



**MINI SPORTS**

**2009**

# Mini Sport 2009

## 1. ELIGIBILITY

- A. All rear wheel drive, front engine, compact cars and short wheel base mini trucks with conventional cabs.
- B. **NO** Convertibles, Station Wagons, supercabs, duallies, 4-wheel drives, or blazer type vehicles.
- C. All vehicles must remain stock for make and model per manufacturers specs, unless said otherwise in these rules. **IF IT DOESN'T SAY YOU CAN, THEN YOU CAN'T.**
- D. We reserve the right to refuse any vehicle not constructed within the spirit of these rules.
- E. **No radios, or mirrors permitted.**

## 2. ENGINES

- A. Engine must be from the same corporate source as the body and chassis. Maximum of 159 Cubic Inch, 4 cylinder inline, water cooled, single camshaft. Maximum of 3 valves and one spark plug per cylinder
- B. Engine block may be decked. Cylinders may be bored out but shall not exceed .080 from the original manufacturers specs.
- C. Crankshaft must be stock and maintain stock factory specs. Stroke may not be increased or decreased. Balancing is permitted. Fluid dampener O.K.
- D. Aftermarket rods O.K.
- E. Any piston O.K.
- F. Any Cam O.K. No aftermarket roller rockers or roller lifters.
- G. Any ignition is O.K. No mags.
- H. Head must be stock and unaltered. No porting or polishing. Port matching to a depth of 1 inch max. Heads may be milled. Maximum of 3 angle valve jobs.
- I. Except as described, all other engine parts must remain original factory specs as to shape, size, weight and finish.
- J. No engine setback or tilting permitted. Engine must be in stock location. Solid motor mounts O.K.
- K. Any oli pan permitted. No dry sump. Windage try O.K.

## 3. CARBURETORS AND MANIFOLD

- A. Any 2 barrel carburetor.
- B. No Predators.
- C. No modifications to carburetor permitted, other than jets, power valve, and removal of choke assembly.

- D. Maximum 1 inch adapter plate permitted. Must not extend down into intake manifold.
- E. 2 throttle return springs must be used, one on the Carburetor, and one on the linkage.
- F. No fuel injection, turbo chargers, super chargers, or ram air of any kind permitted.
- G. Only stock type air cleaners may be used.
- H. Carburetor hats O.K.
- I. Any mass-produced aluminum or cast iron intake manifold O.K.

#### 4. COOLING SYSTEM

- A. One stock type radiator. Aluminum or plastic O.K. Must be mounted in front of engine, inside of body.
- B. No fiberglass flex fans.
- C. **Safety shroud above fan is mandatory.**
- D. One gallon over flow catch can, mounted inside engine compartment.
- E. Electric fans O.K.

#### 5. ELECTRICAL

- A. One passenger car battery only. Alternator optional.
- B. Battery must be mounted between frame rails, securely fastened. If battery is inside drivers compartment, it must be mounted inside of a steel box. All battery mounts are subject to tech approval.
- C. All vehicles must have a KILL switch clearly marked within the drivers reach, and be easily accessible from outside the car.
- D. All vehicles must have self starters in good working order and be able to start the vehicle at the beginning of each race.

#### 6. BODIES

- A. Body must be complete. Truck beds may be gutted but must retain  $\frac{1}{4}$  panels and tailgate, or sheet metal that duplicates stock dimensions.
- B. Sheet metal slab bodies O.K. Fiberglass bodies O.K.
- C. Truck cabs must remain in stock location on stock mounts. Solid mounts O.K.
- D. Openings in hood O.K.
- E. Floor pan and firewall must remain in stock location. All holes must be covered. No holes in Firewall allowed. Dimensions must remain stock.
- F. Stock type bumpers from any source, (subject to tech approval). Rear bumpers must have straps attaching the end of the bumper to the  $\frac{1}{4}$  panel of the body. No step bumpers. **NO BLACK BUMPERS.** Center of front bumpers shall be between 15-19 inches from the

- ground to the center of the bumper. Center of rear bumper shall be between 18-24 inches from the ground. Rear bumper shall not exceed 6 inches high. (*Steel tubing rear bumpers are permitted only with Tech approval.*)
- G. Mesh screens in front window mandatory, (*or approved welded 3 bar protection wrapped with mesh per Tech approval*) all glass and windows must be removed.
  - H. All interior upholstery must be removed.
  - I. Gutting of interior sheet metal permitted. Front fender wells may be removed. Gutting of hood is permitted.
  - J. All doors must be bolted or welded shut.
  - K. 4 hood pins required.
  - L. Removal of antenna, door handles, exterior mirrors, headlights, taillights, chrome strips, and any other exterior trim is mandatory.
  - M. Headlight and taillight holes must be covered and show good workmanship.
  - N. Stock grill must be removed and mesh screen used in its place. (*subject to tech approval*)
  - O. Outer fenders may be trimmed for tire clearance only. All edges must be rolled and show good workmanship.
  - P. **NO MIRRORS- NO EXCEPTIONS!!**
  - Q. Rub rails permitted maximum 1 inch by 2 inch. Installed tight against the body with no sharp edges.
  - R. Trunk may be gutted and must have adequate firewall between fuel cell and driver. Hatchback cars must have tech approved firewall.

## 7. FUEL SYSTEMS

- A. Any fuel that will not mix with water is allowed. No nitrous oxide. No propylene oxide.
- B. Fuel cells mandatory. Fuel cells must be securely installed between frame rails and must be enclosed in a minimum 20 gauge steel box. (*All installations are subject to tech approval*)
- C. Cell can be no more than 4 inches below the rear frame rails.
- D. Fuel line may run through drivers compartment but must run through steel tube.
- E. All electric fuel pumps must have oil cut off switch.
- F. Rear hoop mandatory to protect fuel cell.
- G. Maximum fuel cell capacity is 16 gallons. Must have rollover valve vented outside of vehicle.
- H. Filler spout to remain inside trunk or bed area and must be sealed off from drivers compartment.

## 8. CHASSIS AND SUSPENSION

- A. Frame must remain stock. No cutting, lightening, or altering of any kind except as permitted in these rules.
- B. Lower and upper control arms must be stock and in stock location. Any bushings O.K.
- C. Stock spindles, rotors, and brakes for models used. Upper ball-joint and lower ball-joint must be in stock location.
- D. Springs and torsion bars may be altered and from any source. Stock location must be used except for rear leaf spring mounts, which may be moved. Lowering blocks are permitted. Truck rear ends may be mounted on top of leaf springs.
- E. "I" beam assembly may be bent or altered to achieve ride height but must use stock mounts.
- F. **NO COIL OVERTS**. One shock per wheel may be used in any location. Race shocks O.K.
- G. Sway bars optional and from any source on any mounts.
- H. Wheelbase must remain stock for that vehicle and must not vary plus or minus ½ inch at any time.
- I. Weight jacks on front O.K. But must not be adjustable from inside the vehicle.
- J. Frame may be clearanced for rear end housing to achieve ride height. Steering box and all steering components shall be stock with these exceptions: input may be changed and aftermarket u-joints used. Quick steer O.K. Quick release mandatory. Must have pads on center of wheel. Collapsible section required on input shaft or off set u-joints. *All steering subject to tech approval*. Steering wheel must be on the left side of the vehicle. No cutting, welding, or bending of steering components, including spindles. Power steering optional.

## 9. REAR END AND TRANSMISSIONS

- A. Any mini-truck or compact car transmission O.K., but must remain stock with working forward and reverse. No transmission adapter. Transmissions must bolt to bell housing with no alterations.
- B. Any rear-end is O.K., but must be mounted in stock manner; side to side, and front to rear locations. No quick change or floaters. Rear-ends may be locked and gears may be changed. "C" clip eliminators mandatory where applicable.
- C. Stock type flywheels and clutch only. Hydraulic throw out bearings O.K. Lightning of flywheel O.K., but must be done in a professional manner and approved by tech.
- D. Automatic transmission must be stock and use stock torque converter.
- E. Scatter shield, explosion-proof blanket or 1/8 inch steel plate mandatory for all transmissions. (*Subject to tech approval*.)

- F. Drive shaft must be stock and painted white. No aluminum. One 360 degree drive shaft loop required. Trucks may have one-piece drive shaft.

## **10. WHEELS AND TIRES**

- A. Maximum wheel width 8 inches.
- B. Heavy-duty steel wheels only. No aluminum wheels. Bead locks O.K.
- C. Wheel studs must be ½ inch or larger with 1 inch lug nuts.
- D. Wheel spacers permitted.
- E. Any offset permitted.
- F. All wheel weights must be inside of wheels.
- G. 8 inch D.O.T. or racing tires. Grooving or cutting permitted. Tires shall not protrude more than 2 inches past body.

## **11. BRAKES**

- A. Stock 4 wheel brakes in good working order mandatory.
- B. No drilling or lightening of rotors or drums.
- C. Proportioning valves front to rear only. No brake shut off valves.
- D. No rear disc.

## **12. ROLL BARS**

- A. Steel bars are mandatory and must be minimum 1 ½ inch wall tubing with a wall thickness of not less than .095 and must pass tech.
- B. Roll cage must be a 6-point cage with a minimum of 3 horizontal bars on the drivers side and 2 horizontal bars on the passenger side. Cage must have 2 rear brace bars and on the trucks may protrude outside of the body. All other bars must remain inside the body. Top of cage must fit tight against roof.
- C. Full front hoop permitted but must be completely inside the body.
- D. All bars around the driver including door bars must be padded.
- E. Gussets mandatory around drivers area. **IF YOU CAN'T WELD, GET SOMEONE WHO CAN.** *All cages are subject to tech approval.*
- F. Offset cages O.K.

## **13. SEATS**

- A. Aluminum racing seats only.
- B. Padded headrest mandatory.
- C. Seats must be fastened to roll cage. Minimum six, 3/8 inch bolts with washers and self locking nuts.
- D. Seats may be moved back, but remain on left side.
- E. Must be approved by tech.

#### **14. EXHAUST**

- A. Any header allowed.
- B. Exhaust must extend behind driver.
- C. Pipe must be covered if inside cab and subject to tech approval.

#### **15. SAFETY EQUIPMENT**

- A. Driver side window net mandatory. No string nets. Must have quick release and clearly marked from outside of vehicle.
- B. Fire retardant glove and suit mandatory. No nylon shoes permitted. No jackets or polyester clothing of any kind permitted.
- C. A 2 pound minimum fire extinguisher with charge indicator mounted within easy reach of the driver is mandatory or tech approved.
- D. Any approved 5-point seatbelt system with date stamp, no more than 3 years old is required. All belts must be fastened to roll cage in an approved manner with minimum 7/16 inch grade 8 bolts with self locking nuts. No belts may be attached to floor.
- E. Helmets must meet S.N.E.L.L. 95 testing standards.
- F. Eye protection, helmets, belts, drivers suit, neck brace, and gloves must be worn at all times on the racing surface.

#### **16. WEIGHT**

- A. All vehicles must weigh a minimum of 2200 lbs. At all times including driver.
- B. All weights must be painted white and securely mounted to chassis with minimum 2 ½ inch bolts. The vehicle number must be painted on weights.
- C. Driver “may be” DQ’d for weight lost on the track.

**VERY IMPORTANT:** Remember if the scorekeepers can’t read your number, they can’t score you. It is *YOUR* responsibility to make sure they are readable.

***INTERPRETATION OF ANY AND ALL RULES IS AT THE DISCRETION OF MOHAVE VALLEY RACEWAY OFFICIALS AND THEIR DECISION IS FINAL.***