



The Trinidad and Tobago Rally Club

Vehicle Regulations

Radical Cup

Version 1.2

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Introduction

The Trinidad and Tobago Rally Club (TTRC) is a non-profit motorsport club located in the Caribbean Island of Trinidad & Tobago. The club was founded in 1977 and is the NGB (National Governing Body) for the sport of rallying in Trinidad & Tobago, and is the sole local body recognized by the Ministry of Sport and Community Development of the government of Trinidad & Tobago.

What do we do?

The conducts:

- The organization, execution and supervises Treasure Hunt events.
- The organization, execution and superintends Stages Rallying
- The organization, execution and superintends training of marshals for the sport.
- The organization, execution and superintends the development of drivers/Co-Drivers

The following safety regulations were developed to promote fun, fair and safe competition. If you encounter any issues such as spelling or grammatical errors or a dispute, please don't hesitate to notify a member of the TTRC Executive Committee, and we will gladly address them as needed.

Unless a modification is otherwise stated within this rule book, then the modification is strictly not allowed. Anyone can contact a TTRC Executive Committee member for confirmation.

These regulations will be in effect from 1st April 2024.

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TECHNICAL REGULATIONS

INTRODUCTION

All the modifications which are not allowed by the present regulations are expressly forbidden. The only work which may be carried out on the car is that necessary for its normal servicing, or for the replacements of parts worn through use or accident. The limits of the modifications and fittings allowed are specified hereinafter. Apart from these, any part worn through use or accident can only be replaced by an original part identical to the damaged one.

The Radical Cup is a 'single-brand' race series, for competitors participating in the following class:

SR3 Class: 1500 SR3 RSX
 1500 SR3 RS
 1340 SR3 RSX
 1340 SR3 RS

Each Radical model is manufactured to an identical class specification. In the interests of fairness and safety, competitors may not depart from this specification under any circumstances, other than as specified below.

All Radical parts must be supplied by Radical Sportscars, fitted in their original position and as supplied, unless specifically stated in these regulations. Parts may only be fitted to the appropriate designated model.

Whilst the Scrutineer is empowered to check all competing vehicles for compliance and has been provided with the data to determine the continuing eligibility of each car, the onus of responsibility for the eligibility of vehicles competing in this event, rests with the entrant/Competitor. In the event of a dispute concerning the compliance of a vehicle with these Regulations, the onus will be on the Entrant/Competitor to satisfy the Organisers with regards to such compliance, and NOT the organisers to prove non-compliance.

Where it is suspected that a component or structure fitted to the competing vehicle, may render the vehicle ineligible under these regulations, the component or access to the component will be sealed by the Scrutineer for subsequent examination. Where ineligibility is subsequently proven, all points accrued by the competitor from and including the date of sealing the said component, to the date of the examination, shall be forfeit (C3.4). **(C3.4 - Competitors whose vehicles are subject to a pending eligibility check must advise this fact in writing to the Race Control of any event. Failure to inform the Race Control will result in disqualification.)**

Where costs are incurred as a result of any eligibility check, as may be reasonably requested either by the Scrutineer or the Event Organisers, these will be borne by the Competitor/Entrant concerned.

Any infringement of these Technical Regulations will render the competitor liable to penalties.

GENERAL DESCRIPTION

The Radical Cup Class is a 'single-brand' race class for Radical race cars as specified herein.

General Technical Requirements and Exceptions.

DEFINITIONS: All references to standard parts and or materials in these regulations shall be taken as being the Radical Sportscars original specifications and drawings. In all cases of dispute, query or clarification or ruling these drawings and specifications shall be regarded as fact.

CHASSIS

Powder coated tubular steel space frame chassis with aluminium panels and integral roll over bar completely standard and unaltered. This includes thickness of panels and rivet spacing. Optional forward facing roll bar stays may be fitted.

Towing Point – There must be substantial towing eyes securely fixed to the main structure of the vehicle, front and rear, within the confines of the body to enable the vehicle to be moved. Towing eyes must have a minimum internal diameter of 60mm. Towing eyes/towing points should be painted a contrasting bright colour (dayglo red, orange or yellow, marked with an arrow and the word "tow"

The collapsible crash box structure supplied by Radical Sportscars must be fitted to the chassis during the event.

All Radical models are manufactured to a standard specification and may not be altered.

BODYWORK / AERODYNAMICS

Any aerodynamic device manufactured by Radical Sportscars for the particular model may be fitted as supplied, i.e. front splitter, front diffuser, dive planes, single plane rear wing, double plane rear wing, rear diffuser or roll bar fairing.

GROUND CLEARANCE: The minimum ground clearance is 40mm. Under no circumstance can any part of the bodywork, or of the suspended part of the car, be below a horizontal plane passing 40mm above the ground, the car being in normal racing trim with the driver aboard. A gauge of 40mm may be used by Scrutineers before or after any stage of the event to check the ground clearance. Location of ride height flat patch to be determined and communicated by the scrutineers at each event.

ENGINE

All engines must be for the specific models from factory.

SR3 Class S

RPE Suzuki 1500cc Generation 1 motor

RPE Suzuki 1500cc Generation 2 motor

RPE Suzuki 1500cc Generation 3 Short Stroke motor

RPE Suzuki 1500cc Generation 4 Long Stroke motor

The starter, generator and ignition system must be fitted as standard

COLLING SYSTEM

The oil and water radiators as supplied as standard must be retained. It is permitted to tape off the radiator to control the temperature.

INDUCTION SYSTEM

The entire induction system must be standard for the engine as sealed by Radical Sportscars. The standard air box and filter as supplied by Radical Sportscars must be retained and used.

Throttle body diameters must be as specified for the following engine variants:

- a) RPE Suzuki 1500cc Generation 1 motor – 42mm
- b) RPE Suzuki 1500cc Generation 2 motor – 42mm
- c) RPE Suzuki 1500cc Generation 3 Short Stroke motor – 45mm
- d) RPE Suzuki 1500cc Generation 4 Long Stroke motor – 45mm

Heat resistant tape may be applied to the air box.

EXHAUST SYSTEM

The exhaust system including silencer must be standard as supplied by Radical Sportscars for that model and generation. Insulation wrapping of the exhaust is not permitted. Ceramic coating is not permissible.

IGNITION SYSTEM

The standard Radical Sportscars ECU must be retained. It is not permitted to reprogram the ECU. The ECU must be in the position as supplied from the factory. Heat shielding of the ECU is free, but it must not restrict removal when required.

FUEL DELIVERY SYSTEM

The standard fuel pump as supplied by Radical Sportscars must be retained.

Heat shrink or heat insulation of fuel lines and wiring looms or wires may be fitted. This must be easily removable for inspection, if required.

WEIGHTS

Cars can be weighed at any time and must meet the minimum are pre class rules.

Cars will be required to meet the following minimum weights with finishing driver and driver equipment SR3 Class S: 700kg

SUSPENSION

All cars must be fitted with AVO or INTRAX shock absorbers supplied by Radical Sportscars. No internal modifications are permitted.

Spring rate front and rear are free. Alternative front and rear anti-roll links supplied by Radical Sportscars may be used.

The front and rear suspension is double wishbone. The front and rear suspension is fitted with the unique Nik-link anti-roll system.

TRANSMISSION

The standard integral 6-speed gearbox must be used.

The Radical Pneumatic paddle operated shift system may be fitted.

The reverse drive system as supplied by Radical Sportscars must be retained and operational by the driver when seated in the driving position at all times.

The final drive system must be standard as supplied by Radical Sportscars. Drive ratios may only be adjusted by changing sprockets/gears supplied by Radical Sportscars.

ELECTRICS

Exterior Lighting - Cars may run with or without the full lighting kit supplied by Radical Sportscars. Headlight covers must be fitted in either case. Brake lights must be fitted and in working order and must not be wired in a way that allows them to be switched off.

Rear Fog Warning Light - Radical Sportscars high intensity LED rear lamps must be fitted and be in working order. Two lights to be installed equi-spaced about the vehicle centreline, **or a single FIA centrally mounted light shall be installed.** Rear lights to be a minimum intensity of 21w with a surface area between 20 & 50cm².

Battery - An electrically powered starter motor, as supplied by Radical Sportscars, and battery are mandatory and must be operable by the driver when normally seated, and capable of repetitive starts.

Alternator - Must be standard as supplied by Radical Sportscars and be in working order.

Dashboard Instruments

- Only Data Loggers supplied by Radical Sportscars are permitted, however these will be used for drivers' guidance only. Official times will be provided by the event results. The scrutineer shall have access to data and data equipment.

BRAKES

The Radical 4-pot calliper front and rear, ventilated front and rear brake disc of 260mm (SR3 & SR3 RSX) diameter or an upgrade floating disc, 280mm supplied by Radical Sportscars may be fitted.

Only brake pads are free.

The fitting of a cockpit adjustable bias adjuster as supplied by Radical Sportscars is permitted.

The fitting of brake duct grilles is optional.

WHEELS & STEERING

3-piece or 1-piece wheels supplied by Radical Sportscars.

Maximum wheel size:

Front: 15" × 8"

Rear 16" × 10 ½"

Steering wheel diameters may be changed to suit driver preference and must be supplied by Radical Sportscars.

TYRES

Only tyres Control Slick Tyre: Radical Hankook F200 Race Tyre
C52 Compound. Sizes: 200/580R15 Front & 260/610R16 Rear.

Only tyres

Control Wet Tyres: Hankook Ventus Z207 Rain Tyre. Sizes:
200/580R15 Front & 260/610R16 Rear.

Dry & Wet weather tyre quantities are unrestricted.

All tyres must be checked by the Scrutineer, prior to the start of the event, or the first time of use.

FUEL TANK & FUEL

Type of Fuel Tank - The standard aluminium fuel tank or FIA fuel cell as supplied by Radical Sportscars for that respective model must be retained.

Pump fuel up to 95 Octane with no additives is allowed only.

Fuel used must be at Ambient Temperature

Each car must have a Radical Fuel Testing 'T' piece plus a Radical dry break valve fitted to the fuel line to facilitate safe fuel testing.