# **2025 CHARGER RULES**

#### **COMPETING MODELS**

1970–2024 rear wheel drive body cars with a minimum wheelbase of 104" Wheelbase.

## **CAR BODIES**

- All cars must have a minimum of (2) doors, (2) rear quarter panels, deck lid, bumper cover, roof and hood. Body may be metal, plastic, or composite.
- All bodies must meet roof and spoiler height template specifications.
- All bodies must be approved by speedway.
- All cars must be painted and lettered professionally
- Rocker panels may be fabricated
- Front windshields mandatory. Back window optional. Clear plexin must be installed in the rear quarter windows. No side windows.
- On all approved 2007–2019 models, the rear spoiler must not exceed five (5) inches in height, 54 inches in width, and be centered on the car. The maximum rear spoiler height from the ground to the top of spoiler will be 39". The spoiler angle must be between 50 60 degrees.
- On all approved 2020 models, the rear spoiler must not exceed five (5) inches in height, 64–1/2" in width, and be centered on the car. The maximum rear spoiler height from the ground to the top of spoiler will be 39–7/8". The spoiler angle must be between 50–60 degrees
- Wrecker hookup required front and rear of car
- The new late Model Stock car body will be allowed for competition in this class

#### **FRAME**

- Stock OEM front sub frame with tubing frame connector allowed.
- All required heights (crankshaft, fuel cell, ect.) will be checked on with frame on 4" blocks
- OEM stock clip must have factory OEM mounting points for weight break. Rear trailing arm mounts may be fabricated.
- Fabricated clip and lowers allowed with weight penalty.
- Frame rail 2"x3". Minimum 3" crossmember, oil pan, and exhaust clearance.
- A Steel firewall must separate the driver from the engine compartment and fuel tank.

#### **ROLL CAGE**

- A complete speedway approved roll cage.
- Roll cage must be constructed of roll bar tubing with a minimum outside diameter of one and half 1 3/4" inches x .090 wall thickness.

- Roll cage must be centered on the frame. Perimeter style.
- Main roll cage uprights must be on top of outside frame rails
- Full cage is required with four uprights and four top bars.
- Roll bars may go through front and rear firewalls.
- Minimum of three bars in driver's and passenger's door required.
- All bars within drivers reach must be padded.
- Perimeter chassis 55% Max LS. A Older chassis Non Perimeter May Be Allowed With A 2% Penalty
- Driver door bar must be plated with 1/8" steel LMSC style
- All within drivers reach must be padded

## **SUSPENSION**

- Adjustable cups allowed on front and rear.
- Spring spacers, coil over eliminators, or screw jacks may be used on front and rear.
- OEM type steering box. Aftermarket tie rods, centerlink, idler, and pitman arm allowed. No rack and pinion.
- lower A-frames must be OEM Design. lower A-Frames must be same length. Aftermarket lowers can be used but must conform to OEM Design. Aftermarket Spindles Allowed
- Upper A-frames may be fabricated.
- Front sway bar may be OEM or aftermarket. Mounting points may be aftermarket.
- leaf spring and/or coil spring suspension allowed.
- Steel rear lower trailing arms required.
- A fabricated metal top link and track bar allowed.
- Damper shocks may be used.
- Rubber bushing, metal bushing, Teflon bushings or heim joints allowed.
- lowering blocks and trailing arms may be adjustable
- Aftermarket or 5×5 design hubs allowed. Wide 5 and coil Covers allowed

# **REAR END**

- 9 inch rear end may be car, truck, or floater. Any ratio. A standard quick change will be allowed. No cambered Rear End Housings. +/- .4
- Detroit locker, or locked Rear End Units only.

## STRUTS and SHOCKS

- Tie rod or spherical end shocks allowed. OEM aftermarket Struts allowed.
- Aftermarket metal body shocks allowed. No canister shocks allowed. Shocks must be the same size from top to bottom excluding threads. coil springs minimum diameter 5". If Running Coil Over eliminators must have 5" min spring. Coilovers Allowed.
- Coil over eliminator allowed. No coilbinding or Travel limiting devices. No Bumpstops. One (1) spring rubber allowed.
- Shocks may be claimed for \$200 a shock excluding hardware. A claim must be made no longer than 10 minutes after the checkered flag falls. Driver must finish on lead lap to claim. Only allowed if claim is in one position in front of you not behind you in the finishing order. A driver or Owner can claim. Claim must be made in CASH and presented to head tech man in writing before the 10 minutes is up. If driver or owner refuses the claim the driver will be DQ'ed with no pay.

# **BRAKES**

- Single piston metal brake calipers required. Brakes on all four wheels must work.
- Steel disc brakes may be used on front and rear.
- Aftermarket brake and clutch pedal allowed.
- Dual master cylinder allowed. Any type Brake bias adjusters allowed

# WHEELBASE and TREADWIDTH

- All vehicles must compete with a wheelbase of 105". Both sides must be between a minimum of 104 ½" and a maximum of 105 ½". Any device or procedure which has the ability to dynamically change the wheelbase beyond normal travel parameters will not be permitted.
- Vehicles must not exceed the maximum allowable tread width of 64 ½", front and rear, measured at the center of the tire, zero toe in, at spindle height. Tread width may also be measured at the outside of the left side wheel bead to outside of the right side wheel bead and must not exceed 74 ¾". A tolerance of ½" will be permitted between the front tread width and rear tread width, but the tread width must not exceed 64 ½".

#### **CRATE ENGINE**

Chev #88958602, Chev #88958603, Chev#604, Ford#347 JR

- CRATE ENGINE Chev#8602, Chev#8603 may run a 390 4 Barrel carb. A Chev#8604, Ford crate engines will be allowed but must run up to a 450 2 bbl carb.
- These crate engines can be used as all supplied parts from factory manufacturer including gaskets. With or without seal bolts on engine. These engines are subject to teardown procedures and legalities determined by tech committee.
- Crate engines are designed to cut the cost of racing. Anyone found tampering with these engines will be fined up to \$1000.00 for each offense and loss of points.
- Run them as supplied from the factory to ensure legality. contact Tech Official if you need clarification to this rule.

- Aftermarket valve covers are the only part that may be changed on the crate engine.
- 602 crate engines will be allowed to run oil pans off of the GM 603 engine.
- 604 crate engine rules will be directed to the NASCAR rule book.
- Ford 347JR Crate engine rules will teched per Ford specifications. There can be NO changes or modifications made except to Ford factory tolerances.

#### **ENGINE**

- Only stock production engines allowed. Chevrolet 350 cubic inch maximum, Ford 351 cubic.
   MASS Street Stock Engine combinations Allowed per MASS Rulebook. inch, Chrysler 360 cubic inch plus overbore.
- No Chevrolet 400 cu.
- No polishing or coating inside of block
- Overbore of .060 normal wear permitted.
- Aftermarket replacement rods allowed.
- Replacement rods may not be lighter than OEM stock rods.
- Only solid steel connecting rods permitted. No polishing or machine work will be permitted.
- Solid steel connecting rods may not be lighter than stock.
- Flat top or dish 3 ring pistons permitted. Piston must not extend above top of block
- Crankshaft with stock stroke must be retained. Minimum weight 50lbs
- Crankshaft must not be knife-edged. No excessive machining or grinding other than balancing. No drilled main journals. Subject to template inspection by Tech Official
- Wet sump oil system only
- Enlarged oil pan allowed. Kick outs will not be permitted between the bolt holes flange and the top of the added sump. Oil pan 4" minimum ground clearance
- No electric fuel pumps allowed
- Aftermarket valve covers allowed.
- Aftermarket pulleys allowed
- Engines under 310 cubic inch may be allowed a 390 4 barrel. Check with series officials
- Built DMS ENGINE may run up to a 500 2 Barrel carb

#### **HEADS**

- Stock OEM production steel heads only. No Vortec heads on built engine.
- Stock Replacement or SR Head allowed with a 50lb. penalty
- NO modifications, no porting, polishing, or angle milling. No grinding of any kind. 3 angle valve job
  ok as per Speedway rule. One cut below valve seat, to bottom of valve guide. Do not radius or

blend bottom of cut below valve seat.

Chevrolet 70cc min; Ford (Clev) 68cc; Ford (Win) 58cc; Chrysler 68cc min; Chev 62cc. OEM valve size for cylinder head required. Steel valves required.

# Valve size maximum:

- Chevrolet 1.94 intake 1.50 exhaust
- Ford Cleveland 2.05 intake 1.65 exhaust
- Ford Windsor 1.89 intake 1.60 exhaust
- Chrysler 1.90 intake 1.60 exhaust

#### **CAMSHAFT**

- Hydraulic or flat tappet cam and OEM diameter lifters with a maximum lift of chev .480, Ford .512
   Dodge .500 at valve with valve lash as ran in race. lift will be measured at the retainer.
- Any steel type timing chain allowed.
- 0EM or Aftermarket Valve Springs will be allowed on built engine.
- Screw in studs and guide plates permitted with any ratio roller rocker arms allowed
- Stud girdles are permitted. Poly lock allowed.
- Hydraulic cams will be measured with solid lifter and 0 lash.

# **INTAKE and SPACER**

- Cast Iron two-barrel intake or Edelbrock performer aluminum intakes. Chevrolet #2101 Ford Windsor #2181, Cleveland #2665, #2750 and Chrysler #2176 or P#4532852.
- No high performance intake manifolds permitted. Intakes must be speedway approved.
- No porting, polishing, or grinding will be permitted. Do not touch it.
- Holley #7448 spacer a maximum ¾" metal spacer No Bevels. Spacer Gaskets
- .065 max thickness. Must not be coated.
- Holley #4412 spacer a maximum ¾" metal spacer with 2 holes (max 1.690) centered in spacer with a straight cut. No bevels. Spacer gasket .065 max thickness. Must not be coated.
- Crate Motors may run up to a 1 inch thick aluminum spacer with no bevels. Must not be coated. All
  carburetors and spacer plates must meet speedway specifications.

# **CARBURETOR**

- The Holley 450 carburetor is a 500 top with a 350 bottom. The only 500 tops allowed are 4412 or HP 500 with a 350 bottom part #2300. No modification allowed outside NASCAR rework guidelines
- The Holley 500 2bbl and Holley 390 4bbl carburetors must conform to the NASCAR rulebook.

#### See below for rework guidelines:

No polishing, grinding or machine work allowed on any part of carburetor.

- No alterations except choke hardware may be removed and all vacuum ports must be plugged.
   Any bowl or metering block may be used. Base plate must not be altered in shape or size.
- Boosters may not be altered in any manner including size, shape or height of model #.
- Any attempt to pull outside air other than through the venturi is not permitted
- NO Holley ULTRA XP ALLOWED

## **AIR CLEANER**

- Round air cleaner element minimum of I2 inches; maximum of 17 inches.
- Element must be minimum of 1 ½ "and a maximum of 4 inches in height.
- Dry type paper element only. No cold air boxes or cowl induction allowed.
- No tubes, funnels or anything which may control the flow of air are permitted
- Air cleaner base must not be above choke horn

# TRANSMISSION and FLYWHEEL ASSEMBLY

- OEM standard production Automatic, Manual transmissions permitted. All gears must work, no straight cut or machined gears. No top loaders or special production transmissions.
- Heavy duty OEM steel clutch permitted. No lightening.
- Minimum clutch and flywheel assembly with bolts 33 pounds.
- OEM Steel clutch and Flywheel over 33 lbs. receives a 50 pound weight break
- Hydraulic clutch control permitted.
- Must have steel bell housing that is speedway approved.
- Drive shaft must be of magnetic steel only. Drive shaft must be painted white with two safety loops attached to the bottom of car.
- Tex or Richmond aftermarket transmission with stock type gears permitted
- The 5 ½" clutch package will be allowed with no weight penalty as will the 7 ¼" package and 10 ½"

# **EXHAUST**

- Regular Headers (4 into 1) will be permitted. No stepped headers. No 180 allowed.
- Cast iron manifolds permitted.
- All IH exhaust pipe must exit behind the driver.

#### **ENGINE LOCATION**

- Engines may be interchanged from one body manufacturer to another.
- Engine must be centered in chassis. #1 spark plug in line with upper ball joint. Ford max 2 inches back from #1 spark plug

• Minimum crankshaft height is 12", from the center of crank pulley to the ground. Engine and header pipe clearance must be a min height of three inches (3inch) with driver.

# **COOLING SYSTEM**

- Aluminum radiators permitted. Any radiator allowed.
- Overflow hose recommended.
- Antifreeze is not permitted. There will be a \$100 fine for dropping antifreeze on the track.

### **ELECTRICAL SYSTEM**

- HEI Ignition allowed for base weight. MSD allowed. No digital ignition, no digital tacs, no 16v systems
- Aftermarket or OEM HEI distributors permitted. All Distributors can be locked up or welded in crate or Built.
- Only 1 coil permitted.
- Only one 12-volt battery permitted
- No adjustable timing controls.
- No open ended wiring in driver's compartment.
- Any type traction devices are not allowed. No computerized systems are allowed.
- All ignition systems must be acceptable to speedway officials.
- No digital gauges.
- MSD claim rule, \$300 by speedway or any driver that completed the charger series race

#### **FUEL and FUEL SYSTEM**

- Race fuel required. No other mixtures of any kind. 10 gallons of fuel must be purchased at **CARTERET SPEEDWAY**.
- All Fuel must pass Speedway Fuel specifications. Fuel must be same color. No oxidizers or additives, fuel must pass track chemical fuel test.
- The maximum capacity allowed is 22 gallons
- Fuel cells must have 8" minimum ground clearance
- Fuel cells are recommended. Must be securely strapped down with no less than 1/8" steel straps. Fuel cell must be vented high and to the left side.

## **WHEELS and TIRES**

- Maximum width 10" on all 4. 15" Steel wheels only. Chrome wheels NOT recommended. All 4 wheels must be same offset.
- Air bleeders will not be permitted. No chemical tire treatment allowed.
- Tires used for qualifying and race must be approved by the speedway.
- Any car tires from any source other than speedway tire building will be disqualified
- \*\*Hoosier F-45 10" tires from Tire Building Required. Drivers will run on two (2) new and two (2) scuff tires... after first race. Four (4) new tires at the beginning of the season.\* \*

# **WEIGHT**

- 3100 lbs. base weight with driver. NO TUNGSTEN ALLOWED.
- Cars with OEM Front clip and OEM Floorboard chassis receive 100lb weight break.
- Cars with OEM Front clip Fab chassis or 5×5 Equipped car receive 50lb weight break.
- 55% left side maximum weight percentage on all cars. Weights must be on back on hood.
- World Products Heads or 5 ½ inch clutch must add 50lbs.
- All cars will be weighed with driver in a driving position cars may gas up after race.
- All lead weight must be added to chassis securely.
- Any car that runs a 350 carb on any motor combination receives a 100 lbs. weight break.
- MSD Allowed.

# **WEIGHT ENGINE COMBINATIONS:**

- GM 603: 3050 lbs / 1350 lbs / 390 4bbl carb / A one piece open hole solid aluminum carburetor spacer, a maximum 1" in thickness, may be used between the intake manifold and the carburetor. The spacer must be centered on the intake manifold with a single open hole which must be cut perpendicular with the base of the carburetor. Taper, bevels, or any other modifications will not be permitted.
- GM 602: 3050 lbs / 1350 lbs / 650 4bbl carb
- FORD 347JR: 3050 lbs / 1350 lbs / 390 4 bbl carb/ NO SPACER PLATE
- GM 604: 3075 lbs / 1375 lbs / 450 2 bbl carb / .750" thick two-hole spacer plate
- LMSC Built: 3075 lbs / 1375 lbs / 450 2 bbl carb / .750" thick two-hole 350 spacer plate