



## PENTICTON SPEEDWAY STREET STOCK RULES 2022

The Street Stock Division is open to any North American built Automobile having factory listed wheelbase of 108" or more. No front wheel drive, 4-wheel drive, all wheel drive, convertibles or station wagon vehicles will be permitted. The word STOCK when used shall mean unaltered, as factory available and produced by OEM for the make, model and year of the car being raced. Any PART of the car Not specifically covered in these rules must remain stock.

### **1. Safety**

1.1 See General Rules for Driver, Belts, Window net rules

1.2 Fire Control: All cars MUST a minimum CSA approved 2 1/2 lb fire extinguisher with either aluminum or steel head mounted in a steel mounting bracket and must be bolted down within drivers reach.

1.3 Window Net: Nylon Ribbon type window net MUST be installed in drivers side window opening. Net size MUST be minimum 16" by 18". Net MUST be installed so its tight. Window net MUST be attached to roll bar and not the body.

1.4 Steering Wheel: All cars MUST be equipped with a quick release steering wheel. Collapsible highly recommended

1.5 Seat: An Aluminum racing seat must be used. A minimum 6 seat bolts, .3/8" or larger must be used to anchor the seat.

### **2. Radios**

2.1 2-way Radios Are Permitted, Receivers are MANDATORY.

### **3. Body**

3.1 Body must be steel or Fiber Glass stock in appearance, no cars will be allowed to start race without a complete body unless approved by tech director.

#### **3.2 Approved Body Types**

- 5 star S2 Bodies
- 5 star MD3 Street Stock
- Ultimate Custom Fiberglass
- CASCAR Bodies
- AR, XYG Metric Cars or the Sportsmans body only.
- Sheet metal bodies MUST be stock appearing to the make, model, year of the race car. Minimum of 040" or 22 gauge steel
- **Late model, Late Model Stock, ABC or 5 star Gen 6 bodies or pieces will NOT be permitted.**

3.3 Hood, Trunk: Minimum 5 hood pins and 2 truck pins must be used

3.4 Body Height / Ground Clearance: Minimum Height of 48" measured 10" behind top of windshield at centerline of roof and a 4" ground clearance at all times without the driver

3.5 Bumpers: Must be in stock position, both front and rear and securely fastened with No sharp edges exposed. Plastic covers may be used but must be Stock appearing.

3.6 Windshield: Glass windows must be removed. Minimum 1/8 Lexan must be used, covering full area, with sufficient bracing to prevent deflection. Minimum of 2 centre braces securely mounted.

3.7 Rear windows are allowed. Must be clear. No tinting.

3.8 Side windows are allowed, but must be a maximum of 12" long, measured from the intersection of the A-post and door.

3.9 1" x 2" Rub Rails are allowed. Each end must be tapered and have a welded cap.

3.10 Rear Spoiler: Rear spoiler is allowed. Rear Spoiler MUST follow contour of rear deck lid. Maximum 5" high and 60" wide. Must be centred on the deck lid and cannot be adjustable.

3.11 Paint and Lettering: MUST have numbers on both doors (Minimum 18") and on roof (Minimum 24") Numbers must contrast the colour of the car.

#### 4. Chassis, Roll Cage

4.1 Cars may utilize a North American Stock Production frame/chassis (1965 or newer) 108" Minimum wheelbase.

4.2 Chassis: All frame Components MUST be Stock if Not stated with No lightening. Suspension mounting locations must remain in OEM stock locations. ONLY. Wheelbase must remain Stock unaltered for frame being used.

4.2.1 NON-Uni-Body: A rotted chassis rail can be reinforced by utilizing 2" x 3" .095 thick tubing inside the rail to safely support mounting of the roll cage.

4.2.2 Uni-body cars: Uni-body cars may install subframe connectors. Minimum 2" x 3" .095" wall tubing.

##### 4.2.3 CONSTRUCTED FRAME/CHASSIS

Any constructed chassis permitted but must use: 71-81 Camaro STOCK front clip with pickup points and measurements on both the front and rear. ➤ All newly constructed vehicles must conform to measurements as listed.

- Stock front clip, attached to centre section at 90 deg, No Chassis offset permitted
- 2. Frame MUST be fabricated by a minimum 2" x 3" .095" Steel
- 3. Lower ball joint to center section 24"
- 4. Center section frame width 57"- 60" 8. LF Shock to "A" pillar 35"
- 5.. "A" pillar to "B" pillar 45"-48"
- 6. Minimum top of frame to halo 38"
- 7. Minimum halo width 46"
- 8. Minimum door bar height from top of frame 22"
- 9. Each side will have 4 door bars
- 10. Minimum side to side door bar width 70"
- 11. Must have center windshield bar
- 12. Must have center halo bar
- 13. Rear clip width 36"-38"
- 14. Transfer bar from rear B pillar cross bar to RF frame mandatory
- 15. Camaro rear leaf springs only and must be mounted in stock location.
- 16. Rear clip to be constructed of 2X3X.095 tubing.
- 17. Both the front and rear bay bars must be in line with the top door bars.
- 18. Driver's foot box must incorporate intrusion protection bars
- 19. Dash panel complete from "A" pillar to "A" pillar
- 20.. Dash panel complete from top of cross bar, 90 DEG bend, level with base of cowl

- 21. Rear firewall to extend up from frame to top bay bar and extend to base of rear window
- 22. Sheet metal in driver's area must be welded, passenger side maybe riveted. All interior sheet metal must be constructed with magnetic steel
- 23. Minimum 1/8" floor plate on drivers' side from firewall to "B" pillar

4.3 All Chassis MUST be symmetrical, NO OFFSETS OR STRAIGHT RAIL CARS

4.4 Frame Height: Minimum 6" Frame Height for ALL CARS. Driver out of car.

4.5 All Non fabricated chassis must use a stock transmission crossmember in stock location. Notching for exhaust pipe clearance is allowed.

4.6 Stock C-channel frame extending from front to rear clips on full frame cars may be boxed or connected from side to side with an "X".

4.7 Fabricated rear clips are allowed on coil spring cars, Front and rear spring mounts must remain at stock datum points. MUST be a Minimum 2" x 3" .095" steel

4.8 Roll Cage: A Full roll cage constructed out of 1 3/4 .095 minimum round steel tubing is mandatory. Roll Cage Must be symmetrical in all directions. Leg Protection Bar MUST be installed. MINIMUM of 4 horizontal door bars on drivers' side with a minimum of 2 vertical bars between each horizontal bar and anti-intrusion plates must be welded on the outside of bars (min. 16 gauge). Three door bars or " X" type bars with a top cross bar mandatory on passenger side.

## 5. Suspension

5.1 Front Suspension: No modifications to stock suspension parts or stock suspension locating points. Upper Control Arm Mounts can be changed to any location or height.

5.1.2 Lower Control Arms MUST be stock. 1 Left OR right lower control arm can be lengthened or shortened by 1" to achieve desired camber.

5.1.3 Tubular upper control arms are permitted

5.1.4 Offset (problem solver) cross shafts are allowed in upper control arms.

5.1.5 Upper and Lower control arm rubber bushings may be replaced with urethane or heavy plastic, steel, aluminum or brass. MoNo-ball type will Not be permitted.

5.1.6 Front load bolts are permitted

5.1.7 Front Shocks can be relocated

5.1.8 Any Ball Joints are allowed with the exception of MoNo ball joints.

5.1.9 Left and Right Spindles must be the same. NO fabricated or modified spindles allowed. Spindle holes can be modified to fit larger ball joints.

5.1.10 Steering must use stock type tie rods. Steel or aluminum rods with minimum 5/8" threads allowed to replace stock rods. Any steel centre link, idler arm, pit man arm is allowed.

5.1.11 No bump stops allowed

5.1.12 Springs: Steel Racing Springs are allowed, 5" minimum diameter

5.1.13 Sway Bar: One piece sway bars ONLY, May be mounted as a slapper bar

5.2 Rear Suspension: No modification of stock mounting points, Aftermarket bushings are allowed, No offset bushings and No MoNo ball bushings. Load bolts permitted on metric cars, racing leaf springs allowed. Stock type coil spring cars 4" minimum.

5.2 All cars must have leaf springs, 3 or 4 link rear suspension will be permitted only on original GM stock cars with coil spring suspension

5.2.2 Rear End:

- Rear end housings must be unaltered stock.
- Rear end housing must be stock for frame being used.
- Fabricated spring & shock mounts are allowed.
- Rear ends must be open (operational spider gears), or locked.
- Mini Spools are allowed.
- "C" clip eliminators are allowed.

Ford 9" Rear ends:

- Ford 9" Rear ends are permitted
- Rear end housing must remain as produced. Alterations are Not permitted.
- 3rd Member/Gear set must use a stock steel case & spool. NO LOCKERS
- Lightweight axles are Not permitted.
- Must use stock style (rubber or urethane) bushings in housing. NO steel.
- 3 link Rear ends are NOT permitted.

5.3 Shocks: Aftermarket steel bodied, Non-adjustable racing shocks permitted, No high-pressure gas shocks. 1 shock per wheel.

5.4 Brakes: OEM style single piston calipers, Howe single piston steel calipers allowed

5.4.2 Dual master cylinders permitted.

5.4.3 Proportioning valves permitted

5.4.4 No aluminum brake parts allowed

5.4.5 Two-piece steel hubs and straight rotors allowed. No drilled or grooved rotors

5.4.6 Rear drum brakes are permitted

5.5 Wheelbase & Track Width: wheelbase must be minimum 108" plus or minus 1" from side to side. Maximum track width to be 77.5" to be measured at bulge of tire at spindle height.

## 6. Firewalls and Interior

6.1 All upholstery materials, trim and padding must be removed

6.2 The floor, front and rear firewalls must be 22 gage steel sheet metal

6.3 Tunnel and floor may be raised No more than 13" on right side to accommodate exhaust and transmission

6.4 Dash, rear deck and crush panels can be made from aluminum.

## 7. Fuel Cell:

7.1. A commercially manufactured fuel cell is mandatory. Max 22 US gallons

7.2. Must be specifically designed and manufactured for racing.

7.3. A minimum 20- gauge steel fuel cell container is mandatory.

7.4. Rollover/check valve balls are mandatory on all tank lines.

7.5. Cell must be mounted between the rear frame rails of the chassis, No lower than 8" from the ground.

7.6. A square tubing cage, or equivalent angle iron & flat bar mounting system is mandatory.

7.7. A fuel cell protection bar is mandatory.

7.8. Pump or Race fuel only. No alcohol or exotic fuels.

7.9. Any mechanical fuel pump allowed. No electric pumps.

**8. Radiator:** Must be or resemble OEM, must be in stock location. No antifreeze allowed in cooling system. Aluminum radiators allowed, Electric fans are allowed

**9. Drive Shafts:** Drive Shafts and U-joints MUST be stock steel

9.2 Drive Shafts must be painted White

9.3 A Steel, 360-degree retainer loop, 1/4" thick 2" wide MUST be positioned at the front and the rear of the drive shaft within 12" of the u joint.

9.4 NO lightweight or composite drive shafts allowed.

## 10. Transmissions

Automatic Transmissions:

- Must be a stock production transmission with stock gear ratios.
- Functionality must remain stock.
- Removal of any gears including reverse is Not allowed.

- Stock operational torque converters only.
- Torque converters must be a minimum of 11" diameter.
- Oil coolers are allowed.

Standard Transmissions:

- Must be a stock production transmission with stock gear ratios.
- Functionality must remain stock.
- Removal of any gears including reverse is Not allowed.

**11. Clutch:** Must be stock style & weight. **MUST Not be drilled or machined.**

11.2 Flywheel must be stock, unaltered, minimum 10" diameter **and 14 lbs.**

11.3 Hydraulic or mechanical release bearings are allowed

11.4 Bellhousing **MUST** be a steel scatter shield

**12. Electrical:** All engine packages must utilize a MSD part #8278 **or #8727CT** rev limiter with a functioning RPM chip. All wiring must be clearly visible and traceable for tech.

- GM Crate Engine - 6000 RPM
- Built Engine - 6500 RPM

12.2 Batteries must be securely mounted in an angle iron or equivalent base utilizing a bolt on clamp style mount to hold battery in.

12.3 Marine style battery boxes are mandatory if the battery is mounted in the driver compartment.

12.4. All cars must have a Battery master disconnect On/Off switch mounted to the right OR left rear side of the main cage/main hoop. It must be clearly marked On/Off. The disconnect **MUST** be used to break power in the positive battery cable, Not the negative.

12.5 All cars **MUST** be wired in a manner that if the Battery disconnect switch is turned off the car will Not continue running.

**13. Tire & Wheels:**

13.1. Maximum 8" wide steel racing wheels only. No stock or homemade wheels.

13.2. Wheels must have a Minimum 2" backspace.

13.3. Bleeder Valves are Not allowed.

13.4. Maximum of **1" wheel** spacer per wheel is allowed.

13.5. AR P265 Tire is mandatory.

13.6. Altering of Tires in any manner to obtain a performance advantage is NOT allowed. NO exception

**14. Weights**

- 3200lbs. Base weight minimum at all times, including after the race with driver (No refueling after the race)
- Races longer than 50 laps will have a ½ lbs. per lap over 50 laps allowance.
- 55.0% Maximum left side weight at all times.
- **50.0%** Maximum Rear weight at all times.
- **ALL STOCK Street Stocks (Stock Frame, Steel Body, Stock Front Suspension, Rear Drum Brakes) will be allowed a 200 lb weight break (3000 lbs). NOTE: in the matter of best on track competition this could be adjusted over the season.**

## Engine Rules

**Penticton Speedway Highly Recommends running the 602 crate program. In 2023 will have a 100 lb Weight Break.**

### Built Engines

#### General:

- Unless specifically identified in these rules all parts must be automotive OEM Stock or OEM replacement for engine being run.
- Marine parts are Not acceptable replacements for automotive OEM stock.
- GM, FORD, & CHRYSLER performance racing parts are Not acceptable replacements for automotive OEM stock.
- Two side by side Intake Manifold bolts must have pre-drilled heads for Tech to install a seal.
- Engine must be Corporation to Corporation with chassis being used and MUST be mounted in stock location.
- Any steel wet sump oil pan is allowed.
- Solid Motor Mounts are permitted

#### Engine Blocks:

- Cylinder deck may be machined for cleanup and truing only.
- Zero decking is Not allowed.
- No lightening or altering of engine blocks.
- Aftermarket steel Main caps are allowed.
- Camshaft tunnel must remain of stock dimensions.
- Displacements are as follows: (bore x stroke + overbore = Max Displacement)
  - Chev 350 c.i. 4.00" x 3.48" + .060" = 360 c.i. MAX
  - Ford 351 c.i. 4.00" x 3.50" + .060" = 363 c.i. MAX
  - Chry 340 c.i. 4.04" x 3.313" + .060" = 350 c.i. MAX
  - Chry 360 c.i. 4.00" x 3.578" + .030" = 364 c.i. MAX
- Lifter bores must remain stock size:
  - Chev 350 = .842"
  - Ford 351 = .874"
  - Chry 340 = .904"
  - Chry 360 = .904"
- Steel timing chain and gears only.

#### Camshafts & Lifters:

- Hydraulic or solid flat tappet Camshafts only.
- Hydraulic or solid flat tappet lifters only.
- Anti pump-up lifters are allowed.
- Lifter diameters must remain stock for engine block being used.

#### Crankshafts:

- Stock OEM or aftermarket Stock Style replacement crankshaft, minimum weight 48.5 lbs, are allowed.
- Stock stroke must be maintained.
- No strokers or lightweight cranks allowed.
- Recognized part #'s are as follows:
  - Scat 4-350-3480-5700
  - Scat 9-10442
  - Eagle 4305348057sp\*
  - Eagle 435034805700
  - Eagle 103503480(CM)
- If you choose to use a crankshaft other than one of the recognized Part #'s provided, it is your responsibility to present it to Penticton Speedway Management/Tech for approval BEFORE use.

#### Connecting Rods:

- Stock OEM or aftermarket replacement rods are allowed.  
Eligible aftermarket Part #'s:
  - Eagle SIR5700BBLW
  - Eagle SIR5700BPLW
  - SCAT ICR5700P
  - SCATICR5700
- OEM rod length must be always maintained.
- No lightweight aftermarket rods allowed.
- Balancing of rotating assemblies is allowed. No removal of serial numbers or manufactures emblems.

#### Pistons:

- Flat top or Domed pistons are allowed.
- Maximum 0.125 dome allowed.
- Flat top pistons must be used with cylinder heads having a chamber size less than 74cc
- Domed pistons may be used with cylinder heads having a chamber size of 74cc or greater.
- Maximum Compression ratio 11:1

#### Cylinder Heads:

- Vortec heads are Not allowed.
- Unaltered stock cast iron O.E.M. production cylinder heads only. Cylinder heads showing any signs of alteration in anyway other than outlined in the rule book, will be deemed illegal.
- Machining for screw in studs and guide plates is allowed.
- Opening of push rod slots in cylinder heads is allowed.
- Steam relief holes may be drilled to a larger size. Multi angle valve job permitted.
- New valve seats are allowed.
- No grinding or blending of bowl into bottom cut of valve job.
- No titanium or hollow stem valves.
- Maximum Valve Sizes are as follows:
  - G.M. 1.94" intake 1.60" exhaust
  - Ford 2.04" intake 1.66" exhaust
  - Chrysler 2.02" intake 1.60" exhaust
- Stock diameter replacement valve springs and retainers or Comp valve springs part #26981 with retainer part #787 hardened keepers are allowed.
- Rocker arms must be unaltered Stock or Stock replacement. No Roller Rockers of any kind.

#### Water Pump & Pulleys:

- Stock standard length water pumps only.
- Stock or aftermarket pulleys are allowed with max 30% reduction.

#### Intake Manifold:

- Stock unaltered Cast iron 2bbl intake manifold only.
- Stock high rise/marine manifolds are Not allowed.

#### Distributors:

- Stock style & functioning HEI distributors only.
- MSD part # 8362 is the only aftermarket distributor allowed.
- Accel Module part # 35361 is allowed.
- Vacuum advance may be disabled or removed.

#### Carburetor:

- Stock unaltered 2bbl carburetors only.
- 1 11/16" max throttle bore size.
- Carburetor spacers are Not allowed.
- Carburetor adapters are Not allowed.
- An air cleaner is mandatory.
- Air cleaner base must be round and may Not be any bigger than a 16" diameter.
- Ram air induction, fresh air ducting, cowl induction, or modified air cleaner bases are Not allowed.

#### Exhaust:

- Stock unaltered cast iron exhaust manifolds
- Headers are allowed with a maximum 1 5/8" tubes to 3" collector. NO stepped headers.
- Maximum exhaust pipe size for cars using manifolds is 2.5"
- Exhaust pipe size for cars using headers can be up to 3"
- No crossovers, H-pipes, merge collectors, or merge pipes.
- Recommended Mufflers are as follows:
  - 2.5" Hooker part # 21602
  - 3" Hooker part # 21605

#### Alternators & Power Steering Pumps:

- Alternators and power steering pumps are Not mandatory.
- Any alternator is allowed. Must be driven off the front of the engine.
- Stock or aftermarket cast steel power steering pumps are allowed. Must be driven off the front of the engine.

### **GM Circle Track 602 Crate Engine**

#### General:

- The GM 602 part #88958602 or #19258602 are the only crate engines allowed.
- GM part # 14088765 counter balanced flex plate is suggested.
- Penticton Speedway reserves the right to take any crate engine at any time and replace it with a new one.
- Crate engines must remain sealed at all times. Rebuilds are Not allowed.
- At any time in tech Penticton Speedway may remove the Gm seals to inspect the engine and replace them with Penticton Speedway seals.



#### Exhaust:

- Headers are allowed with a maximum 1 5/8" tubes to 3" collector. NO stepped headers.
- Exhaust pipe size can be up to 3"
- Dual exhaust with 2 mufflers is mandatory.
- No crossovers, H-pipes, or 2 into 1 systems.
- Recommended Mufflers are as follows:
  - 3" Hooker part # 21605

#### Carburetor:

- Holley Part # 01-80541-1 & Quick Fuel Part # Q650CT 650 CFM Crate engine Carbs only.
- A restrictor plate is mandatory.
  - 1" restrictor plate is Mandatory for 2021 only.
  - Must be purchased from Penticton Speedway or Alien Race Cars (1-250-477-8444)
  - At any time, restrictor plates can be swapped among competitors or be replaced with a same size plate.
- An air cleaner is mandatory.
  - Air cleaner base must be round and may Not be any bigger than a 16" diameter.
  - Ram air induction, fresh air ducting, cowl induction, or modified air cleaner bases are Not allowed.

#### Distributors:

- Stock style & functioning HEI distributors only.
- MSD part # 8362 is the only aftermarket distributor allowed.
- Accel Module part # 35361 is allowed.
- Vacuum advance may be disabled or removed.

#### Valve Springs:

- Replacements springs are allowed. Must be one of the following Part #'s:
  - GM Performance #10212811
  - Elgin #RV943xs - Inner springs must be removed.

#### Water Pump & Pulleys:

- Stock standard length water pumps only.
- Stock or aftermarket pulleys are allowed.
- Aftermarket reduction pulleys are allowed with max 30 % reduction.

#### Alternators & Power Steering Pumps:

- Alternators and power steering pumps are Not mandatory.
- Any alternator is allowed. Must be driven off the front of the engine.
- Stock or aftermarket cast steel power steering pumps are allowed. Must be driven off the front of the engine.