



2010 SWIFT SPORT RALLYCROSS CHAMPIONSHIP

Technical Regulations

The Following MSA Vehicle & Technical Regulations apply, according to the 2010 MSA Yearbook: Section J5, Technical regulations N6.1. to 6.14.3. and these supplementary regulations.

PLEASE READ THESE REGULATIONS THOROUGHLY. IF IT DOES NOT STATE YOU CAN, THIS MEANS YOU CANNOT. ANY DOUBTS, ASK.

For these regulations, **STANDARD** means: Series Production for the Eligible Vehicle Model ONLY.

1. VEHICLE

- 1.1 The Suzuki Swift 1.6 Sport VVTi (2005 onwards) is permitted.
- 1.2 Only the approved Safety and Performance parts are permitted. These parts to be supplied as a mandatory part kit (Appendix A).
- 1.3 The body shell must remain unaltered and as standard, excluding the MSA specification Roll Cage.
 - 1.3.1 The standard front upper bumper support must remain in position and as standard. The lower bumper support may be removed, but cannot be replaced with any other material.
- 1.4 All interior trim must be removed including carpets, roof lining, and passenger seats.
- 1.5 Interior door panels may be replaced with carbon panels to accommodate the roll cage.
- 1.6 Light weight doors are permitted. Lightweight bonnet, tailgate and wings are permitted.
- 1.7 All lights must be removed and the apertures blanked off, completely.

- 1.8 The original interior rear view mirror is mandatory.
- 1.9 Front and rear towing eyes are mandatory.
- 1.10 Standard petrol tank, fuel pump and position are mandatory.
- 1.11 Exhaust system, except standard manifold, can be replaced without removing the catalytic converter (J5.16.6 refers).
- 1.12 Steering wheel and mounting hub are free.
- 1.13 The standard steering column is mandatory, with the steering lock rendered inoperable.
- 1.14 Standard dashboard and instruments must be retained and operable.
- 1.15 Handbrake system must remain as standard.
- 1.16 A sumpguard and fuel tank guard are mandatory.
- 1.17 Engine cooling system to remain as standard.
- 1.18 The engine ECU will be supplied at the events by the Championship organisers and is mandatory. These will be drawn independently and issued to competitors at the events.
- 1.19 Mud flaps are to be fitted behind all 4 wheels.
- 1.20 Minimum weight of car INCLUDING driver must not be less than 980kg. In addition, the minimum weight of car EXCLUDING driver must not be less than 900kg.
- 1.21 Competition door numbers will be black with a minimum height of 230mm and width of 38mm. These are to be placed on the sponsor's background.
- 1.22 The driver's family name must appear in both rear side windows, using white self-adhesive capital letters, 75mm high and 10mm width.
- 1.23 Sponsors decals must be fitted. Decals to be supplied. These decals are to be fitted in designated areas only as set out in Championship Bulletins.

2. Safety

Minimum, Comply with current MSA Yearbook regulation N 6.11 to 6.12.6. inclusive. In addition:

- 2.1. Only the approved parts supplied in the mandatory parts kit are permitted.
- 2.2. The roll over structure, as a minimum, must comply with K1.6.1, K Appendix 2 Drawing 5, with additional door bars as Drawing 9, or Drawing 12 (a), (g) or (h).
- 2.2.(a) Optional bars as per K Appendix 2 Drawing 11 are permitted.
- 2.3. Where the driver's body or crash helmet could come into contact with the safety cage, FIA approved padding must be fitted for protection.
- 2.4. A fire extinguisher with a minimum capacity of 1.75 litres AFFF (or equivalent -Refer to K3.1.2.) is compulsory. The extinguisher should be retained by positive quick release brackets within reach of the driver while seated securely by their harness. The bracket is to be secured to the vehicle by a minimum of two 6mm bolts (Refer K3.1.4.)
- 2.5. The standard front laminated windscreen can be replaced with a polycarbonate type.
- 2.6. A Competition Seat with headrest is mandatory in accordance with K2.2, K2.3 and K13.
- 2.7. Currently FIA Homologated 6 point Seat Belts are mandatory, with two separate fixing points for the shoulder straps.
From a 'race ready' position with seat belts fastened, the driver must be able to vacate the car in 5 seconds.
- 2.8. FIA approved seat-mounting brackets are mandatory.

- 2.9 A HANS device is strongly recommended.
- 2.10 A FIA approved crash helmet is strongly recommended.
- 2.11 FIA approved 2 layer Nomex overalls, underwear, socks, balaclava, boots and gloves are mandatory.

3. Engine and Gearbox

- 3.1. The standard 1.6 Suzuki Swift Sport VVTi complete engine is mandatory. Bore 78 mm and stroke 83mm. Compression 11.10:1. Dry sumping is not permitted. No machining or drilling of cylinder block is allowed.
- 3.2. Lightening and/or balancing of any engine part, including the flywheel is not permitted.
- 3.3. The complete ignition system must remain as standard.
- 3.4. The Championship supplied engine ECU is mandatory.
- 3.5. Competition spark plugs are permitted.
- 3.6. A standard Suzuki flywheel is mandatory and may not be lightened or modified in any way. Steel or alloy competition flywheels are not permitted.
- 3.7. Fuel pump must remain as standard.
- 3.8. No fuel additives are permitted.
- 3.9 The standard 1.6 Suzuki Swift Sport VVTi gearbox is mandatory. No other parts are permitted. Straight cut gears or gearbox conversions are not permitted.
- 3.10 Limited slip differentials are permitted and must be used as supplied in the parts kit.
- 3.11 A competition clutch is permitted
- 3.12 Competition engine mountings are permitted.

4. Suspension and Brakes

- 4.1 Standard brake discs and callipers are mandatory.
- 4.2 Competition brake pads are permitted.
- 4.3 Competition suspension units, supplied with the PARTS KIT, are mandatory.
- 4.4 Minimum ride height is free.
- 4.5 Competition alloy wheels, supplied with the PARTS KIT, are mandatory.
- 4.6 A control single Dry/Wet tyre is mandatory. Manufacturer and 195/55 x 15 A048 Yokohama Tyres.

5 Electrical Equipment

- 5.1 Each car must be fitted with two RED brake lights.
- 5.2 A 'poor visibility' light, supplied with the PARTS KIT, must be fitted according to Section K5. The light must be switch able from the driver's seated position.
- 5.3 The standard battery charging system is mandatory.
- 5.4 The standard battery may be replaced but the standard battery position is mandatory. The battery earth lead must be coloured yellow. Battery terminals MUST be covered with insulating material. Insulating tape will not be permitted. Battery must be securely mounted to the vehicle.

5.5 A shift light is not permitted.

6. Eligibility Checks

- 6.1 Random eligibility checks will be made at any meeting and engine / gearbox assemblies checked or sealed for subsequent checking, by the nominated Championship Scrutineer. Random fuel checks may be made.
- 6.2 Engines and gearboxes will be sealed by the Championship Eligibility scrutineer, using only MSA numbered seals.
- 6.3 MSA Vehicle Logbooks are compulsory, in accordance with J2 of the MSA Yearbook 2010.
- 6.4 Non production of the Vehicle Log Book will be deemed a breach of vehicle eligibility.

Appendix A – Mandatory Parts Kit

Bespoke MSA specification Roll Cage	-	manufactured by Fabricage
2 way Adjustable Suspension	-	manufactured by AVO Suspension
Plated LSD unit	-	manufactured by Suzuki Sport Japan
6.5 x 15 Wheels	-	manufactured by Revolution Wheels
195/55 x 15 A048 Tyres	-	manufactured by Yokohama