



## Technical Requirements for Race Cars

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## Technical Requirements for Race Cars

VSCDA vintage racing involves historic and vintage competition vehicles from many different forms of road racing worldwide and almost an entire century of the sport. Since it is difficult to standardize all aspects of car preparation, the following guidelines have evolved to insure basic safety and vehicle integrity. Cars must be presented in a neat and finished condition. Cars shall be prepared according to relevant SCCA or FIA General Competition Rules (GCRs) in effect up to 5 years after the date of the car's manufacture, **but not later than December 31, 1972, except for Groups 5 & 7**. Modifications beyond the era of a car's production, made for other than safety reasons, may result in reclassification of Group.

VSCDA offers, and encourages the use of an annual technical inspection; valid for one year from date of issue, providing the car is raced at least every 3 months. The annual technical inspection covers both the racecar and the driver's safety equipment. Once the technical inspection has been completed, the driver will be issued two annual stickers, one for his or her helmet and one for the racecar. The logbook will be stamped with the VSCDA Annual Tech Stamp. The car will go through an inspection as described below once during the year and then can be passed, upon presentation of the logbook and driver's helmet, together with the event's tech sheet, at our events for the rest of the calendar year. Cars with an annual inspection involved in an incident, must be re-teched before being allowed back on the track, and have the annual inspection revalidated before use at subsequent events. If the car does not have an annual tech inspection, it must be presented for tech at each VSCDA event it is entered in.

### All Vehicles Must Conform to the Following Items:

#### Safety:

1. On board fire extinguishers are mandatory and must be securely fastened inside the cockpit area. The extinguisher must be Halon 1301 or 1211, or dry chemical 1-10-A-BC type, minimum 2 pound, with a charge indicator. A 2 or 3 point Halon or AFFF system is highly recommended. An "E" emergency label must be on the outside of the vehicle to indicate the location of the activation device. **(Monoposto Racing rules require a minimum 2 pound fire system to be installed in Groups 4 & 7)**
2. A master electrical cutoff switch is mandatory and must be clearly marked by the "lightning" bolt and be accessible from outside the vehicle. When the switch is in the "off" position, the engine must not be able to continue to run. It is mandatory that this switch shall interrupt power and/or ground to the ignition system and also interrupt power to the electric fuel pump, if so equipped.
3. Fuel cells are mandatory in all race groups, except pre-war. These must be of a type approved by FIA, SCCA, NASCAR, or IMSA. The cell must be fully enclosed in a metal container with a positive locking cap. The cell shall also incorporate foam inside a bladder. The cell shall be vented to the atmosphere, through a check valve, to provide leakage protection in the event of a rollover. The vent shall exit the vehicle outside the driver's compartment and outside the fuel compartment. Fuel cells installed in a factory original tank position must be verifiable upon inspection. The bottom of the cell shall have a minimum of 6" ground clearance and be above the bottom of both wheel rims nearest the cell so that it will be above ground in the event both of those tires should go flat, unless fully enclosed within the bodywork. In GT and Production type cars, the bladder shall be installed in a container of .036" steel, or .059" aluminum, which fully surrounds the bladder. In Sports Racer and Formula cars,

the fuel bladder shall be completely surrounded by a container (which may also be part of the structure or bodywork of the car) to ensure rigid and secure mounting of the bladder and provide additional protection. A minimum of .036" steel or .059" aluminum is required for all vehicles. Fuels shall not contain nitro-methane. Nitrous oxide use is prohibited.

4. Race vehicles, except pre-war, must be equipped with roll bars or roll cages sufficient in structure and height to protect the driver in the event of a rollover situation. Roll bars will conform to the SCCA height requirement of a minimum of 2" above the driver's helmet. VSCDA recommends more than 2" to anyone constructing or modifying a roll bar since a roll bar on an upside down car can dig into soft ground when off the pavement. This protection is preferably constructed according to the latest SCCA requirements for the car weight and style, but as a minimum must meet the SCCA vintage rules for the car weight and style.

In Groups 2, 3, 5, 6, and 8, in a closed car, a window net, attached to the roll cage, with positive locating metal fasteners, should be installed. If a window net is not installed, it is mandatory that the driver wears an arm restraint on the arm next to window. Drivers of open cars in Groups 2, 3, 5, 6, and 8 must wear arm restraints. Arm restraints are mandatory Groups 4 and 7. Arm restraints are strongly recommended, but not mandatory, in Group 1.

The addition of safety equipment is encouraged or required as outlined above. However, such equipment should not substantially alter the original character, style or spirit of the car.

5. Batteries must be securely fastened and the hot terminal must be covered to prevent accidental contact with the chassis in the event of rollover or crush damage. Batteries installed in other than original location should be contained in a marine type box to prevent acid splash in the event of a collision. All wiring shall be neatly run and secured to the structure of the vehicle using wire ties, clamps etc.

6. All forms of fuel delivery systems must have at least 2 throttle return springs for the accelerator linkage.

7. All cars must be equipped with an SCCA, IMSA, PSCR, USRRRC, CART or NASCAR approved 5-point (minimum) driver restraint system composed of a 3" wide lap belt, anti submarine strap or straps, and 2 inch wide minimum, (3" wide strongly recommended) shoulder harness straps. **Shoulder harness straps may not be attached to the same point in a "Y" configuration.** All straps must be in excellent condition and securely attached to the frame, roll bar or cage, or reinforced portion of the vehicle structure. It is strongly recommended that the belt system not be more than 5 years old; however, this is not mandatory since some of these cars only see one race a year and are kept in enclosed garages which do not expose the belts to ultraviolet rays. Belts shall be judged on condition. **The tech inspector's judgment is final.** They must be in good condition (not frayed, excessively worn or faded) and must be made of nylon or similar DOT approved material, preferably SFI 91 or newer. The minimum acceptable bolt used in the mounting of all belts and harnesses is SAE Grade 5. **(3" shoulder harness, with maximum age of 5 years on all belts, is mandatory for Monoposto Racing cars.)**

8. A firewall composed of a nonflammable material must separate the driver's compartment from the engine compartment and another must separate the driver's compartment from the fuel tank. The preferably metal bulkhead must have no open holes and all breaches must be plugged. In Formula cars and Sports racers, the filler cap and neck are exempt from the bulkhead requirement.

### **Equipment:**

1. All cars must have mirrors that provide driver visibility to the rear and both sides of the car.

2. All cars, except Formula Cars (open wheel), must have two working red brake lights.

3. Formula cars must have a red running light (rain light) visible to following cars. Formula cars may also have one red brake light. **(Formula cars must conform to Monoposto Racing rules and regulations.)**

4. Catch tanks shall be installed to receive and contain any possible overflow from engine, radiator, transmission, differential, transaxle, or any engine oil supply breathers. **Racecars may use only plain water; a water wetting agent and water pump lube in any liquid engine cooling system. No antifreeze** or any other cooling system additive is allowed. Oil and water catch tanks should be separate and a minimum of 1 quart each.

5. On board camera mounts must be approved at technical inspection for security and integrity. Cameras must be encircled with web strap or tie wraps to provide additional restraint for the existing screw in camera mounting system. No bungee cords allowed. Camera mounting and security will be checked again on the grid before each session.

**6. Driver's helmets must have an SA2000 or later Snell Foundation approval.** No "M" helmets are allowed. There are no exceptions to this rule. Drivers of open cars must wear goggles or full-face shields. It is highly recommended that everyone wear a full-face shield. Drivers should have their name, blood type and any allergies or special conditions on the back of their helmets.

7. All drivers must wear a properly fitted suit and underwear ensemble that consists of 2 or more layers of approved fire protection material. A balaclava is required for all drivers who have either facial hair or long hair. Modern, one piece, three layer suits are strongly recommended, and all suits must display the appropriate labels, which allow tech inspectors to verify the suit to be fire retardant. **(Monoposto Racing rules require 3 layers.)**

8. Nomex or equivalent socks are required. Driving shoes must have leather uppers, no rubber or nylon allowed.

9. Single layer Nomex gloves are required. Leather palms are permitted, while additional layers are strongly recommended.

10. Collars, helmet restraining straps or other special equipment intended to increase driver protection, comfort, or convenience are optional, however such equipment must be presented at tech inspection if it is to be worn by the driver on the race course.

11. Signs of damage, breaches, torn seams, tearing, or excessive wear evident on any or all of the above driver's equipment, to the point of rendering such equipment ineffective in driver protection, is sufficient grounds to fail technical inspection.

12. Transponders are mandatory in all Groups except Pre-War Group 1. The required transponder is the TranX260 as manufactured by AMB, for use in cars. It is reddish orange in color. This is the same transponder being used by SCCA, Midwestern Council, and SVRA. The yellow transponder is for use in go-karts and is not compatible with the systems at the tracks.

### **Preparation:**

1. Engine must be of manufacturer, type and displacement as close as possible to the original engine type and specifications. Modifications affecting power output are limited to those available before 1964, in the case of Vintage Cars, and before 1973 in the case of Historic Cars. **Modifications beyond these limits may result in reclassification.**

2. All steering and suspension components shall be properly fitted with no excessive play or wear, and should be of the correct original configuration, with no dragging or loose components. Wood rim Steering wheels are not permitted. Pre-War cars or significant vintage cars, for which no suitable alternative steering wheel is available, should be brought to the attention of the Chief of Tech prior to being presented for technical inspection.

3. All folding tops, folding windshields, sunroofs, removable tops, and T-tops must be securely mounted or removed. All hoods, deck lids, and doors must be securely fastened. Modifications from original competition configurations are not permitted. Racecars retaining original glass or plastic headlamps and turn signals must have these covered or neatly taped over. Clear tape over brake lights is highly recommended. Original equipment windscreens or windshields must be of laminated safety glass construction. Strapping of windshield and rear windows is strongly recommended on fixed roof vehicles.

4. Metal, fiberglass, carbon fiber or any other "hard" tonneau cover is expressly forbidden due to potential intrusion into the driver's inboard side. The only exceptions to this rule are covers that incorporate the windshield and came as part of an original racecar such as in "C" and "D" type Jaguars, Lotus XI Le Mans.

5. Wheels should meet original specifications for diameter, width, and offset. Where original sizes are no longer available, wheels of the same diameter, within 1/2" of the original width may be substituted. **The maximum wheel size allowed in Group 6 is 15" x 9", with the following exceptions. 1968 through 1972 Corvettes and AC Cobras, may use a wheel up to 9 1/2 inches in width.** Any change in construction material must be toward added strength, rather than lighter weight. For safety reasons, modern replica wheels are recommended. Wheel balance weights should be taped over for additional security to retain them. It is preferable to have open type lug nuts so that thread engagement may be seen. The threaded portion of the mounting stud should project through the lug nut for verification at a glance. If covered or "acorn" style lug nuts are used, you may be asked to remove a lug nut so that the thread engagement can be verified during tech inspection.

6. Tires should be as close as possible in size, including tread width, section and diameter, to the original equipment. Original racing type tires are preferred. The aspect ratio- height divided by width- must be at least 60 for all Vintage cars and at least 50 for all Historic Production based sports cars. All of the vintage and historic production based racing cars must use tires with a full width molded tread pattern. Fully treaded original racing tires such as Goodyear Bluestreaks, and Dunlop or Avon racing tires, that predate DOT, are approved. **All group 2, 6, and 8 cars must run on DOT approved, full width, molded tread racing tires, or suitably speed rated shaved street tires.**

The following tires are approved in Groups 2, 6 and 8: Avon, Dunlop L Series, Goodyear Bluestreaks, Goodyear Sports Car Special (G7 & G12A), Goodrich Comp T/A R1 230 Compound, Hoosier Street TD, Hoosier Vintage TD, Kumho V700, Yokohama A008R, A032, A048 and Falkein. Any tire not listed above must be submitted for approval and specifically authorized by VSCDA prior to the race.

**Group 6 cars will run on tires of one of the following listed sizes or smaller: P225/60/15, P245/60/15, 26.5x9.5/15, 27.5x9.0/15, L60x15, 8.00x15.** Group 6 cars not conforming to these specifications will be moved to the exhibition group, if available, or otherwise may not be allowed to run.

**Hoosier R3S03 & R3S04, Goodyear Eagle GS-CS (R-19), and Goodrich G-Force or any other "cheater" tires are not allowed in Groups 2, 6, and 8.**

7. Competition numbers must be displayed neatly and so as to be legible by timing and scoring on both sides and the front of the vehicle in a color that contrasts with the background. **The assigned numbers must be displayed on the car at the time it is presented for technical inspection.** If you don't have the assigned numbers on the car you will fail tech inspection and will not be issued a tech sticker. Numbers must be a minimum of 8" high with a minimum stroke of 1 1/2". Rear end or rear deck numbers are highly recommended, though not mandatory.

8. Exterior of the car shall be kept as original and have a neat and finished appearance. Fender flares shall be as original, if they were allowed in the era. Commercial advertising is not allowed except for race series sponsorship specifically approved by the VSCDA Board of Directors.

### **Car Preparation Sheet (CPS):**

Before entry will be accepted for VSCDA events all cars must have an up-to-date Car Preparation Sheet (CPS) on file with the VSCDA office. Submit this sheet the first time a car is registered to race with VSCDA and when preparation changes.

## **Supplemental Rules and Regulations for "Race Groups and Specific Cars":**

### **1. Race Groups 2 and 8 (Supplemental Rules)**

VSCDA has two types of preparation; Period SCCA Preparation and MOD Preparation. Cars which are prepared to the more liberal rules of some VMC organizations are usually accommodated in one of the VSCDA Mod Classes.

VSCDA also has a provision which allows some cars to be prepared to "other period regulations" as described in Item 9. of this section.

## Period SCCA Preparation

### Race Group 2 (Classes A through E) Race Group 8 (Classes B1, B2, C and X)

*This table covers some important SCCA period requirements which VSCDA expressly focuses attention on. Cars are also expected to meet all other SCCA period requirement unless expressly covered by exceptions listed in this document in the VSCDA General Rules and Car Specific Exceptions Item 8.*

<u>ITEM</u>	<u>SCCA SPORTS CARS</u>	<u>SCCA SEDANS (B,C,D)</u>
Source of Regulation	<p>SCCA 1967 General Comp Rules Appendix A / Art. 1. Production Category Sports Cars (w/ PCS sheets)</p> <p><i>and after review, 1972 and prior cars homologated to similar regulations published by FIA and some other sanctioning bodies</i></p>	<p>SCCA 1967 General Comp Rules, Appendix A / Art.5. SCCA Sedans (w/ Recognition Forms)</p> <p><i>and after review, 1972 and prior cars homologated to similar regulations published by FIA and some other sanctioning bodies</i></p>
MINIMUM WEIGHT	Weight on PCS, minus 5% tolerance	Weight on Recognition Form, minus 5% tolerance
DISPLACEMENT	Maximum overbore 0.060", standard stroke	Maximum overbore 0.060", standard stroke
SUSPENSION	<p>Must be production rear axle assembly, suspension members and mounting points.</p> <p>Shock absorbers must be production type (i.e., lever, telescopic), original number and attachment points. Remote reservoir shocks are not permitted.</p> <p>Coil over springs are not allowed unless originally used in production.</p> <p>Anti-sway bars, torque arms, panhard rods and other similar axle locating devices free.</p>	<p>Must be production rear axle assembly, suspension members and mounting points.</p> <p>Shock absorbers must be production type (i.e., lever, telescopic), original number and attachment points. Remote reservoir shocks are not permitted.</p> <p>Coil over springs are not allowed unless originally used in production.</p> <p>Anti-sway bars, torque arms, panhard rods and other similar axle locating devices free.</p>
BRAKES	Original production brakes must be used at the wheel locations. Dual master and servo systems may be added. Friction material and Alfin type brake drums are free.	Original production brakes must be used at the wheel locations. Dual master and servo systems may be added. Friction material and Alfin type brake drums are free.
INDUCTION SYSTEM	<p>The carburetors and manifold must be those originally supplied by the manufacturer, including the make, model and throat diameter. The jets, needles, seats and chokes may be changed. <i>Note: Other carburetors may be allowed in this Production Classes when period Homologation papers for the make/model/year are presented at Tech.</i></p> <p>Fuel injection throttle bodies and nozzles must be the same as originally supplied by the manufacturer. The make and model of the fuel metering and/or fuel distribution unit must remain the same. The intake manifold can not be modified.</p>	<p>The carburetors and manifold must be those originally supplied by the manufacturer, including the make, model and throat diameter. The jets, needles, seats and chokes may be changed. <i>Note: Other carburetors may be allowed in this Production Classes when period Homologation papers for the make/model/year are presented at Tech.</i></p> <p>Fuel injection throttle bodies and nozzles must be the same as originally supplied by the manufacturer. The make and model of the fuel metering and/or fuel distribution unit must remain the same. The intake manifold can not be modified.</p>
OTHER	All other items of car preparation must meet the regular rules of VSCDA Car Preparation and period GCR.	All other items of car preparation must meet the regular rules of VSCDA Car Preparation and period GCR.

*When these Rules differ in some way from period regulations, the VSCDA Rules shall prevail. Cars prepared to this specification can qualify for the Era (EC) Medallion by faithfully meeting all VSCDA rules.*

## MOD Preparation

### Race Group 2 (Classes MOD-1 and MOD-2) Race Group 8 (Classes MOD-1 and MOD-2)

*This table covers Mod-1 and Mod-2 exceptions to Period SCCA Preparation. All other preparation items are the same as SCCA Period Preparation.*

<u>ITEM</u>	RACE GROUPS 2 & 8 <u>MOD-1</u>	RACE GROUPS 2 & 8 <u>MOD-2</u>
Source of Regulation	SCCA 1965 General Comp Rules, FIA Appendix J, 274, Group 3, (b)	SCCA 1965 General Comp Rules, FIA Appendix J, 275, Group 4, (a) (b)
MINIMUM WEIGHT	Weight on PCS or Recognition Form, minus 10%	Weight on PCS or Recognition Form, minus 15%
DISPLACEMENT	Maximum overbore 0.060", standard stroke	Maximum overbore 0.060", standard stroke
SUSPENSION	<p>Must be production rear axle assembly, suspension members and mounting points.</p> <p>Rear lever type shocks may be changed to telescopic, but the number of shocks may not change and remote reservoir shocks are not allowed.</p> <p>Coil over springs are not allowed unless originally used in production.</p> <p>Anti-sway bars, torque arms, panhard rods and other similar axle locating devices free.</p>	<p>Rear axle assembly may be change to another component of a similar type which was in production prior to 1973.</p> <p>Front/rear lever type shocks may be changed to telescopic, but the number of shocks may not change and remote reservoir shocks are not allowed.</p> <p>Coil over springs are not allowed unless originally used in production.</p> <p>Anti-sway bars, torque arms, panhard rods and other similar axle locating devices free.</p>
BRAKES	<p>Brakes are free, when mounted in the standard location and composed of components available before 1973. Disc brakes may replace drum brakes.</p> <p>Rotors that are drilled, slotted or ventilated are not allowed unless originally used in production.</p> <p>Aluminum calipers may not replace iron calipers unless the caliper was available before 1973.</p>	<p>Brakes are free, when mounted in the standard location and composed of components available before 1973. Disc brakes may replace drum brakes.</p> <p>Rotors that are drilled, slotted or ventilated are not allowed unless originally used in production.</p> <p>Aluminum calipers may not replace iron calipers unless the caliper was available before 1973.</p>
INDUCTION SYSTEM	<p>Original carburetors may be replaced as long as the same number of throats are maintained (example two SUs replaced with two larger SUs or a Weber).</p> <p>Fuel injection throttle bodies must be the same type, same location and same duct dimensions. The number and location of injection nozzles must be the same. The make and model of the fuel metering and/or fuel distribution unit must remain the same. Material can not be added to the intake manifold.</p>	<p>Original carburetors may be replaced with different carburetors and more throats. (example two SUs replaced with two Webers)</p> <p>Fuel injection throttle body dimensions may be increased, but the type and location must be the same. The location of the injection nozzles, type of fuel metering and distribution must remain the same. Material can not be added to the intake manifold extending into the head.</p>
OTHER	All other items of Mod-1 car preparation must meet the regular rules of VSCDA car preparation, except for the differences described above.	All other items of MOD-2 car preparation must meet the regular rules of VSCDA car preparation, except for the differences described above.

*When these Rules differ in some way from period regulations, the VSCDA Rules shall prevail. All MOD-1 and Mod-2 class cars shall carry visible MOD decals on both sides of the car when racing. One set of decals will initially be provided at VSCDA Tech. Subsequent decals will not normally be free of charge.*

To determine the minimum race weight for a cars in Groups 2 and 8 look up the spec. weight in the table “GCR Car Specifications” on the VSCDA web site (<http://www.vscda.org/tech.html>). Multiply this weight by the percentage below.

Period SCCA Preparation	95%
MOD-1	90%
MOD-2	85%

## 2. Race Group 6 (Supplemental Requirements)

Cars in Race Group 6 are production sports cars and sedans that are expected to be prepared to the 1969 SCCA GCRs with the current VSCDA Requirements applied. Sports cars should meet the *Production Category Regulations and Specifications* and Sedans should meet the *A-Sedan Category Regulations and Specification* (or *Trans-Am* when the make and model of the car was recognized and homologated to race in the Trans-Am series). There can be no mixing of rules between Sedan and Trans-Am. The 1969 GCR is on the web at [http://www.sovren.org/competition/rules/gcr/HTML%20gcr\\_69.html](http://www.sovren.org/competition/rules/gcr/HTML%20gcr_69.html). Production Car Specification (PCS) sheets are at <http://www.sovren.org/competition/rules/pcs/PCS69%20Index.htm>.

Weight, engine displacement and brakes specifications can be found in the table “GCR Car Specifications” on the VSCDA web site (at <http://www.vscda.org/tech.html>).

*The following list covers important requirements which VSCDA expressly focuses attention on. Cars are also expected to meet all other SCCA period requirement unless expressly covered by exceptions listed in this document in the “VSCDA General Rules” and “Car Specific Exceptions” Item 8.*

### Engine Displacement

You are expected to declare accurate engine bore and stroke for the point in time of preparation on your entry form and Car Preparation Sheet. Bore may be increased 0.060” (1.5 mm), and stroke must remain standard.

### Brakes

The brakes should be of the original production type. The friction material is free.

The cooling of brakes is allowed by the ventilation of backing plates or fitting of air ducts provided no changes are made in the bodywork. Disk brake dust shields may be altered or removed. Front mounted ducting shall not extend, to the side, beyond the centerlines of the front wheels, and no more than three (3) inches below the lowest part of the original front body panel, nor above a plane passing through the wheel hub centerlines, nor forward of the forward part of the front body panel. Rear brake ducts may extend in a forward direction only, and shall extend only a maximum of 24 inches from the rear brake disc/drums.

### Weight

Cars are expected to meet or exceed the minimum weight specified, without driver, as they come off the race circuit at the conclusion of a race or qualifying session. Ballast may be added to cars as required, provided it serves no other purpose and is securely mounted within the bodywork (with a minimum of two 3/8” grade 5 bolts per 50 pounds).

### Engine Heads

Original equipment heads from the factory, and some faithful aftermarket reproductions are allowed. The head must be of the original material. Raised port heads are not permitted. Different valve stem angles as related to the centerline of the cylinder bore are not permitted. This allows period style aftermarket heads from Ford, GM and Chrysler Motorsports, Dart and World Products, but specifically is not intended to allow

post 1972 technology to be incorporated into heads used in Race Group 6. Heads should have the same spec, or as close as possible, to the year of actual make/model manufacture.

### **Rocker Arms**

Roller rockers are permitted.

### **Camshaft and Followers**

Any camshaft may be used. *Although not period correct*, roller cam followers will be allowed because of recent oil formulation changes which have resulted in flat tappet failures (reference VSCDA Car Prep. Bulletin 4).

### **Engine Intake Manifold**

Period intake manifolds are allowed which were either factory equipment options for the year of manufacture, or for the year of car preparation. VSCDA may require the car owner or driver to lift the carburetor at any time so the manifold runner construction can be inspected.

Substitution of the original homologated factory intake manifold is only permitted under the following conditions which are intended to mirror period performance. The intake manifold must be dual plane for V-8 engines unless it can be shown the original manifold was single plane. Edelbrock Performer RPM manifolds are permitted for some cars (no Air-Gap types) of the part numbers listed in the VSCDA Aftermarket Manifold List. Other manifolds raced in era are permitted when they can be documented as raced for the car make/model and class, and are approved by VSCDA.

### **Approved Aftermarket Manifold List**

<u>Car and Engine</u>	<u>Edelbrock "Performer RPM" Number</u>
Shelby Cobra 260/289	7121
Shelby Cobra 427/428	7105
Shelby GT350/GT500	7121/7105
Ford Falcon, Mercury Comet 260/289	7121
Ford Mustang 289/302/351	7121
Mercury Cougar 289/302	7121
Chevrolet Camaro 302	7101
Chevrolet Corvette 265/283/327/350	7101 and 7104
Chevrolet Corvette 396	7161 and 7164
Chevrolet Corvette 427	7163
Chevrolet Corvette 454	7161 and 7164
Pontiac Firebird 326/400	7156
Pontiac Firebird (other displacements)	No substitute manifolds are approved
AMC AMX /Javelin 290/401	2131

### **Ignition System**

Electronic ignitions triggered from the distributor are allowed. The make of the distributor is free, provided installation does not require any modifications to the engine. Crankshaft triggering is specifically prohibited.

### **Transmission**

Stock or heavy duty transmissions such as the Super T10 are allowed without penalty. The Jerico and TexRacing T101 transmission are allowed with a 150 pound weight addition. The number of forward and reverse gears may not be changed. Reverse must be operational. Five speed transmissions are not allowed

unless production. All transmissions must have a gear ratio in 1<sup>st</sup> gear which is numerically equal to, or greater than, 2.20/1 (this is the gear ratio that was used for 1<sup>st</sup> gear in the “close ration gear sets” of the Muncie, T-10 and period correct Fords).

### **Suspension**

Original suspension pick-up points should be retained. Alternate springs and suspension bushings (of the same type and size) are permitted. Bushings can be a different material, and offset bushings are allowed. The make and model of the shock absorber may be changed. The number of shock absorbers and the system of operation (i.e. telescopic, lever) can not be changed. No coil-over springs or remote reservoir shocks are allowed (unless originally homologated).

Note: When the rules listed above differ in some way from period regulations, the VSCDA Rules shall prevail.

VSCDA has a provision which allows some cars to be prepared to other period regulations as described in Item 9. of this section.

### **3. Race Group 3 - Sports Racers (Supplemental Rules)**

These cars are closed wheel sports racers which are prepared to the SCCA standards that were in effect during the eligibility period, and not more than five years after the date of manufacture. The cars must have full width treaded racing tires or approved street tires with a suitable speed rating. The tires must be of an appropriate size and aspect ratio for the era of eligibility. Cars in this group are not allowed to have wings or down force.

### **4. Race Groups 4 and 7 - Monoposto (Supplemental Rules)**

Open wheel race cars follow the U.S. Monoposto Racing Rules which can be found on the web at <http://www.monoposto.com/>.

### **5. Race Group 5 - FIA, WMC and Prototypes (Supplemental Rules)**

These cars are closed wheel, normally sports racers which are prepared to the standards which were used in the “series the car raced in”. Most of these cars have wings and down force, and the tires are slicks.

### **6. Sports 2000 Race Group (Supplemental Requirements)**

Sports 2000 race cars follow the Rules of the North American Chapter Sports 2000 Racing Car Club which can be found on the web at <http://www.nac-srcc.com/index.htm/>. All S2000s conforming to the SRCC regulations of classes B and H are welcome at events when S2000 racing is scheduled.

### **7. Exhibition Group Cars (Supplemental Rules)**

Exhibition eligibility and standards will be defined for events when an exhibition group is scheduled. Unless specifically addressed it is always expected that exhibition cars meet “VSCDA Technical Requirements for Race Cars” sections *Safety, Equipment* and *Preparation* (which are in the front section this document).

### **8. Car Specific Exceptions**

#### **Austin-Healey**

Sprite -- All AH Sprites and MG Midgets are allowed to use the 1275cc engine, Bugeye Sprites included. However any Bugeye running the larger engine (more than 948cc) can not qualify for the Era Correct Medallion.

#### **Austin, Morris**

Mini -- All models are eligible to run appropriate production classes with carburetors as originally supplied by the manufacturer, or alternately with one Weber DCOE per FIA Homologation for Group 2.

### **Triumph**

TR-2, TR-3, TR-4 -- It is recommended to replace or modify the standard rear axles to be a floater type design.

GT-6 -- The standard rear axles may be modified to eliminate Roto-Flex couplings and the outer axle nut design.

### **Volvo**

544, 122, P100, 123GT, 1800 -- It is recommended to replace or modify early standard rear axles with either a floater type axle design or with the Volvo solution (which was a different axle with disc brakes) which is allowed in FIA Recognition Form 5313 (2/2V GrII).

## **9. “Production Based Sports Cars” Raced as a “Sports Racer”**

Vintage or Historic “production based SCCA sports cars” are eligible to be certified by VSCDA to run as a “sports racing car” if the specific car has a documented history of having raced in such classes in period, and with such modifications, and if the car meets the appropriate SCCA or FIA period regulations. Owners must provide documentation authenticating the car's preparation and history. Street cars and production racing cars which have been modified in the current era will not be eligible to run as a “sports racing car”. In no case shall a car accepted under this rule have modifications which were not available in period.

## **10. Preparation to Other Competition Rules (Race Groups 2, 6 and 8)**

VSCDA welcomes cars which are faithfully prepared to other relevant General Competition Rules (GCRs) in effect up to 5 years after the date of the car’s manufacture but not later than December 31, 1972. The possibilities include different year SCCA GCRs, FIA, IMSA, and possible other rules which are appropriate.

VSCDA will place approved cars in appropriate race classes, depending on performance. Approved cars can qualify for the Era Correct Medallion.

For more information about this option please contact the Car Preparation Steward. Requests should be submitted no less than 60 days in advance of the first race.

## **11. Qualification for VSCDA “ERA CORRECT” Medallion (Race Groups 1, 2, 6 and 8)**

Production based race cars qualify for the VSCDA Era Correct (EC) Medallion decal when preparation faithfully to an appropriate period GCR.

Interpretation will be determined by VSCDA concerning the primary specifications and components of the car which need to be period correct to qualify. These will include weight, engine model, engine displacement, transmission, brakes, shock absorbers, induction system, body work and overall appearance.

If you believe your car qualifies, please notify the Car Preparation Steward and provide such documentation as necessary to show period preparation. Schedule a time for inspection at one of the future race events and then have the car weighed on the VSCDA Scales. Bring a copy of the weight ticket to the inspection.

## **12. Eligibility of Replica and Continuation Cars**

These cars are not normally accepted for racing at VSCDA events. However a high quality car may be accepted to promote the sights and sound of vintage and historic racing. VSCDA will consider cars when the owner requests eligibility, and fully documents the specifications. The “Replica Car Policy and Approval Form” is located on the web site in the Tech and Car Preparation section.