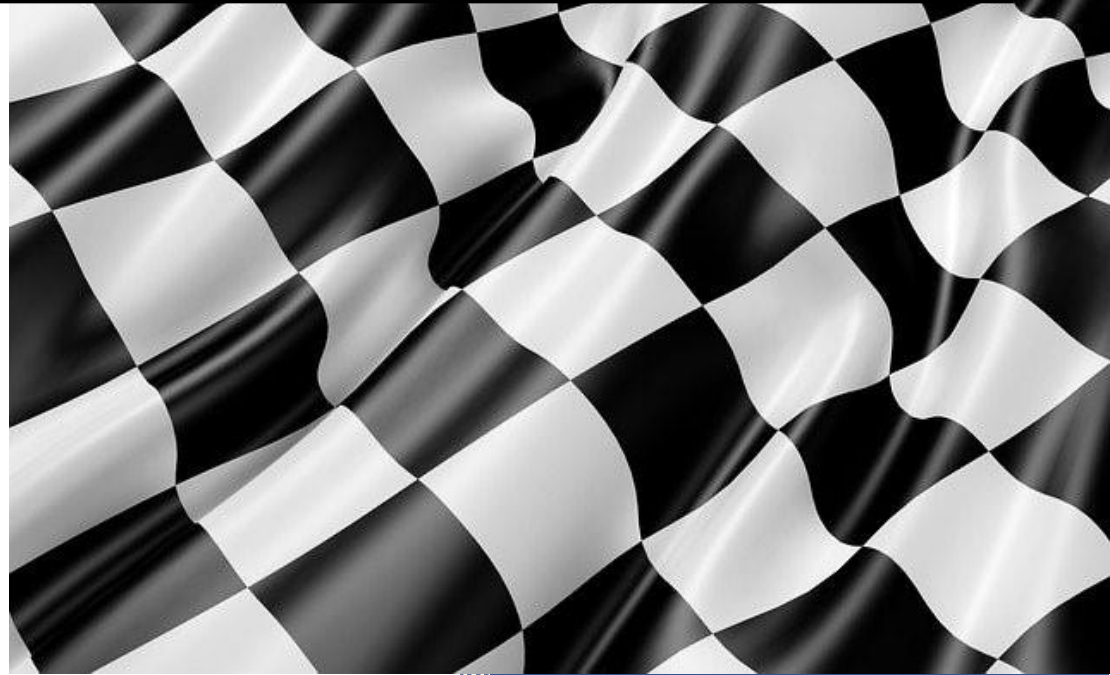




2022

National Challenge Standing Supplementary

SAMCAR V8 Supercars Championship



Version 1

1 January 2022

Ref: 162565

REVIEW AND AMENDMENTS

Motorsport South Africa (MSA) will periodically review these rules and will present the revised version to all members for agreement to publish the updated version.

Amendments and updates to the rules will be recorded in the Amendment Record, detailing the updated version, date of approval of the amendment and a short summary of the amendment.

AMENDMENT RECORD

<i>Modified SSR / Art</i>	<i>Date Applicable</i>	<i>Date of Publication</i>	<i>Clarifications</i>

1. CONTROL

These regulations are drafted by the SAMCAR committee in consultation with the series sponsors and drivers for final approval and publication by MSA. MSA shall have overriding authority in all aspects of the event

2. DEFINITIONS

- 2.1 SAMCAR V8 Supercars are cars which comply with these regulations and the term may not be used for any other car competing under the control of MSA.
- 2.2 The Technical Committee will be responsible for determining the eligibility of vehicles as described in paragraph 3 and the application of the control parameters outlined below in paragraphs 2.2.1 – 2.2.3
 - 2.2.1 Base weight. (see 6.2.2.)
 - 2.2.2 Engine rev limited.
 - 2.2.3 Number of tires per event.
- 2.3 Series Production Super Car – are cars with two (2) or four (4) doors manufactured in numbers exceeding 1000 unit per annum including all model variations.
- 2.4 “Wheels” – comprise of the rim and tire assembly.

3. ELIGIBILITY OF CAR

- 3.1 Each competing vehicle will be subject to an inspection, which will cover general compliance, safety requirements, finish and appearance. This inspection will be carried out by the Samcar Technical Committee. Successful completion of this inspection will result in the issue of a logbook, without which the car cannot be raced in the series. Subject to 14 day notice in writing, this logbook may be withdrawn if the standard of turnout of the vehicle falls below the acceptance limit.
- 3.2 The engine must be a product of the corporation of the make of car being used in competition. The engine must have an Engine Acceptance Document (EAD) issued by Samcar prior to competing in the series.
- 3.3 The engine must be based on a series production car V8 engine. Maximum capacity for 8 cylinder 2-valve engines is 6 litres plus 2.5% dispensation (compression ratio must stay on 12:1)
- 3.4 Cars must be constructed using a body style the same as that of any series production GT (Grand Turismo) two door coupe or GTS (Grand Turismo Sport) four door sedan car produced anywhere in the world.

- 3.5 Chassis must conform to basic design, technical and safety parameter as specified by Samcar. Technical drawing and specifications must be submitted to Samcar for approval. Only chassis builders approved by SAMCAR will be permitted to construct chassis eligible for the series.
- 3.6 Manufactures models and body styles eligible for the event must be approved by Samcar
- 3.7 Commercial vehicles are not eligible.

4. AIM OF THE CHAMPIONSHIP

The aim of the championship is to declare a National Challenge Samcar V8 Supercars Champion.

5.1 CHAMPIONSHIP POINTS

- 5.1.1 All races will count towards the final championship standings. (Appendix1 section 3)
- 5.1.2 Only classified finishers will score points.
- 5.1.3 Double points will be scored for away races.
- 5.1.4 Points will be scored as follows:

1 st - 25	7 th - 8
2 nd - 21	8 th - 6
3 rd - 18	9 th - 4
4 th - 15	10 th - 3
5 th - 12	11 th - 2
6 th - 10	12 th - 1

6. MODIFICATIONS

6.1 General Specifications:

The intent of the following regulations is to maintain the recognizable external features of the manufacturer’s model while providing the necessary safety and performance modifications.

6.2 CHASSIS:

6.2.1 Chassis configuration will be full-frame, providing all suspension mounting points, front engine, rear-wheel drive and front-wheel steering. The chassis must be completely constructed of steel tubing. The use of monocoque or semi-monocoque construction is prohibited. The chassis must incorporate a full roll cage, including driver side impact bars. The roll-cage must be a fully welded, integral part of the chassis. Carbon fibre, composite type materials are not permitted in any structural components. The floor in the driver/passenger compartment must remain flat and horizontal, relative to the car and rocker panels. It may not be curved, angled or recessed and must be made of steel and/or aluminium only. The driver/passenger floor shall be flat between the trailing edge of the front wheels and leading edge of the rear wheels and be flat across the total width of the car as raced. The floor of the car from the leading edge of the rear wheels must be flat across the total width of the car but may be angled upwards to meet the lower section of the rear bumper.

Dimensions and Specifications: Chassis base main frame rails: Minimum 44.5 x 44.5 x 2.0 mm square tubing or 40.0 x 60.0 x 2.0 mm rectangular tubing. Chassis upper main frame and vertical elements: Minimum 44.5 x 44.5 x 1.6 mm square tubing. Roll cage main frame: Minimum 44.5 x 2.0 mm or 50.8 x 1.6 mm round tubing. Roll cage secondary elements: Minimum 32.0 x 2.0mm or 38.0 x 1.6 mm round tubing. Driver’s side impact bars: Minimum 32.0 x 2.0 mm or 38.0 x 1.6 mm round tubing. Maximum wheelbase – 2625 mm. Maximum width measured at the wheel’s rim edge – 2050 mm plus 1% dispensation. Maximum overall body width – 2060 mm. Minimum height of roof from road – 1150 mm.

6.2.2 Cars must weigh a minimum of 1240 kg including the driver. For weighing purposes competitors must be seated in the car, with seat belts fastened, and the required race wear must be worn. Cars will generally be weighed after each race but they may also be weighed at any other time at the discretion of the Technical Consultant.

6.2.3 Front bumper fitment dimensions: The centre line of the front wheels to the leading edge of the splitter may not exceed the following dimensions: Chevrolet Corvette cars: 1140 mm Ford Mustang cars: 1130 mm Jaguar: 1080 mm Ford Falcon: 1260 mm Chevrolet Lumina cars: 1260 mm 4.2.4 A front diffuser may be fitted with a single element on either side of the front splitter. The maximum allowable height from the bottom face of the splitter to the upper edge of the ramp may not exceed the following dimensions:

- Chevrolet Corvette: 200 mm
- Ford Mustang: 200 mm
- Jaguar: 200 mm
- Ford Falcon: 170 mm

Chevrolet Lumina: 170 mm

- 6.3 Fire Walls: There must be a firewall between the engine compartment and driver compartment, made of steel and/or aluminium.
- 6.4 Bulkheads: There must be a steel and/or aluminium bulkhead separating the driver compartment from the compartment containing the fuel tank cell. All interior panels may be made from aluminium or composite material.

6.5 **BODYWORK:**

- 6.5.1 SAMCAR approved bodywork:

2000 - Chevrolet Camaro

2002 – 2004 Chevrolet Corvette C5 2005

present Chevrolet Corvette C6

2005 – present Ford Mustang

2008 Jaguar XKR

2008 – present Jaguar XKR ,

present SAMCAR Chevrolet Lumina (as approved)

present SAMCAR Ford Falcon (as approved)

Holden is excluded

Competitor wishing to use a different body style must obtain prior approval from Samcar.

- 6.5.2 **Body:** The external shape of the body cannot be changed except where specifically authorized. The original roof line from and back window angle must be maintained within $\pm 1^\circ$ tolerance when the race car and a standard road car are compared. The original silhouette front bumper to grill to bonnet to front windshield to roof and back window to boot lid to rear bumper must be maintained.

Passenger compartment door windows must remain open. No poly carbon windows may be fitted. Both passenger and driver windows must remain open at all times during a race or practice. The only deviation of the silhouette will be to allow a power bulge in the bonnet to accommodate the air cleaner housing. The overall length of the car must conform to the approved bodywork specifications for the model plus the front spoiler allowance of 100 mm. The measurement from the centre line of the front axle to the leading edge of the spoiler will be specified by SAMCAR. Wing extensions must completely cover the wheels as viewed from above and may not confuse the identity of the car. Cars must have the original tail lamps and radiator grill or sticker replicating the original radiator grill and headlamps and front indicator units, either original, replicas or stickers replicating the original headlamps or indicator units, must be in place but need not necessarily be functional. Templates may be used to check body profiles.

- 6.5.3 **Front Spoiler:** The fitting of a front spoiler is permitted. The front spoiler must be of the air dam type, and must follow the shape of the front bumper as viewed from above. The front spoiler may not protrude beyond the bumper line by more than 100 mm at any point or extend sideways beyond the front wing extensions. The front spoiler under tray must be flat and horizontal to the driver/passenger floor. The front spoiler extensions cross sectional measurement from the under tray to the upper surface may not be less than 20 mm. The front spoiler under tray may have a 50 mm radius blending into the front inner wheel arch. The radiator air intake duct, brake cooling ducts and engine air box ducts may be located in the front spoiler below the bumper line, providing that the total air entry area below the bumper line does not exceed 2000 mm². The ramps which run from the upper surface of the front spoiler extensions and blend into the wing extensions are permitted, providing the area between the ramp and the spoiler extensions is enclosed. The upper surface of the ramp may not have any side fences. Samcar approved canards/wicker plates are permitted to be fitted in the front of the vehicle.

- 6.5.4 **Splitter:** A front bottom/flat splitter/undertray with a 50mm radius curve is permitted to vent through the radiator, via a chimney protruding through the bonnet. The hole in the bonnet may not exceed 1200mm². Venting through the radiator, via a chimney through the bonnet will be disallowed if there is any other form of modification in point 6.5.3 above., for example for the fitting of a Samcar control front diffuser

- 6.5.5 **Rear Diffuser:** The fitting of the rear diffuser will be a controlled diffuser and it must be Samcar approved. The fitting of a rear diffuser is optional. The Samcar approved diffuser may extend the rear bumper by 100 mm on all cars.

- 6.5.6 **Extraction Hole:** An extraction hole is permitted on the rear of the vehicle between the taillights, provided the hole is not larger than 350cm².

- 6.5.7 **Air Vents:** Two aluminium air vents (300mmx180mm) may be fitted above the front wheels.

- 6.5.8 **Rear Wing:** The fitting of a rear wing is permitted and must be mounted so as to comply with the following: The highest point of the wing, excluding the end plates, may not be higher than the roof of the car. The maximum width of the wing (endplate to endplate) may not exceed 2050 mm. The trailing edge of the wing, excluding the end plates, may not extend rearward beyond 1165 mm behind the centre line of the rear axle.
- 6.5.9 The ducting of air to the air cleaner on the Corvette will be via a duct 30 mm below the split of the bonnet to the front bumper. The template for this cut out is available from Samcar.
- 6.6 **Jack Points:** The installation of on-board jacking systems is permitted.
- 6.7 **Towing Eyes:** All cars must have permanently installed towing eyes, one front and one rear, to be used for flat-towing the vehicle. These towing eyes must be easily accessible without removal or manipulation of bodywork, and must remain within the perimeter of the bodywork when viewed from above. Front-facing towing eyes may be attached to the roll cage on the roof of the car due to the light manufacture of the front bumper frame.
- 6.8 **Fuel Tanks/Cells:** A safety fuel tank/cell must be located behind the rear axle. Proper bracing is required to protect the fuel tank/cell in the event of a rear end crash. All fuel caps must have a minimum of a 3 mm hole in the cap and a bracket attached to the tank or filler pipe to facilitate the lock-wiring of fuel caps.
- 6.9 **Suspension:** General Suspension shall be coil over design. Titanium springs are prohibited. Suspension mounting points shall be incorporated in the chassis framework. Suspension components shall be heavy duty, reinforced, modified or racing design. Any device that permits changing the cars ride height during competition is prohibited. Hubs, bearings, spindles, axles, u-joints, and rod ends must be heavy duty or racing type. Aluminium spindles or rear axle tubes are not permitted. Active suspension systems, driver or computer controlled shocks and ASSR traction control are specifically prohibited.
- 6.10 **Front Suspension:** Only basic double wishbone type front suspension, incorporating coil over shocks may be used. The coil over unit must act directly on the lower control arm. The maximum length of the front element of the lower control arm measured from centre to centre of the rose joints, may not exceed 500 mm. The front upright must be a fabricated component constructed from sheet steel and tubing welded together.
- 6.11 **Rear Suspension:** Only basic type live solid axle, three or four bar link, with parallel radius rods, coil over shock with lateral location by watts linkage is permitted. The radius arm lengths, measured from centre to centre of the rose joints, may not be longer than half of the wheelbase.
- 6.12 **Anti-Roll Bars:** One front and one rear anti roll bar are permitted. The anti roll bar must act directly on the upper or lower wishbone or rear axle housing using a simple pushrod system. Cars may use cockpit adjustment for the front and rear anti roll bars.
- 6.13 **Shock Absorbers:** Shock absorbers are a controlled component and only PENSKE 7300 and 7800 plus 8100 and 8300 series shock absorbers and canisters including series 8660 canisters are eligible. PENSKE 8300 series shock absorber will use the matching canister part number P-PS-8300-CD PENSKE PS 8760-RM canisters may be used but will carry no weight penalty. Only four shock absorbers are allowed per car. Shock absorbers may have one remote canister per shock absorber. Shock absorbers may have any form of spring seat adjustment. Damping Adjustment: Shock absorbers may have dual adjustment facility allowing simultaneous or individual adjustment of bump and rebound. The shim stack and gas pressure settings are unrestricted. Shock absorbers may only be fitted with one of the PENSKE pistons as listed below:
Linear/Linear Part Number: PI-1100 PI-1200 PI-2100 PI-2200 Linear/Digressive Part No: PI-DL00 PI-oo5-1DG VDP piston Part Number: P1-VP5 P1-VDPL55 2 degrees P1-VDPL55 1 degree
Cars may use BILSTEIN shock absorbers: Linear/Linear Part Number: B46-BRK Linear/Digressive Part Number: B46-V38 Digressive/Digressive Part Number: B46-699A (Either face of this piston can be used for rebound or compression face) Digressive/Digressive Part Number: B46-7028A (Either face of this piston can be used for rebound or compression face) Locally produced SACHS Shock absorbers may be fitted.
- 6.14 **Engine Mounts:** The engine must be located along the centre line of the chassis, within 25 mm. The crankshaft centre line to ground measurement must not be less than 190 mm. The position of the engine rearward relative to the centre line of the front axle may not be more than 50 mm from the face of the foremost cylinder head.
- 6.15 **Propshaft:** Only a heavy duty one piece steel propshaft is permitted. A minimum of one steel 'loop' is required, located within 300 mm of the front universal joint to contain the propshaft in the event of a U-joint and/or propshaft failure.
- 6.16 **Rear Axle:** Only live solid axle, utilizing steel banjo housing is allowed. Aluminium tube axle housings are not permitted. Only Detroit-locker differentials will be permitted. Final drive ratios are restricted as follows:
Eight cylinder two valve engines: 3.89 3.70 3.50 3.25 4.1 4.3
- 6.17 **Brakes:** The braking system is free except for the following:
- 6.17.1 Separate master cylinders front and rear are required and must be operated by a single brake pedal.
- 6.17.2 Brake calipers are free or restriction but are limited to one unit per wheel.

- 6.17.3 Non-metallic brake discs are not permitted.
- 6.17.4 ABS anti-lock systems are not permitted
- 6.17.5 Ducting of air is the only type of cooling permitted
- 6.17.6 Parking brakes are not required.
- 6.17.7 Brake lines must be steel tubing or metal-braided hose.
- 6.17.8 Brake balance is restricted to adjustment by the driver of a pedal box balance bar and inline pressure restrictor control

7. **WHEELS AND TYRES**

Supplier of Goodyear Tyres will be available through **TIRACE RACING TYRES CC.**

Wheel rim diameter must be 16 inches.

The supply of racing tyres will be controlled and supplied to competitors as per the 2022 Tyre schedule.

7.1. **RACE TYRE ALLOCATION**

Each competitor may purchase 4 NEW TYRES for the first event, and thereafter 2 tyres per race event.

At the midseason or for an agreed special race event, a competitor may purchase 4 NEW TYRES, and thereafter 2 tyres per event. All midseason and special race event tyre allocations must be agreed by the committee.

In the case of a new driver to the series or a current driver with a new car they may purchase 4 new tyres for testing.

7.2. **MARKED RACE TYRES**

Competitors must use any previously marked race tyres in official practice and at an event. Only officially marked race tyres may be used for official qualifying and all races. If a driver does not take part in official qualifying or race in heat 1 or heat 2 at an event, the driver will carry over the marked race tyres allocated forward to any race meeting.

7.3. **PRACTICE TYRES** may be purchased from Tirace,

7.4. **WET WEATHER TYRES**

Four wet weather tyres per season may be purchased from Tirace at the discretion of the competitor. Competitors are permitted to use Goodyear cut (Intermediate) tyres. Any make of wet weather tyres are permitted.

7.5. **Replacement Tyres:**

Replacement of damaged tyres will be at the discretion of the Samcar Technical Consultant/Committee. All tyres must be submitted to the designated Tyre Scrutineer for marking prior to the start of qualifying. Any car found to have an unmarked race tyre or tyres on it during qualifying or the race/s, will be excluded from all results for the event. Should there be special circumstances, where a tyre needs to be substituted, competitors will be penalised as follows:

Substituted with a better used tyre – 5 seconds penalty on the overall time or a 3 position grid drop.

New tyre – 10 seconds penalty on the overall time or a 5 position grid drop.

7.6. **Control Tyres Sizes:**

Goodyear Tyres Front: D4533 SPORTSCAR RADIAL 25.5 x 14.0 x 16 R430 & R250 Compound

Goodyear Tyres Rear: D4534 SPORTSCAR RADIAL 28.5 x 14.5 x 16 R430 & R250 Compound

Only **Goodyear** tyres are permitted. **NO** other brand of tyre will be allowed.

7.7. **Tampering:** Filing, buffing or any other disguising of the tyre sidewall is prohibited. Tyre warmers, chemical treatment or any means to artificially enhance tyre performance is prohibited. Any driver or vehicle found with tyre tampering, will be excluded from all results for the event.

8. **GEARBOX**

Four forward speeds and a reverse gear. The gearbox must be mounted directly on to the engine via a bell housing/adaptor assembly. This bell housing/adaptor assembly must not exceed 200 mm in length. The Samcar control sequential shift mechanism is permitted, no electronic or hydraulic shifter is permissible. Samcar approved transmission JERICO Transmission ratios are controlled and only a final ratio as specified may be used. 1st Gear Ratio 1.63 2nd Gear Ratio 1.33 3rd Gear Ratio 1.13 4th Gear Ratio 1.1

9. **ENGINES**

- 9.1 The engine block must be of the manufacturer's production or a Samcar approved heavy-duty version. The block may be bored and or sleeved. Crankshaft main bearing caps may be substituted. No angled machining of the deck surface is allowed. Blocks must be of the same material as the production engine.
- 9.2 Crankshaft The crankshaft is unrestricted provided the angles of the crank throws remain the same as the production crankshaft. Minimum mass as per E.A.D.
- 9.3 Connecting Rods The connecting rods are unrestricted provided they are made of steel.
- 9.4 Pistons Any aluminium alloy pistons may be used.
- 9.5 Camshafts the position of the camshaft/s as well as the firing order must remain standard. The camshaft/s is a controlled component and only the camshaft/s specified in the E.A.D. is permitted. Any cam followers may be used. Camshaft/s operation may not include any mechanism to vary the valve timing.
- 9.6 Cylinder Heads The cylinder heads must be of the manufacturer's standard production or a Samcar approved replacement. Valves must be steel. Valve springs are unrestricted but must be conventional steel coil springs. Specification and standardization must be in accordance with the E.A.D.
- 9.7 Intake Manifold Intake for carburetted engines must be of the manufacturer's standard production of Samcar approved as per the E.A.D. and available to any competitor.
- 9.8 Dry sump systems are required. The oil pump must be mechanically driven by the engine.
- 9.9 Clutch and Flywheel The clutch unit is unrestricted but no carbon type clutches are permitted. The Flywheel must be manufactured of steel.
- 9.10 Exhaust manifolds are unrestricted providing the system terminates in a single outlet pipe.
- 9.11 Any fuel pumps may be used.
- 9.12 The water pump must be fitted in the standard position and mechanically driven by the engine.
- 9.13 The distributor must remain in the standard position and must maintain the same firing order as the factory produced engine.
- 9.14 Compression Ratio as per E.A.D. (Chevrolet and Ford is 12: 1)
- 9.15 Balancing and finishing of components are free.
- 9.16 The following components are not restricted: Rings, bearings, gaskets, bolts, studs, nuts, pulleys, belts, filters and spark plugs.
- 9.17 Carburettor Engines are restricted to one Holley model 4150 series HP four-barrel carburettor, or aftermarket 4150 series HP four barrel carburettor (approve by Samcar) The maximum venturi diameter is 35 mm and the throttle bore 44.5 mm. The carburettor spacer may have a maximum thickness of 25.4 mm.
- 9.18 Ignition System Rev Limiter: All engines must have a MSD ignition system providing a rev limiter facility. Cars with 2 valves per cylinder engines will have maximum RPM limited to 7200 rpm.
- 9.19 Final control of engine performance will be based on the air intake restrictor system. The air intake restrictor size for each engine type eligible for the series will be indicated on the E.A.D.

10. OIL CATCH TANKS

Engines must be fitted with an oil catch tank so as to prevent spillage of oil onto the track. These catch tanks must be constructed of translucent material or be fitted with a translucent panel in order to gauge the contents and they must be empty at the start of the race. Minimum capacity is 4 litres. (SSR 70 refers)

11. RADIATORS Not older than five %

Radiators and cooling fans for the cooling of water, engine oil and transmission oil are free of restriction provided that the basis location of the engine water radiator is not changed. The ducting of air from the back of the water radiator is permitted.

12. FUEL

Fuel must conform to the specifications as described in GCR 240. Competitors must use a controlled octane booster (VP/Torque) to increase the octane of the base fuel, and not to exceed 102.6 octane. Control fuel of the same brand used by the competitor may be supplied by Samcar for use at a race meeting (official timed practice and race/s) during the course of the season. Competitors may use Avgas fuel with VP/Torque octane booster. Fuel may not have a higher density reading than 87.5.

12.1 Fuel testing/sampling for analysis purposes in accordance with GCR 240 and SSR 67 and 70, is at the discretion of the Technical Committee., In conjunction with MSA

13. EXHAUST

A gas-tight exhaust system must be fitted and must not extend more than 10 mm outside the bodywork and must not be directed at the floor of the car (i.e. it may not terminate in a position, which will cause fumes or excessive heat to enter the car). The exhaust may pass through the passenger compartment provided it is completely sealed from the passenger compartment by a tube or tunnel. The exhaust system shall be fitted with an effective silencer. The noise emitted from the system must not exceed 110 DB at 3500 RPM when subject to the test procedure as prescribed by MSA.

14. ELECTRICAL EQUIPMENT

The electrical equipment, including batteries, wiring and charging equipment, is free of restriction provided that:

14.1 The battery charging equipment must be operating at the start of the race.

14.2 The starter must be capable of starting the engine at the start of the race.

14.3 Brake lights must be in working order.

15. GENERAL

15.1 Any approved driver seat may be fitted.

15.2 A safety harness with a minimum of 5 mounting points must be fitted. Not older than five (5) years from date of purchase/ after expiry date (GCR 239 refers)

15.3 Safety apparel such as clothing/overall must be embroidered with drivers name and blood group as per GCR 239

15.3 Any steering wheel may be used.

15.4 The dashboard is unrestricted and any instruments may be fitted.

15.5 The front windshield may be replaced with a polycarbonate (Lexan) material conforming to the stock windshield dimensions and of a least 5 mm thickness. The windshield below the bonnet line may be cut so as to provide clearance for mechanical components. Side and rear windows may be replace with windows made of clear polycarbonate (Lexan) material of at least 2 mm thickness.

15.6 All windows must remain transparent over at least 75% of their area. The side window on the driver's side may be removed completely but it is recommended that a safety net be utilized.

15.7 Electrical cable and fluid pipes routed through the passenger compartment must be adequately insulated and meet the necessary safety requirements.

15.8 Data logging of car and driver performance is permitted. Any combination of the following specified parameters may be logged during unofficial practice, official practice, qualifying and during races. Engine: oil pressure – oil and water temperature – fuel pressure and temperature – exhaust gas temperature (maximum two cylinders) and single lambda reading – battery voltage – RPM. Transmission: Gearbox and differential temperature. Chassis: vehicle speed through GPS input – vehicle speed through input from single RPM – sensor mounted on the prop shaft – lateral, longitudinal and vertical G-forces – steering input – throttle position – front and rear brake line pressure – ambient temperature – barometric pressure – lap times.

15.9 All cars must have an on-board fire extinguishing system with a minimum capacity of 2 kg. Nozzle outlets must be located in the driver compartment as well as engine and fuel cell compartment. The extinguisher triggers must identified with a red "E" or an approved fire extinguisher sticker and be accessible to both rescue personnel and the driver. Fire extinguishers must be in good working order and reflect purchase/service within past 12 months (GCR 257)

15.10 Provision for sealing of engines, transmissions and final drive for technical inspection: Engine – Cross-drilling of two intake manifold bolts and two oil pan bolts. Transmission – Two of the top cover bolts cross-drilled. Differential – Two centre portion to banjo housing bolts cross-drilled.

APPENDIX 1
SAMCAR V8 SUPERCARS

POINTS SYSTEM FOR 2021

1. ELIGIBILITY

- 1.1 Cars eligible to compete in the V8 Supercar championship are as described in the SAMCAR V8 Supercar Regulations
- 1.2 The Championship is open to all holders of valid Regional, National or International competition licences issued by Motorsport South Africa.
- 1.3 Drivers must satisfy both MSA and SAMCAR V8 Supercars as to their previous racing experience. The minimum in this regard shall normally be successful participation in at least two regional events (SSR-1)
- 1.4 Any driver wishing to make a “once-off” appearance in the series shall be required to obtain the prior written approval of the Committee. Such approval may be withheld in circumstances where it is felt that the intended participation will not be in the interest of the series or those of motorsport in general. In the event of a dispute MSA shall make the final ruling. Drivers making a “once-off” appearance shall not be eligible to score championship points and shall also be responsible for payment of their own entry fees. Drivers making a once-off appearance must be a member of Samcar. Drivers by invitation of Samcar making a once-off appearance will not score points. All competitors entering the last event of the racing season, and who have not competed in previous races for the season will start both heats from the back of the grid.
- 1.5 The organizers or association reserve the right to refuse an entry should they determine that the vehicle or the driver does not uphold the status of the championship.

2. AIM OF THE CHAMPIONSHIP

The aim of the championship is to declare a South African National Challenge V8 Supercar Champion which shall be the competitor who scores the most points during the season.

3. CHAMPIONSHIP POINTS

- 3.1 The championship will consist of one class of Samcar V8 Supercars.
- 3.2 All races will count towards the final championship standings but only classified finishers will score points.
- 3.3 A champion will only be declared where there are at least 10 starters in the class for at least 60% of the scheduled events (refer GCR 230, GCR 274 and SSR 82(i))

3.4 Points scoring

1 st	-	25 points	Bonus Points – Overall	1 st	-	5 points
2 nd	-	21 points		2 nd	-	3 points
3 rd	-	18 points		3 rd	-	2 points
4 th	-	15 points				
5 th	-	12 points				
6 th	-	10 points				
7 th	-	8 points				
8 th	-	6 points				
9 th	-	4 points				
10 th	-	3 points				
11 th	-	2 points				
12 th	-	1 point				

- 3.5 The **pole position** holder in heat one of the first (or only) race will receive **one point**.
- 3.6 The driver setting the **fastest race lap of the day** will be awarded **one point**.

- 3.7 Bonus points, **for overall**, scored in terms of the above Articles 3.5 and 3.6 shall be scored separately to points scored according to finishing positions in races. (See 3.4 above)
- 3.8 Competitors attending noggins will receive **one bonus point**. Competitors residing further than 200 km, will automatically receive one bonus point.
- 3.9 **Separation of Ties:** The competitor with the greater number of first place points in all championship races (not race meetings) will be declared the champion. If this does not resolve the tie then the greater number of seconds, failing this, thirds and so on will be used to resolve the tie. If a tie still remains, then MSA will declare a winner on such basis as it deems fit.
- 3.10 **DOUBLE POINTS** will be scored at the away races, discretion of the Samcar Committee
- 3.11 **PENALTY POINTS:** Points can be deducted, in discussion and agreement either verbally or in writing with the driver concerned, by the appointed SAMCAR Technical Consultant and or his committee, who are responsible for all Technical aspects of the category, and for any infringements of the Samcar Rules Regulation and Specifications (as published by MSA). The Technical Consultant and or his committee decision is final.
- 3.12 **Trophies** will be awarded, annually, by SAMCAR V8 Supercars, to those competitors finishing first, second and third overall in the championship.

4. RACE SPECIFICATIONS

- 4.1 **Race Duration:** Each race meeting or round of the Championship will generally consist of two separate races. With Race 1 being a minimum of 8 laps and Race 2 a minimum of 10 laps (SSR 82 (iv))
- 4.2 Races have a Rolling Start
- 4.3 Refer SSR 82 (iv) with the exception that the maximum race distance contained in this regulation shall not apply.
- 4.4 Grid positions for the races shall be irrespective of class and shall be determined by a competitor's fastest lap time in official qualifying.
- 4.5 With reference to SSR 29, grid positions for Race 2 at an event will be determined according to a competitor's fastest lap time in Race 1, except that the winner of Race 1 will start at the back of the inverted grid. Race 2 will have the front portion of the grid inverted. Race 2 should be a minimum of 10 laps
- 4.6 Competitors posting a lap time no more than 2.5% slower than the fastest lap time by class in Race 1 will be included in the inversion. The last competitor to post a time within the 2.5% cut-off will take up the pole position in Race 2 for with the inverted grid competitors following from slowest to fastest. Competitors not qualifying for the grid inversion shall start in fastest lap order from behind the last car in the inverted grid. Any competitor failing to post a time in Race 1 shall be required to start race 2 from the back of the class. In the event of there being more than one such competitor, the order between them shall be at the discretion of the Clerk of the Course acting in consultation with the official category representative/s.
- 4.7 The addition of fuel or any other item/substance that affects the weight of a car during a qualifying session is expressly forbidden. Contravention of this regulation will result in the offending driver's recorded lap times during the qualifying session being disallowed. Notwithstanding the provisions of SSR 27, the following 'qualifying percentage' will apply: Competitors will be required to post a lap time within 102.5% of the fastest qualifying time in the class.
- In the event of a competitor not recording a qualifying lap time in the official qualifying session, a lap time recorded during any one of the official practice sessions (including the race morning warm-up) will be taken into consideration for the purposes of qualification. However, should any such lap time allow the competitor to fulfill the qualifying requirement, he shall still be required to start from the back of the class. Should a competitor fail to achieve the qualifying percentage by the end of the warm-up session, he will not be permitted to take part in either of the scheduled races.
- 4.8 All qualifying sessions shall be a minimum of 20 minutes.
- 4.9 The 'white line rule' envisaged in SSR 50 (i) shall apply, at agreed circuits, in the Championship.

5. NUMBERS, SPONSORS, ADVERTISING AND OTHER MARKINGS

- 5.1 The proper display of all sponsor decals ON BOTH THE RACECAR AND SAFETY APPAREL is an eligibility requirement for all entrants in the championship. Decals must appear as specified and compliance is mandatory. Failure to comply will result in exclusion from the race/s concerned. Sufficient contrast must be maintained between the logo and the background. Series sponsor cloth badges supplied must be displayed on the drivers' overalls.
- 5.2 Numbers supplied by V8 Supercars must be displayed on all competing cars as specified. No decals to be defaced in any way. Black numbers with a white border will be supplied by V8 Supercars.
- 5.3 At the discretion of the Samcar Committee/Technical Committee the addition of a small number may be displayed on the top left hand corner of the windscreen, as specified and one small number displayed on the rear window top left or top right, as specified. This number shall also be supplied by V8 supercars.
- 5.4 Every car is to display the **surname and blood group** of the driver on both sides of the vehicle at all times. Upper case letters of Arial font and 70 mm high must be used. (GCR 239 refers)
- 5.5 The above are all in accordance and agreement with V8 Supercars Drivers Contract.
- 5.6 GCR 249 and SSR 4 refers. Numbers shall be 110mm X 200mm x 30mm.

6. GRID PENALTIES

- 6.1 In addition to the penalty provisions contained elsewhere in the general motorsport regulations, the Clerk of the Course shall be empowered to impose grid penalties for subsequent events on competitors who infringe the rules. A minimum of a 5 place grid penalty will generally apply in this regard but harsher penalties (up to a penalty of preclusion from participation in future events) may be applied in more serious cases.