	.752	1.7299
Bearing No. 7	2.3004	.760	1.7483
V8-350 Cu.In.			
Bearing No. 1	2.4502	.752	1.8425
Bearing No. 2, 3 & 4	2.4505	.752	1.8428
Bearing No. 5	2.4508	1.177	2.8846
V8-400 Cu.In.			
Bearing No. 1	2.6503	.752	1.9930
Bearing No. 2, 3 & 4	2.6506	.752	1.9933
Bearing No. 5	2.6509	1.177	3.1201
V8-454 Cu.In.			
Bearing No. 1	2.7503	.992	2.7283
Bearing No. 2, 3 & 4	2.7505	.992	2.7285
Bearing No. 5	2.7510	1.2525	3.4457

CRANKSHAFTS AND BEARINGS

250 CUBIC INCH SIX CYLINDER ENGINE



454 CUBIC INCH V-8 ENGINES



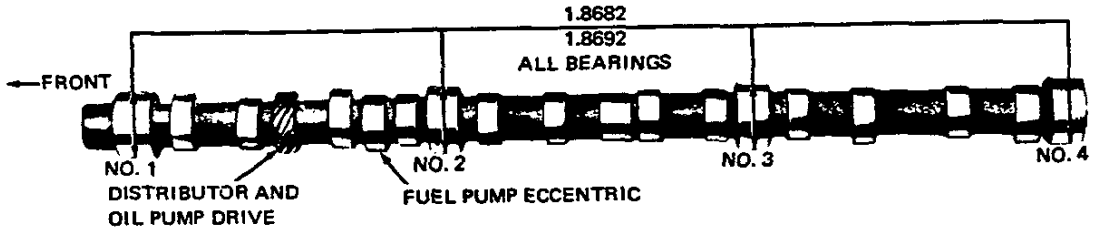
CAMSHAFT
- Material ..... Cast alloy iron
- Drive
  - L6 ..... Gear; bakelite and fabric composition with steel hub
  - V8 ..... Sprocket & chain; steel
- Lobe Lift
  - L6-250 Cu.In. ..... .2217 Inlet & Exhaust
  - V8-350 Cu.In. ..... .2600 Inlet; .2733 Exhaust
  - V8-400 Cu.In. ..... .2600 Inlet; .2733 Exhaust
  - V8-454 Cu.In. (LS4) .. .2343 Inlet; .2529 Exhaust
  - V8-454 Cu.In. (LS5) .. .2714 Inlet; .2824 Exhaust
- Bearings ..... Steel backed babbitt

VALVE TRAIN
- Type ..... Individually mounted, overhead rocker arms, push rod actuated
- Lifters ..... Hydraulic
- Push Rods
  - Type ..... Hollow steel
  - Ends
    - L6-250, V8-350 & 454 (345 hp) Cu.In. . Hardened
    - V8-400 & 454 (390 hp) .. Hardened steel inserts
- Rocker Arms
  - Material ..... Stamped steel
  - ●Ratio
    - L6-250 Cu.In. 1.75:1
    - V8-350 & 400 Cu.In. 1.50:1
    - V8-454 Cu.In. 1.70:1

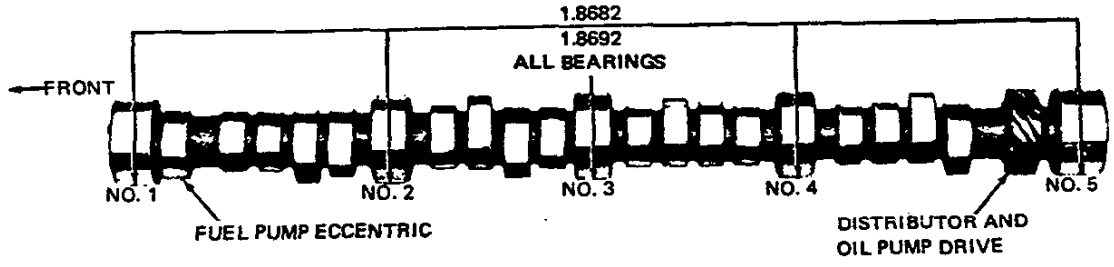
VALVE SPRINGS
- Diameter (I.D.)
  - L6-250 Cu.In. ..... .872-.888
  - V8-350 Cu.In. ..... .868-.884
  - V8-400 Cu.In. ..... .868-.884
  - V8-454 Cu.In. 1.080-1.094
- Installed Length (lb. @ In.)
  - Valves Closed
    - L6-250 Cu.In. ..... 56-64 @ 1.66
    - V8-350 Cu.In. ..... 76-84 @ 1.70
    - V8-400 Cu.In. ..... 76-84 @ 1.70
    - V8-454 Cu.In.–Outer spring .... 69-81 @ 1.88
      –Inner spring ..... 26-34 @ 1.78
  - Valves Opened
    - L6-250 Cu.In. ..... 180-192 @ 1.27
    - V8-350 Cu.In. ..... 194-206 @ 1.25
    - V8-400 Cu.In. ..... 194-206 @ 1.25
    - V8-454 Cu.In.–Outer spring ... 228-252 @ 1.38
      –Inner spring ..... 81-99 @ 1.28
- Free Length
  - L6-250 Cu.In. 1.90
  - V8-350 Cu.In. 2.03
  - V8-400 Cu.In. 2.03
  - V8-454 Cu.In.–Outer spring 2.12
    –Inner spring 2.06
- Valve Spring Damper
  - L6-250 Cu.In. ..... None
  - V8-350 Cu.In. ..... Flat steel, 4 coils
  - V8-400 Cu.In. ..... Flat steel, 4 coils

CAMSHAFT AND BEARINGS

250 CUBIC INCH L-6 ENGINE



350 and 400 CUBIC INCH V-8 ENGINES



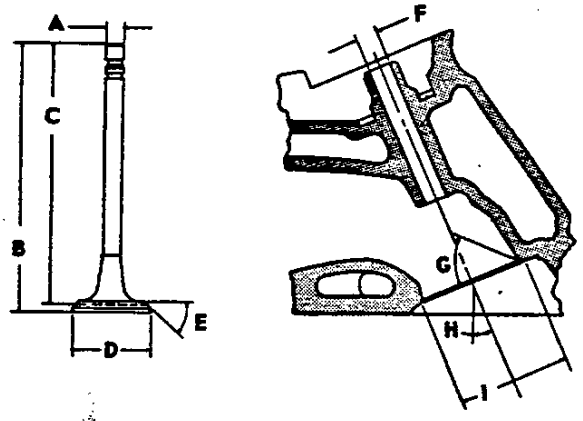
PRINCIPAL COMPONENTS

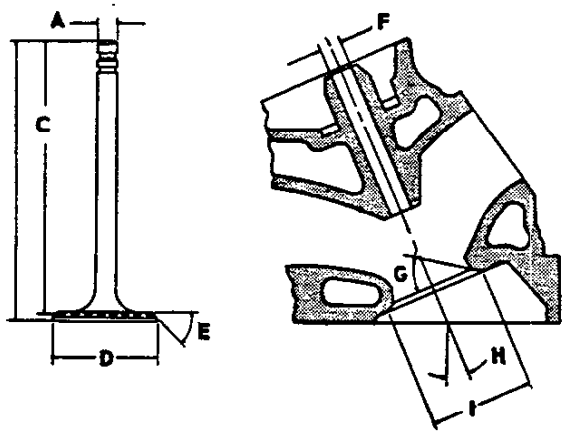
VALVES – INLET

Material	Alloy steel
Coating	
L6-250 Cu.In.	Aluminized face
V8-350 Cu.In.	None
V8-400 Cu.In.	Aluminized face
V8-454 Cu.In.	Face & head aluminized
Valve Guide Inserts (V8-454)	Cast alloy iron

VALVES – EXHAUST

Material	High alloy steel
Coating	
L6-250 Cu.In.	Aluminized face
V8-350 & 400 Cu.In.	Aluminized face
V8-454 Cu.In.	Face & head aluminized
Valve Guide Inserts (V8-454)	Cast alloy iron





A – Stem Diameter	
L6-250 Cu.In.	.3410-.3417
V8-350 & 400 Cu.In.	.3410-.3417
V8-454 Cu.In.	.3715-.3722
B – Overall Length	
L6-250 Cu.In.	4.902-4.922
V8-350 & 400 Cu.In.	4.870-4.889
V8-454 Cu.In.	5.215-5.235
C – Gage Length	
L6-250 Cu.In.	4.785-4.795
V8-350 & 400 Cu.In.	4.785-4.795
V8-454 Cu.In.	5.115-5.125
D – Overall Head Diameter	
L6-250 Cu.In.	1.715-1.725
V8-350 & 400 Cu.In.	1.935-1.945
V8-454 Cu.In.	2.060-2.070
E – Angle of Face	45°
F – Guide Diameter	
L6-250 Cu.In.	.3427-.3437
V8-350 & 400 Cu.In.	.3427-.3437
V8-454 Cu.In.	.3732-.3742
G – Angle of Seat	46°
H – Valve Angle	
L6-250 Cu.In.	9°
V8-350 & 400 Cu.In.	23°
V8-454 Cu.In.	4°
I – Valve Seat (Cutter) Diameter	
L6-250 Cu.In.	1.770-1.790
V8-350 & 400 Cu.In.	1.990-2.010
V8-454 Cu.In.	2.150

● A – Stem Diameter	
L6-250 Cu.In.	.3410-.3417
V8-350 & 400 Cu.In.	.3410-.3417
V8-454 Cu.In.	.3713-.3720
B – Overall Length	
L6-250 Cu.In.	4.913-4.933
V8-350 & 400 Cu.In.	4.913-4.933
V8-454 Cu.In.	5.345-5.365
C – Gage Length	
L6-250 Cu.In.	4.781-4.791
V8-350 & 400 Cu.In.	4.781-4.791
V8-454 Cu.In.	5.235-5.245
D – Overall Head Diameter	
L6-250 & V8-350 Cu. In.	1.495-1.505
V8-400 Cu. In.	1.595-1.605
V8-454 Cu.In.	1.715-1.725
E – Angle of Face	45°
F – Guide Diameter	
L6-250 Cu.In.	.3427-.3437
V8-350 & 400 Cu.In.	.3427-.3437
V8-454 Cu.In.	.3732-.3742
G – Angle of Seat	46°
H – Valve Angle	
L6-250 Cu.In.	9°
V8-350 & 400 Cu.In.	23°
V8-454 Cu.In.	4°
I – Valve Seat (Cutter) Diameter	
L6-250 Cu.In.	1.550-1.570
V8-350 & 400 Cu.In.	1.550-1.570
V8-454 Cu.In.	1.625

VALVE TIMING (Crankshaft degrees)

L6-250 Cu.In.	Excluding Ramps	Including Ramps
Inlet Valve (Zero lash)		
Opens - BTC	16°	62°
Closes - ABC	48°	94°
Duration	244°	336°
Exhaust Valve (Zero lash)		
Opens - BBC	46°30'	92°30'
Closes - ATC	17°30'	63°30'
Duration	244°	336°

V8-350 Cu.In.	Excluding Ramps	Including Ramps
Inlet Valve (Zero lash)		
Opens - BTC	28°	38°
Closes - ABC	72°	92°
Duration	280°	310°
Exhaust Valve (Zero lash)		
Opens - BBC	78°	88°
Closes - ATC	30°	52°
Duration	288°	320°

V8-400 Cu.In.	Excluding Ramps	Including Ramps
Inlet Valve (Zero lash)		
Opens - BTC	28°	38°
Closes - ABC	72°	92°
Duration	280°	310°
Exhaust Valve (Zero lash)		
Opens - BBC	78°	88°
Closes - ATC	30°	52°
Duration	288°	320°

V8-454 Cu.In. (LS4)	Excluding Ramps	Including Ramps
Inlet Valve (Zero lash)		
Opens - BTC	30°	42°
Closes - ABC	70°	94°
Duration	280°	134°
Exhaust Valve (Zero lash)		
Opens - BBC	77°	93°
Close - ATC	61°	61°
Duration	318°	334°

V8-454 Cu.In. (LS5)	Excluding Ramps
Inlet Valve (Zero lash)	
Opens - BTC	56°
Closes - ABC	114°
Duration	350°
Exhaust Valve (Zero lash)	
Opens - BBC	110°
Closes - ATC	62°
Duration	352°

VALVE LIFT

L6-250 Cu.In. . . . . .3880 Inlet & Exhaust
V8-350 Cu.In. . . . . .3900 Inlet, .4100 Exhaust
V8-400 Cu.In. . . . . .3900 Inlet; .4100 Exhaust
V8-454 Cu. In. (LS4) . . . . .3983 Inlet, .4300 Exhaust
V8-454 Cu.In. (LS5) . . . . .4614 Inlet, .4800 Exhaust

PISTONS

Material . . . . . Cast aluminum alloy
Head Type
L6-250 & V8-350 Cu.In. . . . . Flat, notched head
V8-400 Cu. In. . . . . Sump, notched head
V8-454 Cu. In. . . . . Domed head, valve cutout
Skirt Type . . . . . Slipper
Top Land Clearance
L6-250 Cu.In. 0245-.0335
V8-350 Cu.In. 0235-.0325
V8-400 Cu.In. 0365-.0455
V8-454 Cu.In. 0306-.0374
Skirt Clearance
L6-250 Cu.In. 0005-.0011
V8-350 Cu.In. 0007-.0013
V8-400 Cu.In. 0014-.0020
V8-454 Cu.In. 0020-.0028
Compression Ring Groove Depth
L6-250 Cu.In. 2153-.2218
V8-350 Cu.In. 2218-.2884
V8-400 Cu.In. 2328-.2393
V8-454 Cu.In. 2348-.2412
Oil Ring Groove Depth
L6-250 Cu.In. 2093-.2158
V8-350 Cu.In. 2038-.2103
V8-400 Cu.In. 2183-.2248
V8-454 Cu.In. 2183-.2247
Pin Bore Offset 055-.065
Compression Height
L6-250 Cu.In. 1.658-1.662
V8-350 Cu.In. 1.558-1.562
V8-400 Cu.In. 1.558-1.562
V8-454 Cu.In. 1.691-1.699

PISTON PINS

Material . . . . . Chromium steel
Length
L6-250 Cu.In. 2.990-3.010
V8-350 & 400 Cu.In. 2.990-2.010
V8-454 Cu.In. 2.930-2.950
Diameter
L6-250 Cu.In. 9270-.9273
V8-350 & 400 Cu.In. 9270-.9273
V8-454 Cu.In. 9895-.9898
Clearance in Piston
L6-250 Cu.In. 00015-.00025
V8-350 & 400 Cu.In. 00015-.00025
V8-454 Cu.In. 00030-.00040
Pin Mounting . . . . . Locked in rod by shrink fit

COMPRESSION RINGS - UPPER

- Material ..... Cast alloy iron
- Type ..... Straight edge inside of ring
- Face ..... Barrel
- Coating
  - L6-250 Cu.In. ..... Chrome plate
  - V8-350 Cu.In. ..... Chrome plate
  - V8-400 & 454 Cu.In. ..... Molybdenum inlay
- Width
  - L6-250 Cu.In. ..... .0628-.0633
  - V8-350 Cu.In. ..... .0775-.0780
  - V8-400 Cu.In. ..... .0770-.0780
  - V8-454 Cu.In. ..... .0770-.0775
- Wall Thickness
  - L6-250 Cu.In. ..... .184-.194
  - V8-350 Cu.In. ..... .190-.200
  - V8-400 Cu.In. ..... .196-.206
  - V8-454 Cu.In. ..... .202-.212
- Gap
  - L6-250 Cu.In. ..... .010-.020
  - V8-350 & 400 Cu.In. ..... .010-.020
  - V8-454 Cu.In. ..... .010-.020

COMPRESSION RINGS

- Material ..... Cast alloy iron
- Type ..... Inside bevel (top of ring 30 degrees to piston vertical axis for L6-250, V8-350 & 400; and 28°-52° for V8-454
- Face ..... Tapered
- Coating
  - L6-250 Cu.In. ..... Wear resistant
  - V8-350 & 400 Cu.In. ..... Wear resistant
  - V8-454 Cu.In. ..... Chrome plated
- Width
  - L6-250 Cu.In. ..... .0623-.0633
  - V8-350 Cu.In. ..... .0770-.0775
  - V8-400 Cu.In. ..... .0770-.0780
  - V8-454 Cu.In. ..... .0770-.0775
- Wall Thickness
  - L6-250 Cu.In. ..... .184-.194
  - V8-350 Cu.In. ..... .190-.200
  - V8-400 Cu.In. ..... .196-.206
  - V8-454 Cu.In. 202-212
- Gap
  - L6-250 Cu.In. ..... .010-.020
  - V8-350 Cu.In. ..... .013-.025
  - V8-400 & 454 Cu.In. ..... .010-.020

OIL CONTROL RINGS

- Type ..... Multi-piece (Two rails and one spacer)
- Material
  - Rails ..... Steel
  - Spacer ..... Alloy steel
- Width (assembled) ..... .1870-.1890
- Wall Thickness
  - L6-250 Cu.In. ..... .152-.158
  - V8-350 Cu.In. ..... .150-.156
  - V8-400 Cu.In. ..... .133-.139
  - V8-454 Cu.In. ..... .137-.143
- Gap
  - L6-250 Cu.In. ..... .015-.055
  - V8-350 Cu.In. ..... .015-.055
  - V8-400 & 454 Cu.In. ..... .010-.030
- Rail Coatings ..... Chrome plated

●CONNECTING RODS

- Material ..... Drop forged steel
- Length (center to center)
  - L6-250 Cu.In. 5.695-5.705
  - V8-350 Cu.In. 5.695-5.705
  - V8-454 Cu.In. 6.130-6.140
  - V8-400 Cu.In. 5.560-5.570

CONNECTING ROD BEARINGS

- Material
  - L6-250 Cu.In. ..... Copper lead alloy or sintered copper nickel backed babbit on steel
  - V8-350 & 400 Cu.In. ..... Premium aluminum
  - V8-454 Cu.In. ..... Premium aluminum
- Type ..... Precision removable
- Clearance
  - L6-250 Cu.In. ..... .0007-.0027
  - V8-350 & 400 Cu.In. ..... .0013-.0035
  - V8-454 Cu.In. ..... .0009-.0025
- Theoretical I.D.
  - L6-250 Cu.In. 2.0017
  - V8-350 & 400 Cu.In. 2.1019
  - V8-454 Cu.In. 2.2012
- Effective Length
  - L6-250 Cu.In. ..... .807
  - V8-350 & 400 Cu.In. ..... .797
  - V8-454 Cu.In. ..... .847
- End Play
  - L6-250 Cu.In. ..... .009-.014
  - V8-350 & 400 Cu.In. ..... .008-.014
  - V8-454 Cu.In. ..... .015-.023

FUEL TANK
- Capacity
  - Sedans, Coupes & Convertibles . 25 (approximately)
  - Station Wagons . . . . . 22 (approximately)
- Fuel Tank Location
  - Sedans, Coupes & Convertibles . . . Behind rear axle
  - Station Wagons . . . . . In left quarter panel
- Filler Location
  - Sedans, Coupes & Convertibles . . . . Behind hinged rear license plate
  - Station Wagons . . . . . Left rear quarter panel

FUEL FILTERS, DUAL
- In Fuel Tank . . . . . Mesh strainer
- In Carburetor Inlet . . . . . Paper

FUEL PUMP ASSEMBLY
- Type . . . . . Mechanical; diaphragm
- Drive . . . . . Camshaft, eccentric
- Location . . . . . Right side front of engine
- Pressure Range (shut off pressure at 1800 RPM)
  - L6-250 Cu.In. . . . . 4.00-5.00 PSI at pump outlet
  - V8-350 & 400 Cu.In. . 7.50-9.00 PSI at pump outlet
  - V8-454 Cu.In. . . . . 7.50-9.00 PSI at pump outlet

AIR CLEANER
- Type . . . . . Cylindrical single air horn
- Diameter
  - L6-250 Cu.In. 12.62
  - V8-350 & 400 Cu.In. 15.48
  - V8-454 Cu.In. 15.48
- Filter Element . . . . . Oil-wetted paper

CARBURETORS
- Make and Type
  - L6-250 Cu.In. . . . . Rochester, 1-barrel, Monojet
  - V8-350 Cu.In.
    - (250 hp) . . . . . Rochester, 2-barrel, downdraft
    - (300 hp) . . . . . Rochester, 4-barrel, Quadrajet
  - V8-400 Cu.In. . . . . Rochester, 2-barrel downdraft
  - V8-454 Cu.In. . . . . Rochester, 4-barrel, Quadrajet
- ●SAE Flange Size
  - L6-250 Cu.In. 1.50
  - V8-350 Cu.In. (250 hp) 1.50
  - V8-350 Cu.In. (300 hp) 1.50
  - V8-400 Cu.In. 1.50
  - V8-454 Cu.In. 1.50
- ●Throttle Bore
  - L6-250 Cu.In. 1.69
  - V8-350 Cu.In. (250 hp) 1.69
  - V8-350 Cu.In. (300 hp)
    - Primary 1.38
    - Secondary 2.25
  - V8-400 Cu.In. 1.69
  - V8-454 Cu.In.
    - Primary 1.38
    - Secondary 2.25
- Secondary Throttle Actuation . . . . . By linkage, approximately when primary valves are opened half way between closed and open
- ●Venturi Diameter
  - L6-250 Cu.In. 1.31
  - V8-350 Cu.In. (250 hp) 1.25
  - V8-350 Cu.In. (300 hp)
    - Primary 1.04
    - Secondary 625
  - V8-400 Cu.In. 1.40
  - V8-454 Cu.In.
    - Primary 1.04
    - Secondary 625

CHOKE
- Type . . . . . Automatic

EXHAUST AND VENTILATION SYSTEM

TYPE

L6-250 Cu.In.	Single
V8-350 Cu.In.	Single with crossover pipes
V8-400 Cu.In.	Single with crossover pipes
V8-454 Cu.In. (RPO LS4)	Single with crossover pipes
V8-454 Cu.In. (RPO LS5)	Dual with resonators

MUFFLERS

Type	Oval, reverse flow
Construction	Heads and body joined by rolled lock seam construction
Head	
L6-250 Cu.In.	.048 sheet steel, aluminized
V8-350 Cu.In.	.055 sheet steel, aluminized
V8-400 Cu.In.	.055 sheet steel, aluminized
V8-454 Cu.In. (RPO LS4)	.055 sheet steel, aluminized
V8-454 Cu.In. (RPO LS5)	
Left hand	.054 sheet steel, aluminized
Right hand	.054 stainless steel
Shell	
L6-250 Cu.In.	.036 sheet steel, zinc coated
V8-350 & 400 Cu.In.	.035 sheet steel, zinc coated
V8-454 Cu.In. (LS4)	.035 sheet steel, zinc coated
V8-454 Cu. In. (RPO LS5)	
Left hand	.036 sheet steel, zinc coated
Right hand	.036 stainless steel
Wrap	.030 indented asbestos sheet
Cover	.018 sheet steel, aluminized
Baffles	
L6-250 Cu.In.	No. 2 & 3-.036 zinc coated steel No. 1 & 4-.048 zinc coated steel
V8-350 & 400 Cu.In.	No. 1 & 4-.047 zinc coated steel No. 2 & 3-.035 zinc coated steel
V8-454 Cu.In. (RPO LS4)	No. 1 & 4-.048 zinc coated steel No. 2 & 3-.036 zinc coated steel
V8-454 RPO LS5	
Left hand	No. 1 & 4 .048 zinc coated steel No. 2 & 3-.036 zinc coated steel
Right hand	No. 1 & 4-.036 stainless steel
Length, Body	
L6-250 Cu.In.	21.24
V8-350 & 400 Cu.In.	21.25
V8-454 Cu.In.	21.25
Width (I.D.)	9.25
Height (I.D.)	5.00

EXHAUST CROSSOVER PIPE

Dimensions (O.D.)	
V8-350 & 400 Cu.In.	2.00
V8-454 (LS4) Cu.In.	2.00
Wall Thickness	
V8-350 & 400 Cu.In.	.097-.121 laminated
V8-454 (LS4) Cu.In.	.073-.091 laminated

EXHAUST PIPE

Dimensions (O.D.)	
L6-250 Cu.In.	2.00
V8-350 & 400 Cu.In.	2.50
V8-454 Cu.In.	2.50
Wall Thickness	
L6-250 Cu.In.	.057-.071
V8-350 & 400 Cu.In.	.073-.091 laminated
V8-454 Cu.In.	.072-.092 laminated

RESONATORS (V8-454 Cu.In. - RPO LS5 - only)

Type	Straight through
Cover	.035 stainless steel
Heads	.047 stainless steel

TAIL PIPES

Dimensions (O.D.)	
L6-250 & 327 Cu.In.	1.875
V8-350 & 400 Cu.In.	1.875
V8-454 Cu.In. (RPO LS4)	1.875
V8-454 Cu.In. (RPO LS4)	1.875
V8-454 Cu.In. (RPO LS5)	2.00
Wall Thickness	.062-.076

EXHAUST EMISSION CONTROLS

Positive Crankcase Ventilation	Utilizes manifold vacuum to draw off engine crankcase vapors through a metered PCV valve and ultimately to the intake system for engine reburn
Controlled Combustion System	Increases combustion efficiency through leaner carburetor adjustments and revises distributor calibration
Transmission Controlled Spark	Actually an expansion of the CCS system and basically retards engine spark advance by eliminating vacuum advance in all forward gears except Hi-gear.

GENERAL

Type	Controlled full pressure
Main Bearings	Pressure
Piston Pins	Splash
Cylinder Walls	
L6 Engine	Main and conn. rod bearing throwoff
V8 Engines	Pressure, jet cross sprayed
Camshaft Bearings	Pressure
Valve Lifters	Pressure
Rocker Arms	Pressure
Timing Gears	
L6 Engines	Nozzle metered
V8 Engines	Centrifugally oiled from front camshaft bearing
Oil Pressure Sending Unit	
Type	Electric
Actuation	Opens or closes circuit @ 2 to 6 PSI
Oil Filler	
Cap	Positive seal
Location	
L6-250	Forward end of rocker cover
V8-350 & 400	Rearward of left rocker cover
V8-454	Top center of right rocker cover

OIL PAN CAPACITIES (Quarts)

Refill	4
Refill with Filter Change	4.5

LUBRICANT GRADES AND TEMPERATURES

20° F and Above	20W,10W-30,10W-40,20W-40
0° F to 60° F	10W,5W-30,10W-30,10W-40
Below 20° F	5W, 5W-20, 5W-30

OIL PUMP

Type	Gear
Regulator Valve	Opens between 40-45 lbs
Oil Pressure	
L6-250	40 PSI @ 2000 RPM
V8-350 & 400	40 PSI @ 2000 RPM
V8-454	40 PSI @ 2000 RPM
Intake Type	Fixed pickup with screen
Capacity (GPM @ Engine RPM) (Theoretical)	
L6-250	4.3 @ 2000
V8-350 & 400	4.3 @ 2000
V8-454	6.0 @ 2000

OIL FILTER

Type	Full flow, throwaway canister
Location	
L6 Engine	Right side front of engine
V8 Engines	Left rear side of engine
Capacity (pints)	One
Bypass Valve	Opens between 9 to 11 PSI drop in pressure

OIL PAN DRAIN PLUG

Type	Hex head
Location	
L6 Engines	Front lower face of oil pan sump
V8 Engines	Left lower face of oil pan sump
Size of Hex Head	.860-.875
Thread	1/2-20 UNF 2A
Length	0.81
Diameter	.410-.430

OIL DIP STICK - LOCATION

L6-250	Right side, rear of engine block
V8-350 & 400	Left side, rear of engine block
V8-454	Right side, center direct to oil pan

COOLING SYSTEM

GENERAL

Type	Liquid, pressurized
Capacity with Heater (Standard Equipment)	
L6-250 Cu.In.	12 Qts.
V8-350 Cu.In.	16 Qts.
V8-400 Cu.In.	16 Qts.
V8-454 Cu.In.	22 Qts.

RADIATOR

Make and Type	Harrison, tube and center
Core Constant	
Distance between Fins	
L6-250 Cu.In.	.22 (Syn) .20 (Auto)
V8-350 Cu.In.	.18 (Syn) .16 (Auto)
V8-350 Cu.In. (L48)	.16 (Auto)
V8-400 Cu.In.	.20 (Auto)
V8-454 Cu.In.	.16 (Auto)
Distance between Tubes	.55
Thickness of core	
L6-250 Cu.In.	1.26
V8-350 Cu.In.	1.26
V8-400 & 454 Cu.In.	1.75
Frontal Area (Sq.In.)	
L6-250 Cu.In.	323
V8-350 Cu.In.	401
V8-400 & 454 Cu.In.	429

RADIATOR, HEAVY DUTY (RPO V01)

Core Constant	
Distance between Fins	
L6-250 Cu.In.	.18 (Syn) .16 (Auto)
V8-350 Cu.In.	.18 (Syn) .18 (Auto)
V8-350 Cu.In. (L48)	.18 (Auto)
V8-400 & 454 Cu.In.	.16 (Auto)
Distance between Tubes	.55
Thickness of core	
L6-250 Cu.In.	1.26
V8-350 & 400 Cu.In.	1.75
V8-454 Cu.In.	2.62
Frontal Area (Sq.In.)	
L6-250 Cu.In.	357
V8-350 & 400 Cu.In.	429
V8-454 Cu.In.	439

RADIATOR CAP RELIEF VALVE

Opens at	Approximately 15 PSI

THERMOSTAT

Type	Pellet
Begins to Open at	192° - 198°
Fully Opened at	217°
Thermostat By-Pass Hose (V8-454)	.745 ID

RADIATOR HOSE

Outlet, Lower (Radiator to Water Pump)	1.75 I.D.
Inlet, Upper (Thermostat Hsg. to Radiator)	1.50 I.D.

FAN

Number of Blades	4
Diameter	17.62; (V8-454) 18.00
●Fan Pulley Pitch Diameter	
L6 Engines	5.70
V8 Engines	7.00

BELTS, CRANKSHAFT, FAN AND GENERATOR

Number Used	One
Angle of "V"	38° -42°
Pitch Line	
L6-250 Cu.In.	37.30
V8-350 Cu.In.	44.25
V8-400 Cu.In.	44.25
V8-454 Cu.In.	44.25
Width	.380

WATER PUMP

Type	Centrifugal
Capacity	
L6-250 Cu.In.	27 GPM @ 2000 engine RPM
V8-350 Cu.In.	25 GPM @ 2000 engine RPM
V8-400 Cu.In.	26 GPM @ 2000 engine RPM
V8-454 Cu.In.	27 GPM @ 2000 engine RPM
Bearing	Permanently lubricated double row ball
Drive	Fan belt
●Ratio (Pump to Engine RPM)	
L6 Engines	1.165:1
V8 Engines	.949:1

DRAIN LOCATIONS AND TYPE

Radiator-Petcock	
All Engines	Lower right side of radiator
Engine Block - Plug	
L6-250 Cu.In.	Left rear side
V8-350 & 400 Cu.In.	Right and left center
V8-454 Cu.In.	Left side - rear of block Right side - center of block

SUPPLY SYSTEM
BATTERY
Voltage Rating 12
Cranking Power @ 0° F
L6-250 Cu.In. . . . . 2300 watts
V8-350 & 400 Cu.In. . . . . 2900 watts
V8-454 Cu.In. . . . . 3250 watts
Heavy Duty (RPO T60) . . . . . 3750 watts
Capacity (SAE) @ 20 hr. rate
L6-250 Cu.In. . . . . 45 amp. hr.
V8-350 & 400 Cu.In. . . . . 61 amp. hr.
V8-454 Cu.In. . . . . 72 amp. hr.
Heavy Duty (RPO T60) . . . . . 76 amp. hr.
Total Number of Plates
L6-250 Cu.In. 54
V8-350 & 400 Cu.In. 66
V8-454 Cu.In. 78
Heavy Duty 90
Number of Cells 6
Terminal Grounded . . . . . Negative
Location . . . Engine compartment; right side front

GENERATOR
Type . . . . . Diode rectified
Rating
Amps 37
Volts 12-15
Drive . . . . . By fan belt
●Pulley pitch diameter 2.62
●Ratio (Gen. to Engine Speed) 2.53:1

REGULATOR
Type . . . . . Two unit, vibrator
Voltage regulator
Voltage . . . . . 13.8-14.8 @ 85° F
Field Relay (Combination Light and Field Relay)
Closing Voltage . . . . . 1-3 volts @ 80° F
Location . . . . . Engine compartment; left side front

IGNITION SYSTEM
DISTRIBUTORS . . . . . Refer to chart below

CABLE . . . . . Linen core impregnated with electrical conducting material and insulation of rubber with neoprene jacket

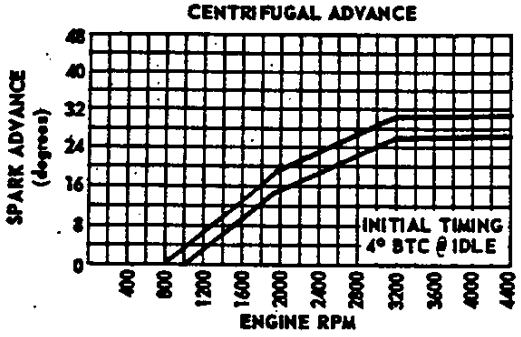
COIL
Type 12-Volt
Amperes Drawn
Engine Stopped 4.0
Engine Idling 1.8

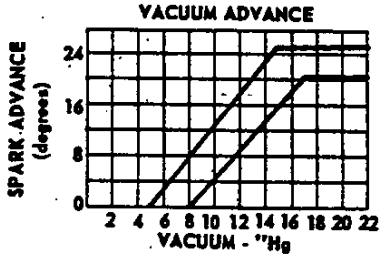
SPARK PLUGS
Type
L6-250 Cu.In. ACR46T
V8-350 & 400 Cu.In. ACR44
V8-454 Cu.In. (RPO LS4) ACR44T
V8-454 Cu.In. (RPO LS5) ACR43T
Thread Size (mm) 14
Gap 033-.038
Torque . . . . . 25 lb.ft.

STARTING SYSTEM
STARTING MOTOR
Rotation (Drive End View) . . . . . Clockwise
Test Conditions . . . . . Engine at operating temp.
No Load Test
Amps
L6-250 Cu.In. 49-87
V8-350 & 400 Cu.In. 65-100
V8-454 Cu.In. 70-99
Volts 10.6
RPM
L6-250 Cu.In. 6200-10700
V8-350 & 400 Cu.In. 3600-5100
V8-454 Cu.In. 7800-12000
Motor Drive
Engagement . . . . . Solenoid
Pinion Meshes at . . . . . Rear
Pinion Tooth No. 9
Flywheel Tooth No.
L6-250, V8-350 & 400 Cu.In. 153
V8-454 Cu.In. 168
Mounting
L6-250, V8-350 & 400 Cu.In. . . . . Bolted to cylinder block flange
V8-454 Cu.In. . . . . Bolted to clutch housing

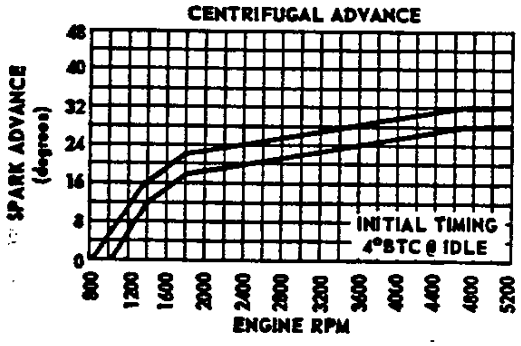
DISTRIBUTORS	Transmission	250 Cu.In.	350 Cu.In.		400 Cu.In.	454 Cu.In.	
		L6-155 HP	V8-250 HP	V8-350 HP	V8-265 HP	V8-345 HP	V8-390 HP
Model	Manual	1110463	1112001				
	Automatic	1110464	1112002	1111997	1111494	1111436	1111963
Type		Single breaker					
Cam angle		31°-34°	29°-31°			28°-30°	
Breaker gap		.019 (new)					
Breaker arm tension		19-23				28-32	
Centrifugal advance begins @ RPM	Manual	900	1000				
	Automatic	900	1000	950	1083	1085	1085
Maximum degrees @ RPM	Manual	32 @ 4200	36 @ 4100				
	Automatic	28 @ 4200	32 @ 4400	30 @ 4700	28 @ 4400	26 @ 4000	24 @ 3200
Vacuum advance begins @ In. Hg.	Manual	7.00	7.00				
	Automatic	7.00	7.00	8.00	8.00		
Maximum degrees @ In. Hg.	Manual	23 @ 16	24 @ 17.5				
	Automatic	23 @ 16	24 @ 17.5	20 @ 17	15 @ 15.5		
Timing (initial design setting) Crankshaft degrees @ RPM with vacuum line disconnected	Manual	TDC @ 750					
	Automatic	4 BTC @ 600			8 BTC @ 600	6 BTC @ 600	
Timing mark location		Torsional damper					

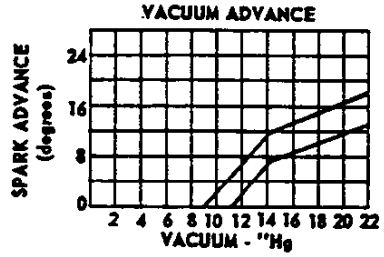
250 CUBIC INCH L-6 ENGINE



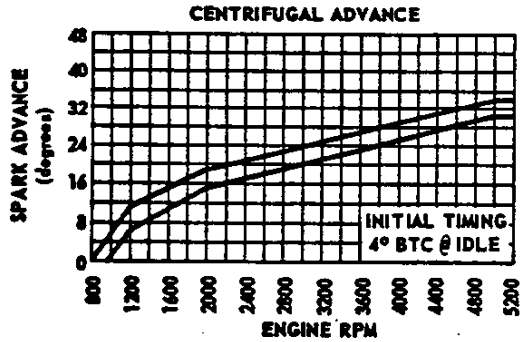


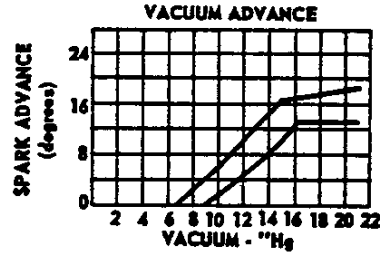
350 CUBIC INCH V-8 ENGINE — RPO L48



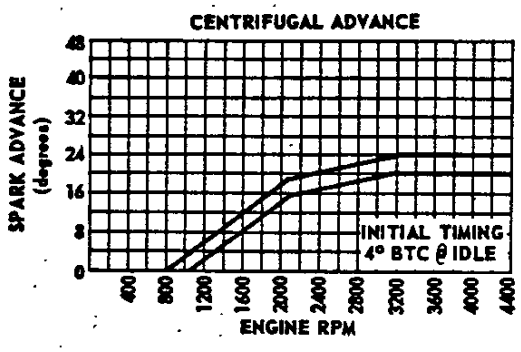


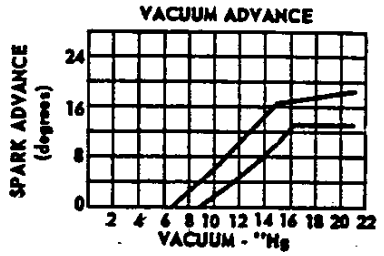
● 400 CUBIC INCH V-8 ENGINE





● 454 CUBIC INCH V-8 ENGINE





CLUTCHES

Engine	Type - Cubic Inch		L6-250	V8-350
	Availability		Standard	
Clutch for			3-Speed	
Type			Single dry disc	Single dry disc, semi-centrifugal
Clutch cover & pressure plate	Eff. plate load, lbs.		1650-1850	2100-2300
	Press. plate matl.		Cast Iron	Nodular Iron
	Clutch spring type		Diaphragm	Diaphragm bent finger design
	Clutch spring matl.		Heat treated spring steel	
Driven plate	Type		Single disc with two friction surfaces	
	Cushions		Flat spring steel between friction rings	
	Damper		6 outer coil and 3 inner coil springs equally spaced	10 Coil springs (5 sets of two)
	Friction ring	OD	9.12	10.34
		ID	6.12	6.50
		Total area Sq. in.	71.82	101.54
		Material	Woven asbestos	Premium grade woven asbestos
Flywheel & Ring gear	Flywheel	Material	Cast Iron	
	Ring gear	Material	Heat treated steel	
		No. of teeth	153	168
		PD	12.75	14.00
		Attachment	Shrink fit	
Bearings	Release	Type	Single row ball	
		Lubrication	None, prepacked	
	Pilot	Type	Bronze bushing	
		Lubrication	None, sintered and oil impregnated	
Controls	Clutch fork		Drop forged steel, pivot mounted on ball	
	Pedal mounting		Pendant, from brace on dash	
	Lubrication		Crossover shaft	
Clutch housing material			Aluminum alloy	

3-SPEED TRANSMISSION

Engine Application	Type		L6-250 Cu.In.	V8-350 Cu.In.
	Availability		Standard	
Case material			Cast iron	
Gear Shift	Type		Remote	
	Control		Lever	
	Location		Steering column	
Gears	Type		Helical	
	Material		Forged steel, hardened	
	Synchronization		All forward gears	
	Constant mesh gear		All gears	
	Sliding gears		*None*	
	Ratios	First	2.85	2.54
		Second	1.68	1.50
		Third	1.00	1.00
		Reverse	2.95	2.63
Lubricant	Type		Meeting Military Specifications MIL-L-2105B	
	Capacity (pts)		3	
Extension	Material		Cast iron	
	Oil seal		Steel encased double seal of spring loaded rubber or felt	

POWERGLIDE

Engine	Type		L-6 250 Cu.In.	V-8 350 Cu.In.
	Availability		Standard	
General data	Type		Automatic hydraulic torque converter with planetary gear system for low and reverse	
	Selector lever	Location	Steering column	
		Operation	Actuates manual valve in hydraulic control system	
		Quadrant pattern	P-R-N-D-L	
	Parking lock	Type	Pawl and gear (on planetary)	
		Operation	Applied by selector lever thru spring loaded linkage	
	Method of cooling		Water	
	Flywheel assembly		Steel stamping with welded on ring gear	
Hydraulic	Manual valve type		Spool	
	Pressure regulator valve type		Spool	
	Pressure @ Idle (a)	Drive	51	51
		Low	112	132
		Reverse	91	90
Converter assembly	Type		Three element	
	Pump		Inner and outer sheet steel shells separated by sheet steel vanes. Outer shell is pump housing which is welded to converter housing.	
	Turbine		Inner and outer shells separated by sheet steel vanes. Assembly supported in converter cover.	
	Stator		Operation independent of cover and pump housing. Aluminum air foil supported on a stationary sleeve by an over-running clutch of cam and roller design.	
	Stall torque ratio		2.10	
	Stall speed (RPM)		1620	1810
	Diameter (nominal)		11.0	11.75
Planetary gear set	Type		Compound planetary	
	Range	Drive	1.82 to 1.00	1.76 to 1.00
		Low	1.82	1.76
		Reverse	1.82	1.76
	Low band		Three linked circular segments	
	Low band servo		Piston with release spring and inner cushion spring	
Case	Material		Aluminum (one piece)	
Output shaft RPM and vehicle speed (MPH)	N/V factor		39.3	34.1
	Upshift	Closed throttle	758 (19)	777 (23)
		Throttle at detent	2105 (52)	2353 (69)
		Full throttle	2298 (59)	2750 (79)
	Downshift	Closed throttle	605 (15)	610 (18)
		Throttle at detent	1323 (34)	1390 (41)
		Full throttle	2015 (60)	2260 (66)
High clutch	Type		Multi-disc	
	Drive plates	Description	Waved steel with bonded organic facings	
		Number	3	4
	Driven plates	Description	Flat steel	
		Number	4	5
Reverse clutch	Type		Multi-disc	
	Drive plates	Description	Flat steel with bonded organic facings	
		Number	4	5
	Reaction plates	Description	Flat steel	
		Number	3	5
Torque multiplication	Maximum overall ratio		3.82	3.70
	Low and reverse		3.82 to 1.82	3.70 to 1.76
Lubricant	Type		A suffix A	
	Capacity (pts)	Dry	17	19
		Refill	6	6.5
Governor	Type		Centrifugal	
	Operation		Regulates pump oil pressure to automatic shift control valve	
	Drive		Mounted on output shaft	
	Location		In extension	
Oil pump	Type		Internal-external gear	
	Number		One; front	
	Function		To supply pressure	
	Drive		Converter pump	

(a) 450 RPM input @ 25 in. Hg. vacuum

TURBO-HYDRAMATIC

Engine	Displacement		L6-250	V8-350 & V8-400 (LF6)	V8-454
General Data	Type		Automatic hydraulic torque converter with compound planetary gear system - three forward speeds and reverse.		
	Selector lever	Location	Steering column		
		Operation	Actuates controls by a hydraulic system from pressurized gear type pump		
		Quadrant pattern	P-R-N-D-L2-L1		
	Parking Lock	Type	Locking pawl		
		Operation	Applied by selector lever through manual linkage		
	Method of cooling		Water		
	Flywheel assembly		Steel stamping with welded on ring gear		
	Oil pressure pump		Supplies hydraulic pressure from an engine driven gear type pump		
Hydraulic System	Type		Steel spool		
	Manual		Establishes range at transmission operation		
	Pressure regulator		Controls main line pressure		
	Shift (1-2)		Controls oil pressure for transmission shift from 1-2 or 2-1		
	Shift (2-3)		Controls oil pressure for transmission shift from 2-3 or 3-2		
	Modulator		Regulates line pressure with modulator oil pressure that varies with torque to transmission		
	Accumulator		To obtain greater flexibility in attaining desired shift curve for various engine requirements		
	Pressure @ Idle (a)	Drive	50	55	70
		L2	75	80	150
		L1	75	80	150
		Reverse	79	84	107.5
Converter Assembly	Pump (Drive member)		Multivane type, sheet metal blade spot welded to steel pump housing that is an integral part of the converter housing		
	Turbine (Driven member)		Steel axial flow blades assembled between inner & outer steel shells		
	Stator assembly		Aluminum multivane type blades mounted on a one way (overrunning) roller clutch		
	Stall ratio		2.10		
	Stall speed (RPM)		2110		
	Diameter (nominal)		11.75		12.20
Planetary Gear Set	Reaction carrier assembly		4 steel pinion gears		
	Output carrier assembly		4 steel pinion gears		
	Front band				Circular steel with organic lining
	Rear band				Double wrap circular steel
	Intermediate band		Circular steel with organic lining		
	Range	D (Drive)	2.52:1 - 1.52:1 - 1.00:1		2.48:1 - 1.48:1 - 1.00:1
		L2 (Low two)	2.52:1 - 1.52:1		2.48:1 - 1.48:1
		L1 (Low one)	2.52:1		2.48:1
		R (Reverse)	1.93:1		2.08:1
	Servo Unit		Piston with release spring and inner cushion spring		
Case	Material		Aluminum		
Clutches	Type		Four, multiple disk		Three, multiple disk
	Material	Drive plates	Steel with bonded organic facings		
		Driven plates	Flat steel		
	Forward clutch		4 each drive & driven plates		5 each drive & driven plates
	Direct clutch		4 each drive & driven plates		5 each drive & driven plates
	Intermediate clutch		2 each drive & driven plates		3 each drive & driven plates
	Low & Reverse clutch		4 each drive & driven plates		
	Release spring		Radial row steel coil		
Torque Multiplication	Drive (maximum)		5.29:1 to 1.00		5.21:1 to 1.00
	Low 2		5.29:1 to 1.52		5.21:1 to 1.48
	Low 1		5.29:1 to 2.52		5.21:1 to 2.48
	Reverse		4.05:1 to 1.93		4.37:1 to 2.08
Governor	Type		Cross-axis centrifugal		
	Operation		Regulates a pressure proportional to car speed which acts upon the (1-2) (2-3) shift and modulator valves		
Lubricant	Type		A suffix A		
	Capacity (pints)	Dry	20		22
		Refill	5		8

(a) 450 RPM input @ 25 in. Hg. vacuum

AMA–40A
1970

AMA Specifications—Passenger Car

The information contained herein is prepared, distributed by, and is solely the responsibility of the automobile manufacturing company to whose products it relates. Questions concerning these specifications should be directed to the manufacturer whose address is shown below. This uniform specification form was developed by the automobile manufacturing companies under the auspices of the Automobile Manufacturers Association.

MANUFACTURER Chevrolet Motor Division General Motors Corporation	CAR NAME CHEVROLET		
[redacted]	MODEL YEAR 1970	ISSUED: 9-69	
		REVISED (e) 2-70	

NOTES:
1. The General Specifications herein are those in effect at date of compilation and are subject to change without notice by the manufacturer.
2. UNLESS OTHERWISE INDICATED:
   a. Specifications apply to standard models without optional equipment. Significant deviations are noted.
   b. Nominal design dimensions are used throughout these specifications.

TABLE OF CONTENTS

BODY – TYPES AND STYLE NAMES –

Body type, style names; use manufacturer's code for series & body style.

	L-6 Engine	V-8 Engine
BISCAYNE		
4-door Sedan, 6-Passenger	15369	15469
BEL AIR		
4-door Sedan, 6-Passenger	15569	15669
IMPALA		
2-door Sport Coupe, 5-Passenger	16337	16437
4-door Sport Sedan, 6-Passenger	-----	16439
2-door Custom Coupe, 5-Passenger	-----	16447
2-door Convertible, 5-Passenger	-----	16467
4-door Sedan, 6-Passenger	16369	16469
CAPRICE		
4-door Sedan, 6-Passenger	-----	16639
● 2-door Custom Coupe, 5-Passenger	-----	16647
STATION WAGONS		
Brookwood 4-door, 2-seat	-----	15436
Townsman 4-door, 2-seat	-----	15636
Townsman 4-door, 3-seat	-----	15646
Kingswood 4-door, 2-seat	-----	16436
Kingswood 4-door, 3-seat	-----	16446
Kingswood Estate 4-door, 2-seat	-----	16636
Kingswood Estate 4-door, 3-seat	-----	16646

AMA Specifications—Passenger Car

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (e)

POWER TEAMS

(Indicate whether standard or optional)

MODEL AVAILABILITY	ENGINE					TRANSMISSION	AXLE RATIO ** (Std. first) (Indicate A/C ratio)	
	Displ. cu. in.	Carburetor	Compr. Ratio	BHP RPM	Torque RPM		Standard	A/C
15369 15569 16337 16369	Turbo-Thrift 250 L-6 (Base)	One; 1-bbl.	8.5:1	155 @ 4200	235 @ 1600	3-spd. manual 2.85:1 (low)		Not Available
						2-spd. automatic*	3.08	
						3-spd. automatic*	2.73	
All Models except Station Wags	Turbo-Fire 350 V8 (Base)	One; 2-bbl.	9.00:1	250 @ 4800	345 @ 2800	3-spd. manual (2.54:1 low)	3.08	3.08
						2-spd. automatic*	2.73	2.73
Station Wagons						3-spd. manual (2.54:1 low) 2-spd.automatic*	3.36	3.36
All Models						3-spd.automatic*	2.56	2.56
All Models except Station Wags.	Turbo-Fire 350 V8 (L48)*	One; 4-bbl.	10.25:1	300 @ 4800	380 @ 3200	2-spd.automatic*	3.08	3.08
Station Wagons						2-spd.automatic*	3.07	3.07
All Models						3-spd.automatic*	2.73	2.73
All Models	Turbo-Fire 400 V8 (LF6)*	One; 2-bbl.	9.00:1	265 @ 4400	400 @ 2400	3-spd. automatic*	2.56	2.56
All Models	Turbo-Jet 454 V8 (LS4)*	One; 4-bbl.	10.25:1	345 @ 4400	500 @ 3000	3-spd.automatic*	2.56	2.56
All Models	Turbo-Jet 454 V8 (LS5)*	One; 4-bbl.	10.25:1	390 @ 4800	500 @ 3400	3-spd.automatic*	2.73	2.73

* - Optional
** - Positraction available optionally for all ratios

AMA Specifications—Passenger Car

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (•)

MODEL	Turbo-Thrift 250 L-6 155 HP	Turbo-Fire 350 V-8 250 HP	Turbo - Fire 350 V-8 300 HP

ENGINE – GENERAL

Type, no. cyls., valve arr.		In-line 6 OHV	90° V-8 OHV	
Bore and stroke (nominal)		3.875 x 3.53	4.00 x 3.48	
Piston displacement, cu. in.		250	350	
Bore spacing (℄ to ℄)		4.40		
No. system (front to rear)	L. Bank	1-2-3-4-5-6	1-3-5-7	
	R. Bank	In-line	2-4-6-8	
Firing order		1-5-3-6-2-4	1-8-4-3-6-5-7-2	
Compres. ratio (nominal)		8.50:1	9.00:1	10.25:1
Cylinder Head Material		Cast Alloy iron		
Cylinder Block Material		Cast Alloy Iron		
Cyl. Sleeve-Wet, dry, none		None		
Number of mtg. points	Front	Two		
	Rear	One		
Engine installation angle		3°54'		
Taxable horsepower $\frac{Dia^2 \times No.\ Cyl.}{2.5}$		36.0	51.2	
Publishing max. bhp* @ eng. RPM		155 @ 4200	250 @ 4800	300 @ 4800
Publishing max. torque * (lb. ft. @ RPM)		235 @ 1600	345 @ 2800	380 @ 3200
Recommended fuel regular – premium		Regular		Premium

ENGINE – PISTONS

Material			Cast Aluminum Alloy	
Description and finish			Flat notched head, slipper skirt	
Weight (piston only) oz.			20.24	25.76
Clearance (limits)	Top land		.0245 - .0335	.0235 - .0325
	Skirt	Top	.0005 - .0011 (a)	.0007 - .0013 (b)
		Bottom		
Ring groove depth	No. 1 ring		.2153 - .2218	.2218 - .2284
	No. 2 ring		.2153 - .2218	.2218 - .2284
	No. 3 ring		.2093 - .2158	.2038 - .2103
	No. 4 ring			

* Max. bhp (brake horsepower) and max. torque corrected to 60° F and 29.92 in. Hg atmospheric pressure.

(a) Measured 2.44 from top of piston

(b) Measured 1.560 from top of piston

AMA Specifications—Passenger Car

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (e) 2-7

MODEL	Turbo-Fire 400 V-8 265 HP	● Turbo-Jet 454 V-8 345 HP	V-8 390 HP

ENGINE – GENERAL

Type, no. cyls., valve arr.		90° V-8 OHV		
Bore and stroke (nominal)		4.125 x 3.75	4.251 x 4.00	
Piston displacement, cu. in.		400	454	
Bore spacing (℄ to ℄)		4.40	4.84	
No. system (front to rear)	L. Bank	1-3-5-7		
	R. Bank	2-4-6-8		
Firing order		1-8-4-3-6-5-7-2		
Compres. ratio (nominal)		9.0:1	10.25:1	
Cylinder Head Material		Cast alloy iron		
Cylinder Block Material		Cast alloy iron		
Cyl. Sleeve-Wet,dry,none		None		
Number of mtg. points	Front	Two		
	Rear	–	One	–
Engine installation angle			3° 54"	
Taxable horsepower $\frac{Dia^2 \times No.\ Cyl.}{2.5}$		54.4	57.8	
Publishing max. bhp* @ eng. RPM		265 @ 4400	345 @ 4400	390 @ 4800
Publishing max. torque * (lb. ft. @ RPM)		400 @ 2400	500 @ 3000	500 @ 3400
Recommended fuel regular – premium		Regular	Premium	

ENGINE – PISTONS

Material			Cast aluminum alloy	
Description and finish			Sump head, slipper skirt	Domed head, slipper skirt
Weight (piston only) oz.			22.59	25.12
Clearance (limits)	Top land		.0365 - .0455	.0306 - .0374
	Skirt	Top	.0014 - .0020 (a)	.0020 - .0028 (b)
		Bottom	–	
Ring groove depth	No. 1 ring		.2328 - .2393	.2348 - .2412
	No. 2 ring		.2328 - .2393	.2348 - .2412
	No. 3 ring		.2183 - .2248	.2183 - .2247
	No. 4 ring			

* Max. bhp (brake horsepower) and max. torque corrected to 60° F and 29.92 in. Hg atmospheric pressure.

(a) Measured 1.56 from top of piston

(b) Measured 1.74 from top of piston

AMA Specifications—Passenger Car

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (e) 2-70

MODEL	L6-250 155 HP	V8-350 250 HP	V8-350 300 HP	V8-400 265 HP	V8-454 345 HP	V8-454 390 HP
ENGINE – RINGS						
Function (top to bottom) – No. 1, oil or comp.	Compression					
Function (top to bottom) – No. 2, oil or comp.	Compression					
Function (top to bottom) – No. 3, oil or comp.	Oil					
Function (top to bottom) – No. 4, oil or comp.	None					
Compression – Description - material, coating, etc. – Upper	Cast alloy iron; barrel face (a)					
Compression – Description - material, coating, etc. – Lower	Cast alloy iron; inside bevel; tapered face (b)					
Compression – Width	(c)	(d)		.0770-.0780	.0770-.0775	
Compression – Gap	.010-.020	(e)		.010 - .020		
Oil – Description - material, coating, etc.	Multi-piece (2 rails and 1 spacer expander) Rails - steel, chrome plated OD; Expander - stainless steel					
Oil – Width	.1870 -.1890 (assembled)					
Oil – Gap	.015 -.055					
Expanders	In oil ring assembly					
ENGINE – PISTON PINS						
Material	Chromium steel					
Length	2.990 - 3.010				2.930 - 2.950	
Diameter	.9270 - .9273				.9895 - .9898	
Type – Locked in rod, in piston, floating, etc.	Locked in rod					
Type – Bushing – In rod or piston	None					
Type – Bushing – Material	- - - -					
Clearance – In piston	.00015 - .00025				.00030 - .00040	
Clearance – In rod						
Direction & amount offset in piston	Major thrust side .060					
ENGINE – CONNECTING RODS						
Material	Drop Forged Steel					
Weight (oz.)	12.50	20.80			27.84	
Length (center to center) ●	5.695 - 5.705			5.56 - 5.57	6.130 - 6.140	
Bearing – Material & Type	Copper lead alloy-steel bkd.	Premium aluminum				
Bearing – Overall length	.807	.797			.847	
Bearing – Clearance (limits)	.0007-.0027	.0013-.0035			.0009-.0025	
Bearing – End play	.009 - .014	.008 - .014			.015 - .023	

(a) Chrome plate on L-6 250 & V8-350; Molybdenum inlay on V8-400 & 454
(b) Wear resistant coating on L6-250, V8-350 & 400; Chrome plating on V8-454
(c) Upper .0628 - .0633; lower..0623 - .0633
(d) Upper .0775 - .0780; lower .0770 - .0775
(e) Upper .010 - .020; lower .013 - .025

AMA Specifications—Passenger Car

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (•)

ENGINE – CRANKSHAFT

MODEL			L6-250 155 HP	V8-350 250 HP	V8-350 300 HP	V8-400 265 HP	V8-454 345 HP	V8-454 390 H
Material			Cast nodular iron				Forged steel	
Vibration damper type			Rubber mounted inertia					
End thrust taken by bearing (No.)			7	5				
Crankshaft end play			.002 - .006				.006 - .010	
Main bearing	Material & type		Steel backed insert; copper lead alloy or premium aluminum lini selected for specific application					
	Clearance		.003-.0029	(a)			(b)	
	Journal dia. and bearing overall length	No. 1	2.3004x.752	2.4502x.752		2.6503x.752	2.7503 x .992	
		No. 2	2.3004x.752	2.4505x.752		2.6506x.752	2.7505 x .992	
		No. 3	2.3004x.752	2.4504x.752		2.6506x.752	2.7505 x .992	
		No. 4	2.3004x.752	2.4505x.752		2.6506x.752	2.7505 x .992	
		No. 5	2.3004x.752	2.4508x1.177		2.6509x1.177	2.7510 x 1.2525	
		No. 6	2.3004x.760	None				
		No. 7	2.3004x.760	None				
	Dir. & amt. cyl. offset			None				
Crankpin journal diameter			1.999-2.000	2.099 - 2.100			2.199 - 2.200	

ENGINE – CAMSHAFT

Location		(c)	In block above crankshaft		
Material		Cast alloy iron			
Bearings	Material	Steel backed babbitt			
	Number	4	5		
Type of Drive	Gear or chain	Gear	Chain		
	Crankshaft gear or sprocket material	Steel	Steel Sprocket		
	Camshaft gear or sprocket material	(d)	Nylon teeth with aluminum hub		
	Timing chain — No. of links	None	46	50	
	Timing chain — Width	None	.740	.740	
	Timing chain — Pitch	None	.500	.500	

ENGINE – VALVE SYSTEM

Hydraulic lifters (Std., opt., NA)	Standard			
Valve rotator, type (intake, exhaust)	None			
Rocker ratio	1.75:1	1.50:1	1.70:1	
Operating tappet clearance (indicate hot or cold) — Intake	Zero			
Operating tappet clearance (indicate hot or cold) — Exhaust	Zero			

(Continued)

(a) No. 1 - .0008-.0020
No. 2, 3, & 4 - .0011-.0023
No. 5 - .0017-.0033

(b) No. 1 - .0007-.0019
No. 2, 3, & 4 - .0013-.0025
No. 5 - .0019-.0035

(c) Above and to right of crankshaft

(d) Bakelite and fabric composition with steel hub

AMA Specifications—Passenger Car

AKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (a) 2-70

ODEL	L6-250 155 HP	V8-350 250 HP	V8-350 300 HP	V8-400 265 HP	V8-454 345 HP	V8-454 390 HP

NGINE – VALVE SYSTEM (cont.)

iming based on op of amp oints)	Intake	Opens (°BTC)	16°	28°		30°	56°
		Closes (°ABC)	48°	72°		70°	114°
		Duration - deg.	244°	280°		280°	350°
	Exhaust	Opens (°BBC)	46° 30'	78°		77°	110°
		Closes (°ATC)	17° 30'	30°		61°	62°
		Duration - deg.	244°	288°		318°	352°
	Valve opening overlap		33° 30'	58°		91°	118°
Intake	Material		Alloy steel; aluminized face all engines except V8-350				
	Overall length		4.902-4.922	4.870-4.889		5.215-5.235	
	Actual overall head dia.		1.715-1.725	1.935 - 1.945		2.060 - 2.070	
	Angle of seat & face		46° (Seat); 45° (face)				
	Seat insert material		None				
	Stem diameter		.3410 - .3417			.3715 - .3722	
	Stem to guide clearance		.0010 - .0027				
	Lift (@ zero lash)		.3880	.3900		.3983	.4614
	Outer spring press. & length	Valve closed (lb. @ in.)	56-64 @ 1.66	76 - 84 @ 1.70		69-81 @ 1.88	
		Valve open (lb. @ in.)	180-192 @ 1.27	194-206 @ 1.25		228-252 @ 1.38	
	Inner spring press. & length	Valve closed (lb. @ in.)	None	Spring damper		26-34 @ 1.78	
		Valve open (lb. @ in.)	None	Spring damper		81-99 @ 1.28	
Exhaust	Material		High alloy steel; aluminized face (a)				
	Overall length		4.913 - 4.933			5.345 -5.365	
	Actual overall head dia.		1.495 - 1.505			1.715 - 1.725	
	Angle of seat & face		46° (seat) 45° (face)				
	Seat insert material		None				
	Stem diameter		.3410 - .3417			.3713 - .3720	
	Stem to guide clearance		.0010 - .0027				
	Lift (@ zero lash)		.3880	.4100		.4300	.4800
	Outer spring press. & length	Valve closed (lb. @ in.)	56-64 @ 1.66	76-84 @ 1.70		69-81 @ 1.88	
		Valve open (lb. @ in.)	180-192 @ 1.27	194-206 @ 1.25		228-252 @ 1.38	
	Inner spring press. & length	Valve closed (lb. @ in.)	None	Spring damper		26-34 @ 1.78	
		Valve open (lb. @ in.)	None	Spring damper		81-99 @ 1.28	

NGINE – LUBRICATION SYSTEM

Type of lubrication (splash, pressure, nozzle)	Main bearings	Pressure	
	Connecting rods	Pressure	
	Piston pins	Splash	
	Camshaft bearings	Pressure	
	Tappets	Pressure	
	Timing gear or chain	Nozzle	Centrifugally oiled from camshaft bearing
	Cylinder walls	Splash	Pressure jet cross sprayed

(Continued)

a) Head also aluminized on V8-454

AMA Specifications—Passenger Car

Page 8

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (e)

MODEL	L6-250 155 HP	V8-350 250 & 300 HP	V8-400 265 HP	V8-454 345 HP	V8-454 390 HP

ENGINE – LUBRICATION SYSTEM (cont.)

Oil pump type	Gear
Normal oil pressure (lb. engine rpm)	40 PSI @ 2000 rpm
Oil press. sending unit (elect. or mech.)	Electric
Type oil intake (floating, stationary)	Stationary
Oil filter system (full flow, part., other)	Full Flow
Filter replacement (element, complete)	Complete
Capacity of c case, less filter-refill (qt.)	4
Oil grade recommended (SAE viscosity and temperature range)	20° and above-20W, 10W-30, 10W-40, 20W-40 0° to 60°F-10W, 5W-30, 10W-40 Below 20°F-5W, 5W-20, 5W-30
Engine Service Reqmt. (MM, MS, etc.)	MS or DG

ENGINE – EXHAUST SYSTEM

Type (single, single with cross-over, dual, other)		Single	Single with crossover		Dual
Muffler No. & type (reverse flow, straight thru, separate resonator)		One, reverse flow			2 mufflers & 2 resonators
Exhaust pipe dia. (O.D., wall thick.)	Branch	None	2.00x.109 (a)	2.00x.082 (a)	2.00x.069 (b)
	Main	2.00x.064	2.50x.082 (a)	2.50x.082 (a)	2.50x.082
Tail pipe dia. (O.D. & wall thickness)		1.875x.069			2.00x.069

ENGINE – CRANKCASE VENTILATION SYSTEM

Type (ventilates to atmos., induction system, other)	Standard	Ventilates to induction system	
	Optional	None	
Control Unit	Make and model	AC Spark Plug	
	Location	Rocker cover - Top rear L-6; Left front V-8	
	Energy source (manifold vacuum, carburetor air stream, other)	Manifold vacuum	
	Control method (variable orifice, fixed orifice, other)	Variable orifice	
Complete system	Discharges (to intake manifold, carb. air intake, air cleaner intake, other)	Intake manifold	
	Air inlet (breather cap, carburetor air cleaner, other)	Carburetor air cleaner	
	Flame arrestor (screen, check valve, other)	Screen	

(a) Laminated

(b) Pipe - Muffler to resonator

AMA Specifications—Passenger Car

Page 9 A

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (a)

MODEL	L6-250 155 HP	V8-350 250 HP

ENGINE – EXHAUST EMISSION CONTROL

MANUAL TRANSMISSIONS

Type (Air injection, engine modifications, other)			Engine Modifications	
Air Injection Pump	Type		NOT APPLICABLE	
	Displacement			
	Drive ratio			
	Drive type			
	Relief valve (type)			
	Filter (describe)			
Air Injection System	Air distribution (head, manifold, etc.)			
	Point of entry			
	Injection tube I.D.			
	Check valve type			
	Backfire protection (type)			
Carburetor	Make		REFER TO PAGE 10A	
	Model			
	Barrel size			
	Idle speed	Drive		
		Neutral		
	Idle A/F mixture			
Distributor	Aux. Adv. Systems (type)		Transmission controlled vacuum spark advance	
	Make		Delco - Remy	
	Model		1110463	1112001
	Cent'fgal adv. in crank degrees @ eng. rpm	Start (rpm)	900	1000
		Intermed. points deg. @ rpm	11.5 @ 1300	15 @ 1800
		Max. deg. @ rpm	32 @ 4200	36 @ 4100
	Vacuum adv. in crank degrees @ eng. rpm	Start (in Hg)	7.00	7.00
		Intermed. points deg. @ in. Hg	None	
		Max. deg. @ in.	23 @ 16	24 @ 17.5
	Vacuum Source		Carburetor	
Timing - Crank degrees @ rpm			TDC @ 750	TDC @ 750
Cooling System			- - - - - - - -	
Exhaust System			- - - - - - - -	

AMA Specifications—Passenger Car

Page 9 B

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (•)

MODEL	L6-250 155 HP	V8-350 250 HP	V8-350 300 HP	V8-400 265 HP	V8-454 345 HP	V8-454 390 HP
ENGINE – EXHAUST EMISSION CONTROL	AUTOMATIC TRANSMISSIONS					
Type (Air injection, engine modifications, other)	Engine Modifications					
Air Injection Pump – Type	NOT APPLICABLE					
Air Injection Pump – Displacement						
Air Injection Pump – Drive ratio						
Air Injection Pump – Drive type						
Air Injection Pump – Relief valve (type)						
Air Injection Pump – Filter (describe)						
Air Injection System – Air distribution (head, manifold, etc.)						
Air Injection System – Point of entry						
Air Injection System – Injection tube I.D.						
Air Injection System – Check valve type						
Air Injection System – Backfire protection (type)						
Carburetor – Make	REFER TO PAGE MA					
Carburetor – Model						
Carburetor – Barrel size						
Carburetor – Idle speed – Drive						
Carburetor – Idle speed – Neutral						
Carburetor – Idle A/F mixture						
Distributor – Aux. Adv. Systems (type)	Transmission controlled vacuum spark advance					
Distributor – Make	Delco-Remy					
Distributor – Model	1110464	1112002	1111997	1111494	1111436	1111963
Distributor – Cent'fgal adv. in crank degrees @ eng. rpm – Start (rpm)	900	1100	950	1083	1085	1085
Distributor – Cent'fgal adv. in crank degrees @ eng. rpm – Intermed. points deg. @ rpm	17@1950	8 @ 1400	20 @ 1800	12@2000	17@2100	17 @ 2100
Distributor – Cent'fgal adv. in crank degrees @ eng. rpm – Max. deg. @ rpm	28@4200	32@4400	30 @ 4700	28@4000	26@4000	24 @ 3200
Distributor – Vacuum adv. in crank degrees @ eng. rpm – Start (in Hg)	7.00	7.00	8.00	8.00		
Distributor – Vacuum adv. in crank degrees @ eng. rpm – Intermed. points deg. @ in.-Hg		None				
Distributor – Vacuum adv. in crank degrees @ eng. rpm – Max. deg. @ in.	23 @ 16	24 @ 17.5	20 @ 17	15 @ 15.5		
Distributor – Vacuum Source	Carburetor					
Timing - Crank degrees @ rpm	4 BTDC @ 600			-**-	6 BTDC @ 600	
Cooling System (describe changes)	- - - - - - - - - -					
Exhaust System (describe changes)	- - - - - - - - - -					

**8° BTDC @ 600

AMA Specifications—Passenger Car

Page 10 A

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (•)

MODEL	L6-250	V8-350		V8-400	V8-454	
	155 HP	250 HP	300 HP	265 HP	345 HP	390 HP

ENGINE – FUEL SYSTEM

(See supplemental page for Details of Fuel Injection, Supercharger, etc. if used)

Induction type: Carburetor, fuel injection, supercharger.			Carburetor			
Fuel Tank	Refill capacity (U.S. gals.)		Approximately 25 ; Station Wagons 22			
	Filler location		Behind hinged rear license plate*			
Fuel Pump	Type (elec. or mech.)		Mechanical			
	Locations		Lower right front of engine			
	Pressure range **		4.00-5.00 PSI	7.50 - 9.00 PSI		
Vacuum booster (std., optional, none)			None			
Fuel Filter	Type		Fine mesh plastic strainer in gasoline tank			
	Locations		and paper filter in carburetor inlet			
Carburetor	Choke type		Automatic			
	Intake manifold heat control (exhaust or water)		Exhaust			
	Air cleaner type	Standard	Thermostatically controlled; Oil wetted paper element			
		Optional				
	Idle speed (spec. neutral or drive)	Manual (n)	750	-------		
		Automatic (d)	600			
		Idle A/F mix.	Not specified			

CARBURETOR SUPPLEMENTARY INFORMATION

Model Usage	Engine Displ.	Transmission	Carburetors		No. Used and Type	Barrel Size
			Make	Model		
15369-15569 16337-16369	250	Manual	Rochester	7040017	One; 1-bbl	1.69
		Automatic		7040014		
ALL MODELS	350 250hp	Manual	Rochester	7040113(a)	One; 2-bbl	1.69
		Automatic		7040114(b)		
	350 300hp	Automatic	Rochester	7040202	One; 4-bbl	1.38 Prim. 2.25 Sec.
	400 265hp	Automatic	Rochester	7040118 (c)	One; 2-bbl	1.69
	454 345hp	Automatic	Rochester	7040200	One; 4-bbl	1.38 Prim. 2.25 Sec.
	454 390hp	Automatic	Rochester	7040200	One; 4-bbl	1.38 Prim. 2.25 Sec.

(a) - 7040115 with Air Conditioning
(b) - 7040116 with Air Conditioning
(c) - 7040120 with Air Conditioning

* - Left Quarter Panel on Station Wagons
** - Shut off pressure - 1800 rpm at pump outlet

Page 10B

AMA Specifications—Passenger Car

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (•)

MODEL Evaporation Emission Control System (California vehicles)

Fuel Tank Capacity - 23 Gals. (approximately); Station Wagons 20 gals. (approximately)

Components:

Fill Limiter - Shaped metal pan welded inside of gas tank to reserve space for norma gasoline expansion and contraction.

Canister - Canister of activated carbon stores vapors vented from gas tank until removed and burned in the engine.

Liquid Separator - Connected in vent lines to canister. Separates and returns liquid fuel to the tank.

Constant flow purge line - (canister to manifold) Incorporates an orifice to regulate flow to manifold und all engine operating conditions, including idle.

Variable Flow Purge Line - (canister to air cleaner) (snorkel) Becomes functional above engine idle speeds to more completely purge the canister

Aluminum Heat Dissipator - Positioned between insulation blocks and intake manifol Provides optimum heat transfer to surrounding atmosphere.

Carburetor Model No.'s

	L6-250	V8-350 250 HP	V8-350 300 HP	V8-400 265 HP	V8-454
Manual	Same	7040413	-------	-------	-------
Manual with A/C	as	7040415	-------	-------	-------
Automatic		7040414	7040502	7040500	7040500
Automatic with A/C	Base	7040416	7040502	7040500	7040500

AMA Specifications—Passenger Car

AKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (e) 2-70

ODEL

	L6-250 155 HP	V8-350 250 HP	V8-350 300 HP	V8-400 265 HP	V8-454 345 HP	V8-454 390 HP
GINE – COOLING SYSTEM						
pe system (pressure, pressure vented, nospheric, other)	Pressure					
diator cap relief valve pressure	15± 1 PSI					
culation — Type (choke, bypass)	Choke					
ermostat — Starts to open at (°F)	192° - 198°					
ter mp — Type (centrifugal, other)	Centrifugal					
ter mp — GPM @ 1000 pump rpm	26 @ 2000	23 @ 2000		24@2000	25 @ 2000	
ter mp — Number of pumps	One					
ter mp — Drive (V-belt, other)	V-belt					
ter mp — Bearing type	Permanently lubricated double row ball					
-pass recirculation type (inter., ext.)	Internal				External	
diator core type llular, tube and fin, other)	Tube and center					
oling stem pacity — With heater (qt.)	12	16		16	22	
oling stem pacity — Without heater (qt.)	11	15		15	21	
oling stem pacity — Opt. equipment-specify (qt.)	12	16		17	22	
ter jackets full length of cyl. (yes, no)	Yes					
ter all around cylinder (yes, no)	Yes		No		Yes	
diator se — Lower — Number and type (molded, straight)	One, molded					
diator se — Lower — Inside diameter	1.75					
diator se — Upper — Number and type (molded, straight)	One, molded					
diator se — Upper — Inside diameter	1.50					
diator se — By-pass — Number and type (molded, straight)	None				One, molded	
diator se — By-pass — Inside diameter	None				.725-.765	
n — Number of blades & spacing	4-staggered					
n — Diameter	17.62				18.00	
n — Ratio-fan to crankshaft rev. ●	1.165:1	.949:1				
n — Fan cutout type	None					
n — Bearing type	Double row ball					
rive ts dicate t used letter) — Fan	A	B				
rive ts dicate t used letter) — Generator or alternator	A	B				
rive ts dicate t used letter) — Water Pump	A	B				
rive ts dicate t used letter) — Power Steering	C	D			E	
rive ts dicate t used letter) — Air Conditioning	--	F			G	

Drive Belt Dimensions	A	B	C	D	E	F	G	H	I	J	K
Angle of V	←		38°	42°			→				
Nominal length (SAE)	37.30	44.25	49.50	36.00	41.00	54.33	57.50				
Width	←		.380				→				

AMA Specifications—Passenger Car

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (•) 2-70

MODEL	L6-250 155 HP	V8-350 250 HP	V8-350 300 HP	V8-400 265 HP	V8-454 345 HP	V8-454 390 HP

ELECTRICAL – SUPPLY SYSTEM

Battery ●	Make and Model		Delco-Remy 1980032	1980030		1980126
	Voltage Rtg. & Total Plates		12 volts-54 plates	12 volts-66 plates		12 volts - 90 pla
	SAE Designation & Amp. Hr. Rtg.		45 amp hr @ 20 hr rate	61 amp hr @ 20 hr		80 amp hr @ 20 hr
	Location		Right side of engine compartment			
	Terminal grounded		Negative			
Generator or Alternator	Make		Delco - Remy			
	Model		1100834			
	Type and rating		Diode rectified 37 amps			
	Output at engine idle (neutral)		13 amps			
	Ratio–Gen. to Cr/s rev. ●		2.53:1			
Regulator	Make		Delco-Remy			
	Model		1119515			
	Type		Vibrator			
	Cutout relay	Closing voltage & generator rpm	None			
		Reverse current to open	None			
	Regulated	Voltage	13.8 - 14.8 @ 85°F			
		Current	----			
	Voltage test conditions	Temperature	Operating			
		Load	3-8 amperes			
		Other	None			

ELECTRICAL – STARTING SYSTEM

Starting Motor	Make		Delco-Remy			
	Model		1108365	1108338(a)	1108427	1108430
	Rotation (drive end view)		Clockwise			
Motor control	Switch (solenoid, manual)		Solenoid			
	Starting procedure		Manual - Place gearshift lever in neutral and depress clut Automatic - Place gearshift lever in N or P position Initial Start - Press accelerator to floor & release. Turn ignition to Start, release as soon as engine starts.			
Motor Drive	Engagement type		Positive shift solenoid			
	Pinion meshes (front, rear)		Rear			
	Number of teeth	Pinion	9			9
		Flywheel – Manual	153			- - -
		Flywheel – Auto.	153			168
	Flywheel tooth face width	Manual	.4010 - .4130			- - - -
		Auto.	.4010 - .4130			.4100-.4220

(a) 1108427 with automatic transmission

AMA Specifications—Passenger Car

Page 13

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (a)

MODEL			L6-250 155HP	V8-350 250 HP	V8-350 300 HP	V8-400 265 HP	V8-454 345 HP	V8-454 390 HP
ELECTRICAL – IGNITION SYSTEM								
Type	Conventional – Std., Opt., N.A.		Standard					
	Transistorized – Std., Opt., N.A.		Not available					
	Other (specify)		None					
Coil	Make		Delco - Remy					
	Model		1115208	1115293				
	Amps	Engine stopped	4.0					
		Engine idling	1.8					
Distributor	Make							
	Model							
	Cent'fgal adv. in c/shaft degrees @ engine rpm (nominal)	Start (rpm)						
		Intermediate points deg. @ rpm	REFER TO PAGE NINE					
		Max. deg. @ rpm						
	Vacuum adv. in c/shaft degrees @ in. Hg. (nominal)	Start (in. Hg.)						
		Intermediate points, deg. @ in. Hg.						
		Max. deg. in. Hg.						
	Breaker gap (in.)		.019					
	Cam angle (deg.)		31-34	29-31			28-30	
	Breaker arm tension (oz.)		19-23				28-32	
Timing	Crankshaft deg. @ rpm		Refer to page nine					
	Mark location		Torsional damper					
Spark Plug	Make		AC Spark Plug					
	Model		AC R46T	AC R44		AC R44T	AC R43T	
	Thread (mm)		14					
	Tightening torque (lb. ft.)		25					
	Gap		.033 - .038					
Cable	Conductor type		Linen core impregnated with electrical conducting material					
	Insulation type		Rubber with neoprene jacket					
	Spark plug protector		Neoprene					

ELECTRICAL – SUPPRESSION

Locations & type	Non - Metallic high ignition cables

AMA Specifications—Passenger Car

Page 14

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (•)

MODEL

ELECTRICAL – INSTRUMENTS AND EQUIPMENT

Speed-ometer	Type	In-line with pointer
	Trip odometer (yes,no)	No
Charge indicator – type		Tell-tale
Temperature indicator – type		Tell-tale
Oil pressure indicator – type		Tell-tale
Fuel indicator – type		Electric gauge
Other		Refer to page 23
Wind-shield wiper	Type – Standard	Electric, two - speed
	Type – Optional	Electric, two-speed
Wind-shield washer	Type – Standard	Push-button
	Type – Optional	Push-button
Horn	Type	Vibrator
	Number used	Two
	Amp draw (each)	4.5 - 6.5 @ 12.5V(low note);4.2-6.2@ 12.5 V (High note)

DRIVE UNITS – CLUTCH (Manual Transmission)

		L6-250 155 HP	V8-350 250 HP
Make & type		Chevrolet, single dry disc	
Type pressure plate springs		Diaphragm	
Total spring load (lb.)		1650-1850	2100 - 2300
No. of clutch driven discs		One	
Clutch facing	Material	Woven type asbestos	
	Outside & inside dia.	9.12 x 6.12	10.34 x 6.50
	Total eff. area (sq.in.)	71.82	101.54
	Thickness	.135	
	Engagement cushioning method	Flat spring steel between facings	
Release bearing	Type & method of lubrication	Single row ball, packed and sealed	
Torsional damping	Methods: springs, friction material	Coil springs	

AMA Specifications—Passenger Car

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (e)

MODEL

DRIVE UNITS – TRANSMISSIONS

Manual 3-speed (std. or opt.)	Standard - L6-250 & V8-350 (250 HP) Not available other engines
Manual 4-speed (std. or opt.)	Not available
Manual with overdrive (std. or opt.)	Not available
Automatic (std. or opt.)	Optional

DRIVE UNITS – MANUAL TRANS.

			L6-250 cu. in.	V8-350 (250 hp)
Number of forward speeds			3	3
Transmission ratios	In first		2.85	2.54
	In second		1.68	1.50
	In third		1.00	1.00
	In fourth		---	---
	In reverse		2.95	2.63
Synchronous meshing, specify gears			All forward gears	
Shift lever location			Steering column	
Lubricant	Capacity (pt.)		3	
	Type recommended		Meeting Military Specs. MIL - L - 2105B	
	SAE viscosity number	Summer	SAE 80	
		Winter	SAE 80	
		Extreme cold	SAE 80	

DRIVE UNITS – MANUAL TRANS. W/OVERDRIVE

(For transmission data see manual transmission section)

Type (planetary or other)			
Manual lockout (yes, no)			
Downshift accelerator control (yes, no)			
Minimum cut-in speed			
Gear ratio			NOT AVAILABLE
Lubricant	Capacity (pt.) (Overdrive only)		
	Separate filler (yes, no)		
	Type recommended		
	SAE viscosity number	Summer	
		Winter	
		Extreme cold	

AMA Specifications—Passenger Car

Page 16

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (•)

MODEL	2-Speed Automatic L6-250	2-Speed Automatic V8-350	3-Speed Automatic L6-250 V8-350 & 400	3-Speed Automatic V8-400 & 454

DRIVE UNITS – AUTOMATIC TRANSMISSION

Trade name		Powerglide		Turbo Hydra-Matic	
Type describe		Torque Converter with planetary gears			
Selector location		Lever, steering column			
List gear ratios Selector Pattern and indicate which are used in each selector position		P-park R-1.82 N-neutral D-1.82-1.00 L-1.82	P-park R-1.76 N-neutral D-1.76-1.00 L-1.76	P-park R-1.93 N-neutral D-2.52-1.52-1.00 L_2-2.52-1.52 L_1-2.52	P-park R-2.08 N-neutral D-2.48-1.48-1.00 L_2-2.48-1.48 L_1-2.48
Max. upshift speed–drive range		59	79	**	
Max. kickdown speed–drive range		60	66	**	
Torque convertor	Number of elements	3			
	Max. ratio at stall	2.10			
	Type of cooling (air, liquid)	Water			
	Nominal diameter	11.75		11.75	12.20
Lubricant	Capacity–refill (pt.)	6	6.5	5	8
	Type recommended	A suffix A			
Special transmission features		— —			

DRIVE UNITS – PROPELLER SHAFT

Number used		One
Type (straight tube, tube-in-tube, internal-external damper, etc.)		Straight tube (damper on front U-joint with automatic transmissions for Caprice & Kingswood Estate
Outer diam. x length* x wall thickness	Manual 3-speed trans.	3.25 x 61.57 x .065
	Manual 4-speed trans.	Not available
	Overdrive transmission	Not available
	Automatic transmission	Powerglide - 3.25 x 61.57 x .065 Turbo Hydra-Matic - 3.25 x 60.17 x .065

* Center to center of universal joints, or to centerline of rear attachment. (Continued)

** Upshift: L6-250 (1-2 50; 2-3 88) V8-350 Base (1-2 53; 2-3 88)
V8-350 300 HP (1-2 53; 2-3 86) V8-400 (1-2 51; 2-3 90)
V8-454 345 HP (1-2 50; 2-3 90) V8-454 390 HP (1-2 52; 2-3 86)

Downshift: L6-250 (2-1 35; 3-2 74) V8-350 Base (2-1 41; 3-2 83)
V8-350 300 HP (2-1 38; 3-2 84) V8-400 (2-1 32; 3-2 82)
V8-454 345 HP (2-1 34; 3-2 82) V8-454 390 HP (2-1 38; 3-2 79)

AMA Specifications—Passenger Car

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (a)

MODEL

DRIVE UNITS – PROPELLER SHAFT (cont.)

Intermediate bearing	Type (plain, anti-friction)		None
	Lubrication (fitting, prepack)		---
Slip Yoke	Type -		Yoke
	Number of teeth		27
	Spline O.D.		1.1750
Universal joints	Make and Mfg. No.		Chevrolet 3943326
	Number used		Two
	Type (ball and trunnion, cross)		Cross
	Rear attach. (u-bolt, clamp, etc.)		U-bolt
	Bearing	Type (plain, anti-friction)	Anti-friction
		Lubric. (fitting, prepack)	Prepack
Drive taken through (torque tube or arms, springs)			Control arms
Torque taken through (torque tube or arms, springs)			Control arms

DRIVE UNITS – AXLE

Type (front, rear)			Rear
Description			Semi-floating, overhung hypoid pinion & ring gear
Limited Slip differential, type			Cone clutches or dual disc clutches
Drive Pinion Offset			1.5
No. of differential pinions			-2;
Pinion adjustment (shim, other)			Shim
Pinion bearing adj. (shim, other)			Collapsible Sleeve
Wheel bearing type			Direct on single row cylindrical roller
Lubricant	Capacity (pt.)		3.75 (8.125 ring gear) 4.25 (8.87 ring gear)
	Type recommended		Open Diff: Meeting Military Specs. MIL - L - 2105B
	SAE viscosity number	Summer	SAE 80
		Winter	SAE 80
		Extreme cold	SAE 80

AXLE RATIO TOOTH COMBINATIONS

(See page 3 for axle ratio usage)

Axle ratio		2.56	2.73	3.08	3.36	2.56	2.73	3.07	3.31
No. of teeth	Pinion	16	15	12	11	16	14	14	13
	Ring gear	41	41	37	37	41	41	43	43
Ring Gear O.D.		8.125				8.875			

AMA Specifications—Passenger Car

Page 18

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (•) 2-70

MODEL

DRIVE UNITS – WHEELS

Type & material		Short Spoke disc, steel
Rim (size & flange type)	Std.	15 x 5JJ except station wagons - 15 x 6JK Station Wagons
	Opt.	15 x 6JK
Attachment	Type (bolt or stud)	Stud
	Circle diameter	4.75
	Number and size	5 hex nuts 7/16 - 20 UNF -2B

MODEL

DRIVE UNITS – TIRES

Standard	Size, load range, ply		F78x15/B (a); G78x15B-with additional option weight, (b); H78x15/B (c); H78x15/D (d).
	Type (bias, radial, etc.)		Fiberglass Bias Belted
	Full rated Inflation Press.	Front	Cold 24; Hot 30 *
		Rear	Cold 28; Hot 34 *
	Rev./Mile at 45 MPH ●		763 w/F78-15
Optional	Size, load range, ply		G78 x 15 / B (a) H78 x 15 / B (a) (b) G70 x 15 / B (a) (b) H70 x 15 / B (c)

BRAKES – PARKING

Type of control		Foot pedal apply "T" Handle release
Location of control		Left of steering column under instrument panel
Operates on		Rear service brakes
If separate from service brakes	Type (internal or external)	- - - - -
	Drum diameter	- - - - -
	Lining size (length x width x thickness)	- - - - -

* Pressures shown are up to base vehicle load limit.

(a) All six-cylinder models and Biscayne and Bel Air with base V8 (350 CID, 250 HP).

(b) All models with L48 or LF6 and Impala and Caprice with base V8.

(c) Models with 454 CID engine.

(d) Station Wagons

AMA Specifications—Passenger Car

Page 19

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (a)

BRAKES – SERVICE

MODEL				STANDARD	FRONT DISC (a)
Type (drum) or (disc & no. of pistons)				Drum;single piston duo servo	Disc - front (c); Drum-rear
Self adjusting (std., opt., N.A.)				Standard	
Special Valving	Type (proportion, delay, metering, other)			None	Metering
Power brake make & type (remote, int., etc.)		Std.		- - -	(b)
		Opt.		(b)	- - -
Effective area (sq. in.) *				184.3	114.6
Gross lining area (sq. in.) **				198.4	124.3
Swept area (sq. in.) ***				328.3	368.4
Front to Rear Effectiveness Relationship				59	
Drum	Diameter (nominal)	Front		11.0	- - -
		Rear		11.0	
	Type and material			Composite; rim-cast iron & web-steel (front & rear)	(rear only)
Rotor	Outer working diameter				11.75
	Inner working diameter				8.00
	Working width				1.25
	Material & type (vented/solid)				Cast iron, vented
Wheel cylinder bore	Front			1.1875	2.938
	Rear			1.00	
Master Cylinder	Bore			1.00	1.125
	displacement distribution	Front	%	62	75
		Rear	%	38	25
Pedal arc ratio				5.80	3.38
Line pressure at 100 lb. pedal load				739	930
Shoe Clearance	Front			Self adjusting	
	Rear			Self adjusting	
Brake lining	Bonded or riveted			Bonded	Riveted
	Front Wheel	Material		Molded asbestos	
		Size (length x width x thickness)	Prim. or outboard	9.25x2.75x.168	5.96x2.21x.41
			Second. or inboard	11.63 x 2.75 x .168	5.96 x 2.21 x .41
		Segments per shoe		One	One
	Rear Wheel	Material		Molded asbestos	
		Size (length x width x thickness)	Prim. or outboard	9.25 x 2.00 x .168	9.25 x 2.00 x .168
			Second. or inboard	11.63 x 2.00 x .168	11.63 x 2.00 x .168
		Segments per shoe		One	One

* Excludes rivet holes, grooves, chamfers, etc. ** Includes rivet holes, grooves, chamfers, etc.
*** Total swept area for four brakes. (Widest lining contact width for each brake x its contact circumference.)

(a) Power front disc brakes standard for Caprice Coupe and Sedan and for Impala Custom Coupe

(b) Bendix; Delco-Moraine vacuum power unit, integral.

(c) Single piston, Floating caliper

AMA Specifications—Passenger Car

Page 20

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (e) 2-70

MODEL	All Models Except St. Wagons	Station Wagons
STEERING		
Manual (std., opt., NA)	Standard-Energy absorbing steering column	
Power (std., opt., NA)	Optional	
Adjustable steering wheel (tilt, swing, other) — Type and description	Tilt: Tilt achieved with universally-jointed steering shaft at base of steering wheel; 5-inch vertical travel range	
Adjustable steering wheel (tilt, swing, other) — (std., opt., NA)	Option	
Wheel diameter — Manual	Oval - 16.25 x 15.50	
Wheel diameter — Power	Same as manual	
Turning diameter (feet) — Outside front — Wall to wall (l. & r.)	45.5	
Turning diameter (feet) — Outside front — Curb to curb (l. & r.)	42.5	
Turning diameter (feet) — Inside rear — Wall to wall (l. & r.)		
Turning diameter (feet) — Inside rear — Curb to curb (l. & r.)		
Manual — Gear — Type	Semi-reversible, recirculating ball nut	
Manual — Gear — Make	Saginaw Steering	
Manual — Gear — Ratios — Gear	24.1	
Manual — Gear — Ratios — Overall	30.79:1	
Manual — No. wheel turns (stop to stop)	5.12	
Power — Type (coaxial, linkage, etc.)	Integral gear with vane type pump	
Power — Make	Saginaw Steering	
Power — Gear — Type	Same as Manual	
Power — Gear — Ratios — Gear	16:1-12.4:1	17.5:1
Power — Gear — Ratios — Overall	19.3:1-15.5:1	21.2:1
Power — Pump driven by	Crankshaft pulley	
Power — No. wheel turns (stop to stop)	2.71	3.54
Linkage — Type	Parallelogram	
Linkage — Location (front or rear of wheels, other)	Rear	
Linkage — Drag link (trans. or longit.)	None	
Linkage — Tie rods (one or two)	Two	
Steering Axis — Inclination or camber (deg.)	7 to 8	
Steering Axis — Bearings (type) — Upper	Ball stud with non-metallic bearing surface	
Steering Axis — Bearings (type) — Lower	Ball stud with non-metallic bearing surface	
Steering Axis — Bearings (type) — Thrust	None	
Whl. Align. (range at curb wt. & preferred) — Caster (deg.)	P 1/4 to P 1-1/4	
Whl. Align. (range at curb wt. & preferred) — Camber (deg.)	N 1/4 to P 3/4	
Whl. Align. (range at curb wt. & preferred) — Toe-in (outside track inches)	1/8 to 1/4	
Steering spindle & joint type	Forging with pad for mounting brake cylinder;spherical joints	
Wheel Spindle — Diameter — Inner bearing	1.2493 - 1.2498	
Wheel Spindle — Diameter — Outer bearing	.7492 - .7497	
Wheel Spindle — Thread size	3/4-20 NEF - 3 (Modified)	
Wheel Spindle — Bearing type	Taper roller	

AMA Specifications—Passenger Car

Page 21

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (a)

MODEL

SUSPENSION – GENERAL

(See Supplement page for details on Air Suspension)

Provision for car leveling		Front stabilizer bar
Provision for brake dip control		Angle of front upper control arm
Provision for acc. squat control		Geometry of rear suspension
Special provisions for car jacking		Position jack in bumper notch on lower face of front & rear bumpers
Shock absorber front & rear	Type	Direct, double acting, hydraulic
	Make	Delco
	Piston dia.	1.00
Other special features		

SUSPENSION – FRONT

Type and description		Independent - SLA type with coil springs and concentric shock absorber and spherically-jointed steering knuckle for each wheel, lower control arm strut-supported	
Spring	Type	Coil, right hand helix	
	Material	Steel alloy	
	Size (coil design height & I.D.; bar length x dia.)	11.76 x 3.80; 113.97 x .641	
	Spring rate (lb. per in.)	Six Cyl. -390	Base V-8 290
	Rate at wheel (lb. per in.)	Six Cyl. -117.6	Base V-8 81.1
Stabilizer	Type (link, linkless, frameless)	Link	
	Material & bar diameter	HR steel .8125	

SUSPENSION – REAR

Type and description		(a)	
Drive and torque taken through		Control arms	
Spring	Type	Coil, right hand helix	
	Material	Steel alloy	
	Size (length x width, coil design height & I.D.; bar length & dia.)	12.37 x 4.00; 145.92 x .647	
	Spring rate (lb. per in.)	Six Cyl. -265	Base V-8 230
	Rate at wheel (lb. per in.)	Six Cyl. -124	Base V-8 107.3
	Mounting insulation type	Natural rubber	
	If leaf: No. of leaves	--	
	If leaf: Shackle (comp. or tens.)	--	
Stabilizer	Type (link, linkless, frameless)	None	
	Material	--	
Track bar type		Lateral, frame to rear axle	

(a) Link type: 2 lower control arms, 1 upper control arm and track bar (St. Wagon and models with 350 manual transmission, 400 & 454 Engines- 2 upper control arms)

AMA Specifications—Passenger Car

Page 22

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (•)

MODEL

FRAME

Type and description (Separate frame, unitized frame, partially - unitized frame)	All welded perimeter frame with front crossmember, rear axle upper control arm crossmember, rear shock absorber crossmember and a rear crossmember, welded box-construction side rail from front crossmember to aft of rear axle kick

BODY – MISCELLANEOUS INFORMATION

		4-dr Sedan	Sport Cpe.	4-Door Sst. Sedan	Impala Custom Cpe	Convert-ible	Station Wagons
Drs. hinged (front, rr.)	Front doors	Front					
	Rear doors	Front					
Type of finish (lacquer, enamel, other)		Acrylic Lacquer					
Hood counterbalanced (yes, no)		Yes					
Hood release control (internal, external)		External					
Vehicle Indent. No. location		Top left of instrument panel pad					
Engine No. location		6-cylinder-right side of cylinder block, rear of distributor 8-cylinder-front right side of engine block					
Theft protection - type		Lock, mounted on steering column; locks steering wheel transmission shift lever and ignition					
Vent window control method (crank, friction pivot)	Front	None					
	Rear	None					
Seat cushion type	Front	Formed wire and foam pad					
	Rear	Formed wire and foam pad					
	3rd seat	- - - -					Wire & foam pad
Seat back type	Front	Formed wire and cotton					
	Rear	Formed wire and cotton					
	3rd seat	- - - -					Wire & cotton
Windshield glass type (i.e., single curved - laminated plate)		Single curve - laminated plate					
Side glass type (i.e., curved - tempered plate)		Curved - tempered plate					
Backlight glass type (i.e., compound curved - tempered plate, three piece)		Compound curve - tempered plate					
Windshield glass exposed surface area		1396.2		1354.4			1396.2
Side glass exposed surface area		1412.2	1366.0	1454.6	1349.6	1331.6	2625.2
Backlight glass exposed surface area		1230.4	1029.1	1334.9	933.2	767.3	923.4
Total glass exposed surface area		4038.8	3929.5	4143.9	3637.2	3453.3	4944.8

AMA Specifications—Passenger Car

Page 23

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (•)

MODEL

CONVENIENCE EQUIPMENT

(Indicate whether standard, optional or NA on each series)

Power windows	Side windows	Optional all models except 153-15400
	Vent windows	NA
	Backlight or tailgate	Standard 3-seat wagons - option 2-seat wagons
Power seats (specify type as well as availability)		6 way power bench seat - 155 - 156 - 16000
Reclining front seat back (R-L or both)		NA
Front seat head restrainer (R-L or both)		Standard
Radios (specify type as well as availability)		AM-FM Stereo Optional - AM Pushbutton, AM - FM - Pushbutton
Rear seat speaker		Optional - all models
Power antenna		NA
Clock		Optional - 15000, 163-16400 -- Standard 16600
Air conditioner (specify type and availability)		Optional-all models-Comfortron, Four-Season, GM Chevrolet
Speed warning device		NA
Speed control device		Optional - 154 - 156 - 164 - 16600
Ignition lock lamp		NA
Dome lamp		Standard - All Models
Glove compartment lamp		Optional 153-15400, Standard other Models
Luggage compartment lamp		Optional - 15000 exc wagons -- standard 16000
Underhood lamp		Optional - all models
Courtesy lamp		Optional - 150-163-16400 exc Conv. -Standard other Models
Mirror Maplight		Optional
Auto. trans. quad. lamp		Standard
Cornering light lamp		NA
Finger tip washer-wiper control		Optional Provided with factory installed radio
Windshield antenna		

LAMP HEIGHT AND SPACING

Height above ground to center of bulb or marker	Headlamp	Highest *	
		Lowest	
	Tail	Highest	
		Lowest	
	Sidemarker	Front	
		Rear	
Distance from C/L of car to center of bulb	Headlamp	Inside	
		Outside *	
	Tail	Inside	
		Outside	
	Directional	Front	
		Rear	

* If single headlamps are used enter here.

AMA Specifications—Passenger Car

Page 24 A

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (•)

WEIGHTS

250 Cu. In. 6 Cyl. Engine	CURB WEIGHT * POUNDS			% PASS. WEIGHT DISTRIBUTION				LIQUID WEIGHT	
				Pass. In Front		Pass. In Rear			
Model	Front	Rear	Total	Front	Rear	Front	Rear	Fuel	Coolant
Biscayne									
4-door sedan	1880	1849	3729	48.6	51.4	18.0	82.0	146.9	25.0
Bel Air									
4-door sedan	1883	1851	3734	48.6	51.4	18.0	82.0	146.9	25.0
Impala									
4-door sedan	1909	1875	3784	48.6	51.4	18.0	82.0	146.0	25.0
2-door sport coupe	1902	1869	3771	48.6	51.4	20.7	79.3	146.9	25.0

Accessories & Equipment Differential Weights				Remarks
250 Cu. In. 6 Cylinder			-5	With Powerglide transmission
			+32	With Turbo-Hydra-Matic Transmission

*Reference – SAE Aerospace-Automotive drawing standards, Section E 1.02 (d).

AMA Specifications—Passenger Car

Page 24B

MAKE OF CAR CHEVROLET MODEL YEAR 1970 DATE ISSUED 9-69 REVISED (•)

WEIGHTS

350 Cu. In. V-8 Engine

Model	CURB WEIGHT - POUNDS			% PASS. WEIGHT DISTRIBUTION				LIQUID WEIGHT	
				Pass. In Front		Pass. In Rear			
	Fron.	Rear	Total	Front	Rear	Front	Rear	Fuel	Coolant
Biscayne									
4-door sedan	2002	1886	3888	48.6	51.4	18.0	82.0	149.6	32.5
Bel Air									
4-door sedan	2004	1887	3891	48.6	51.4	18.0	82.0	146.9	32.5
Impala									
2-door sport coupe	2017	1899	3916	48.6	51.4	20.7	79.3	146.9	32.5
2-door custom cpe	2025	1905	3930	48.6	51.4	20.7	79.3	146.9	32.5
4-door sport sedan	2043	1958	4001	48.6	51.4	18.0	82.0	146.9	32.5
4-door sedan	2025	1906	3931	48.6	51.4	18.0	82.0	146.9	32.5
Convertible	2009	1964	3973	48.6	51.4	20.7	79.3	146.9	32.5
Caprice									
2-door custom cpe	2035	1915	3950	48.6	51.4	20.7	79.3	146.9	32.5
4-door sport sedan	2061	1972	4033	48.6	51.4	18.0	82.0	146.9	32.5
Station Wagons,									
Brookwood -									
4-door 2-seat	1854	2479	4333	48.6	51.4	19.3	80.7	129.8	32.5
Townsman									
4-door 2-seat	1856	2481	4337	48.6	51.4	19.3	80.7	129.8	32.5
4-door 3-seat	1838	2587	4392	48.6	51.4	19.3	80.7	129.8	32.5
Kingswood									
4-door 2-seat	1883	2515	4398	48.6	51.4	19.3	80.7	129.8	32.5
4-door 3-seat	1863	2587	4450	48.6	51.4	19.3	80.7	129.8	32.5
Kingswood Estate									
4-door 2-seat	1895	2529	4424	48.6	51.4	19.3	80.7	129.8	32.5
4-door 3-seat	1881	2609	4490	48.6	51.4	19.3	80.7	129.8	32.5

Accessories & Equipment Differential Weights				Remarks
350 cu.in. (250 H.P.)			+11	With Powerglide transmission
350 cu.in. V8 (300 H.P.)			+36	With Powerglide transmission
350 cu.in. V8 (250 H.P.)			+27	With Turbo-Hydra-Matic transmission
350 cu.in. V8 (300 H.P.)			+63	With Turbo Hydra-Matic transmission
400 cu.in. V8			+58	With Turbo Hydra-Matic transmission
454 cu.in. V8 (345 H.P.)			+245	With Turbo-Hydra-Matic transmission
454 cu.in. V8 (360&390hp)			+296	With Turbo-Hydra-Matic transmission
Power Windows			+24	
Power Seat			+21	
Air Conditioner			+98	
Power Brakes			+9	
Power Disc Brakes (a)			+13	
Power Steering			+28	
Radio, Push Button			+8	
Radio, Stereo			+17	

Reference – SAE Aerospace-Automotive drawing standards, Section E 1.02 (d).

a)-Standard on Models 16447 and 16647-39.

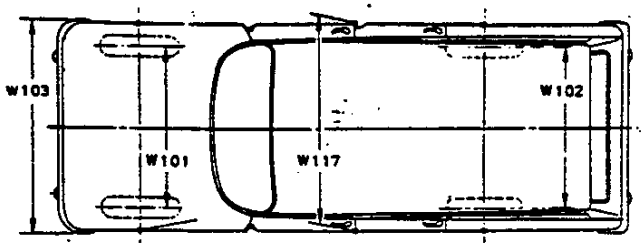
AMA Specifications—Passenger Car

Page 25

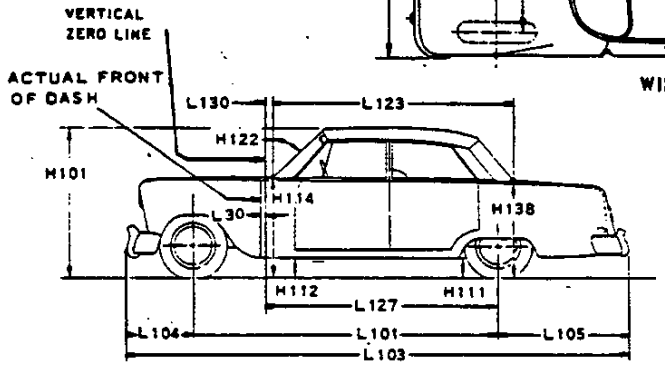
CAR AND BODY DIMENSIONS

KEY SHEET

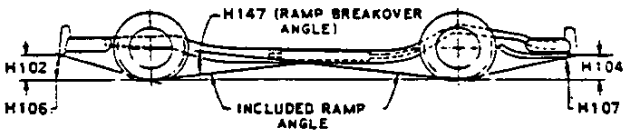
EXTERIOR CAR AND BODY DIMENSIONS



WIDTH

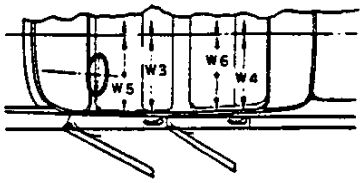


LENGTH & HEIGHT

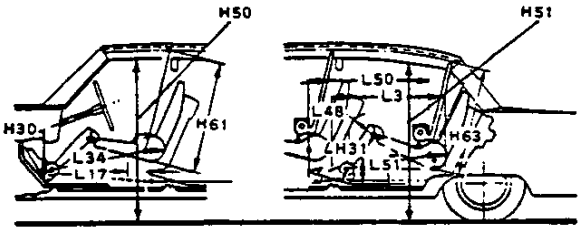


GROUND CLEARANCE

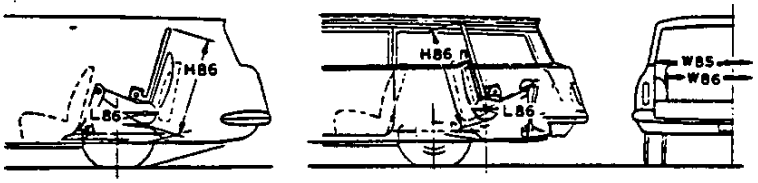
INTERIOR CAR AND BODY DIMENSIONS



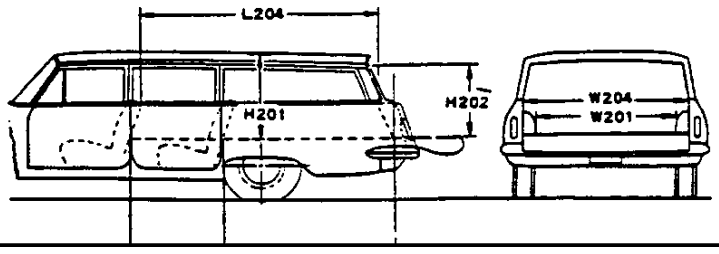
WIDTH



FRONT COMPT. REAR COMPT.



THIRD SEAT



AMA Specifications—Passenger Car

Page 26

CAR AND BODY DIMENSIONS

KEY SHEET

DIMENSION DEFINITIONS

EXTERIOR WIDTH DIMENSIONS

W101 WHEEL TREAD – FRONT. *Measured at centerline of tires, with nominal camber, at ground.*

W102 WHEEL TREAD – REAR. *Measured at centerline of tires at ground.*

W103 MAXIMUM OVERALL CAR WIDTH. *Include bumpers, moldings, or sheet metal protrusions. Measured to outside of metal.*

W117 MAXIMUM BODY WIDTH AT #2 PILLAR. *Measured across body at #2 pillar, excluding hardware and applied moldings.*

EXTERIOR LENGTH DIMENSIONS

L 30 VERTICAL ZERO LINE TO ACTUAL FRONT OF DASH. If actual Front of Dash is to the rear of Body Zero Line, it is identified by a minus (–) sign.

L101 WHEELBASE.

L103 OVERALL LENGTH. *Include bumper guards if standard equipment.*

L104 OVERHANG – FRONT. Measured from C/L of front wheels to front of car, including bumper guards if standard equipment.

L105 OVERHANG – REAR. Measured from C/L of rear wheels to rear of car, including bumper guards if standard equipment.

L123 BODY UPPER STRUCTURE LENGTH AT CAR CENTERLINE. The horizontal dimension from the Cowl Point to the Deck Point.

L127 VERTICAL ZERO LINE TO CENTERLINE OF REAR WHEELS. A horizontal dimension.

L130 VERTICAL ZERO LINE TO WINDSHIELD COWL POINT. The horizontal dimension from the vertical zero line to the theoretical intersection of extended windshield glass plane and normal cowl surface.

EXTERIOR HEIGHT DIMENSIONS

H101 OVERALL HEIGHT – DESIGN. Measured with the vehicle in Manufacturer's Design Weight attitude.

H114 COWL POINT TO GROUND. Measured at vehicle centerline.

H138 DECK POINT TO GROUND. Measured at vehicle centerline.

H112 ROCKER PANEL TO GROUND – FRONT. *The vertical dimension from ground to bottom of rocker panel, excluding flanges. Measured to the outside of sheet metal at* foremost point of rocker panel.

H111 ROCKER PANEL TO GROUND – REAR. The vertical dimension from ground to bottom of rocker panel, excluding flanges. Measured to the outside of sheet metal at front of rear wheel opening.

H122 WINDSHIELD SLOPE ANGLE. *The angle between a* vertical line and the windshield surface at car centerline. On compound-curved windshields the chord of the arc is used and limited to that section of the windshield comprehended by an 18-inch chord.

GROUND CLEARANCE DIMENSIONS

H102 BUMPER TO GROUND – FRONT. *Minimum dimension,* includes bumper guards.

H104 BUMPER TO GROUND – REAR. *Minimum dimension,* includes bumper guards.

H106 ANGLE OF APPROACH. The angle between ground and a line tangent to the front tire static loaded radius arc and the first point of interference, i.e., bumper, guard, gravel deflector, fender or other component, *excluding license plate. This dimension may be determined* graphically for reporting purposes.

H107 ANGLE OF DEPARTURE. *The angle between ground* and a line tangent to the rear tire static loaded radius *arc and the first point of interference, i.e.,* bumper, guard, gravel deflector, tail pipe, fender or other component, excluding license plate. This dimension may be determined graphically for reporting purposes.

H147 RAMP BREAKOVER ANGLE. The supplement of included ramp angle (180° minus included ramp angle) over which car can pass without interference; measured with car sitting on a level surface, using lines tangent to arcs of front and rear static loaded radii and intersecting at point on underside of car which defines the smallest angle.

H156 MINIMUM RUNNING GROUND CLEARANCE. Location of measurement on the car is to be clearly recorded.

FRONT COMPARTMENT DIMENSIONS

H 61 EFFECTIVE HEAD ROOM – FRONT. The dimension from H Point to the headlining, plus a constant of 4.0 inches, measured along a line 8° to rear of vertical.

L 34 MAXIMUM EFFECTIVE LEG ROOM – ACCELERATOR. Measured along a diagonal line from the Manikin ankle pivot center to the H Point plus a constant of 10.0 inches. For treadle type accelerator pedals, the leg room is measured with the Manikin's right foot on the accelerator pedal and the Manikin Heel Point at Accelerator Heel Point. All other types of accelerator pedals *will be measured with the Manikin foot angle set at 87°* and the shoe touching the pedal.

H 30 H POINT TO HEEL POINT – FRONT. The vertical dimension from the H Point to the Accelerator Heel Point.

17 H POINT TRAVEL. The horizontal dimension between the H Point in the most forward and rearward seat

FRONT COMPARTMENT DIMENSIONS (Cont.)

W 3 SHOULDER ROOM – FRONT. The minimum *lateral* dimensions between the door garnish moldings or nearest *interference, measured at the H Point station.*

W 5 HIP ROOM – FRONT. The lateral dimension through the H Point to trimmed body surfaces. Depress loose side wall cloth to trim foundation or other obstruction if such construction exists.

H 50 UPPER BODY OPENING TO GROUND – FRONT. The vertical dimension from a point on the trimmed body opening to the ground, measured at the H Point station.

REAR COMPARTMENT DIMENSIONS

L 50 H POINT COUPLE DISTANCE. The horizontal dimension from the front seat H Point to the rear seat H Point.

H 63 EFFECTIVE HEAD ROOM – REAR. The dimension from the H Point to the headlining, plus a constant of *4.0 inches, measured along a line 8° to rear of vertical.*

L 51 MINIMUM EFFECTIVE LEG ROOM – REAR. Measured *along a diagonal line from the ankle pivot center to the* H Point plus a constant of 10.0 inches, with the foot positioned to the nearest interference between the seat structure and toe, instep or lower leg.

H 31 H POINT TO HEEL POINT – REAR. The vertical dimension from the H Point to the Manikin Heel Point on the depressed floor covering.

L 48 MINIMUM KNEE ROOM – REAR. The minimum dimension from the Manikin knee pivot center to the back of the front seat back.

L 3 REAR COMPARTMENT ROOM. The horizontal dimension from the back of front seat to front of rear seat back at height tangent to the top of rear seat cushion.

W 4 SHOULDER ROOM – REAR. The minimum lateral dimension between the door garnish molding or nearest interference. Measured at H Point station.

W 6 HIP ROOM – REAR. The lateral dimension through H Point to trimmed body surfaces. Depress loose side wall cloth to trim foundation or other obstruction when such construction exists.

H 51 UPPER BODY OPENING TO GROUND – REAR. The vertical dimension from a point on the trimmed body opening to the ground, measured 13.0 inches forward of the H Point.

LUGGAGE COMPARTMENT DIMENSIONS

V 1 LUGGAGE CAPACITY – USABLE. The total luggage compartment luggage capacity in cubic feet with the tire and tools in place.

H195 LIFTOVER HEIGHT. Vertical dimension from the highest point on the luggage compartment lower opening to ground, excluding corner radii.

STATION WAGON – THIRD SEAT DIMENSIONS

W 85 SHOULDER ROOM – THIRD SEAT. The minimum lateral dimension between the door garnish moldings or nearest interference. Measured at H Point station.

W 86 HIP ROOM – THIRD SEAT. The lateral dimension through H Point to trimmed surfaces.

L 86 EFFECTIVE LEG ROOM – THIRD SEAT. Measured *along a diagonal line from ankle pivot center to H Point* plus a constant of 10.0 inches. With rear-facing third seat, foot is positioned in foot well or to nearest interference with rear end or rear closure.

H 86 EFFECTIVE HEAD ROOM – THIRD SEAT. The dimension from H Point to the headlining, plus a constant of *4.0 inches. Measured along a line 8° to rear of vertical.*

STATION WAGON – CARGO SPACE DIMENSIONS

L202 CARGO LENGTH AT FLOOR – FRONT SEAT. The horizontal dimension, measured at the floor level from the rear of the front seat back to the normal inside limiting interference on the tailgate, on the car centerline.

L204 CARGO LENGTH AT BELT – FRONT SEAT. The *horizontal dimension measured from the top rear of front* seat back to a vertical extension line from the normal *inside limiting interference at the top of the tailgate,* on the car centerline.

W201 CARGO WIDTH – WHEELHOUSE. The minimum horizontal dimension, measured between wheelhousings at floor level.

W204 OPENING WIDTH AT BELT. The minimum horizontal dimension, measured between the nearest normal inside limiting interferences of the rear opening at the top of the tailgate.

H201 MAXIMUM CARGO HEIGHT. The maximum vertical dimension, measured from the top of the floor covering to the headlining, on the car centerline.

H202 REAR OPENING HEIGHT. The vertical dimension *measured from the top of the floor covering to the* normal inside limiting interference at the top of the rear *opening, on the car centerline, with both tail-and lift-*gates fully open.

V 2 CARGO VOLUME INDEX BEHIND FRONT SEAT. The total volume in cubic feet above the normal load floor and behind the front seat with the liftgate and tailgate closed.

$$\frac{W4 \times L204 \times H201}{1728}$$

AMA Specifications—Passenger Car

Page 27

INDEX