



2020 Safety Equipment Specification Regulations **v2020.01 (Published)** **Issued: 6th February 2020**

Text highlighted in bold, red, italics, indicates a change from the previous version of this document.

Definitions used in these Regulations

| | |
|----------------|--|
| FHR | Frontal Head Restraint (including HANS, Hutchens, Defender and similar type devices) |
| BORSE | British Oval Racing Safety Executive |
| Junior Drivers | Drivers aged 15 and under |

General Notes

- It is the competitor's responsibility to ensure that they and their team comply with all Safety Equipment Specification Regulations **at all times** (including scrutineering, practise, and racing).
- Any necessary changes to the Safety Equipment Specification Regulations during the course of a season will be notified to competitors through the official ORCi / WatchItRaceIt website (orci.co.uk / watchitraceit.co.uk), and individual formulas' own approved communication channels. Change advisories received from any other source should be checked against these official sources for authenticity and accuracy.
- Proposals for any change(s) to the Safety Equipment Specification Regulations **MUST** be submitted in writing to the ORCi through one of the following channels:
 - Mail: ***ORCi Secretary, PO Box 530, Hoddesdon, EN11 1RR***
 - Web: Use the online contact form at <http://orci.co.uk>
 - Email: safety.rules@orci.co.uk
- Proposed changes will be considered by BORSE and an official response duly made as appropriate.
- Competitors must **NOT** use unapproved items, or make modifications to existing items, that do not meet the current Safety Equipment Specifications Regulations, whether they believe they have a case for them or not. A process for approval exists and should be followed by all competitors.

900 General

- 900.01** All Safety Equipment Specification Regulations apply to all competitors in all ORCi and ORCi affiliated formulas unless otherwise stated.
- 900.02** All safety equipment must be worn/engaged at all times when on track during racing, practise or test sessions, and at ANY other time when moving at a speed greater than walking pace (4mph).
- 900.03** Clothing that does not conform to the standards below may only be worn underneath the mandated safety equipment. For example, hooded tops must only be worn underneath a race-suit/overall, and the hood MUST be tucked inside.

901 Helmets and Goggles/Visors

901.01 Helmets

901.01.01 A helmet conforming to at least one of the approved standards MUST be worn.

901.01.02 Helmets MUST meet or exceed the MINIMUM standard as directed by BORSE.

The current approved standards permitted for all drivers are:

~~FIA 8860-2004 (This standard will NOT be permitted after 31st December 2019)~~

- FIA 8860-2010
- FIA 8859-2015
- **FIA 8860-2018**
- **FIA 8860-2018 ABP**

~~Snell SA2005 (This standard will NOT be permitted after 31st December 2019)~~

- Snell SA2010
- Snell SAH2010
- Snell SA2015
- Snell EA2016
- **Snell SA2020 (From 1st October 2020*)**
- SFI Foundation 31.1A
- SFI Foundation 31.2A
- SFI Foundation 31.1
- ECE R22.05 (in Fibreglass, Carbon or Tri-Composite form ONLY)

(*Note: The SA2020 standard is currently scheduled by the Snell Memorial Foundation to take effect from 1st October 2020, and thus is not valid until that date.)

The following approved standards are permitted for Junior drivers only in addition to those above:

- Snell CMR 2007
- Snell CMS 2007
- Snell CMR 2016
- Snell CMS 2016
- SFI 24.1

901.01.03 The use of polycarbonate helmets is NOT permitted.

901.01.04 The helmet MUST fit the competitor correctly, according to the manufacturer's sizing/fitting guidelines.

901.01.05 All helmets MUST display **a new green "ORC20 Approved"** serial numbered helmet sticker, as per Illustration 01. Older **blue 2015, and** red 2010 stickers are NOT valid (Illustrations 02 and 03).



Illustration 01



Illustration 02



Illustration 03

(*Note: A programme of re-validation and issuing of the new green stickers will be undertaken by ORCi appointed officials during the 2020 season. This programme will take some time to implement, and therefore the blue ORC15 Approved sticker will remain temporarily accepted until the programme has been completed. Helmets to the SA2005 and FIA 8860-2004 standards must NOT be used/presented, as per 901.01.02 above, as they are no longer permitted.)

901.02 Goggles/Visors

- 901.02.01 Shatterproof goggles or a shatterproof visor **MUST** be worn with the helmet at all times.
- 901.02.02 The use of tinted visors is **NOT** advisable.

902 Clothing

902.01 Race-Suits/Overalls

- 902.01.01 A flame resistant race-suit/overall **MUST** be worn.
- 902.01.02 Flame resistant race-suits/overalls **MUST** be manufactured from Proban, or material of a higher specification, e.g. Nomex.
- 902.01.03 Flame resistant race-suits/overalls **MUST** be clearly marked with the relevant SFI, FIA or equivalent standard, or the manufacturer's statement of protection.
- 902.01.04 Race-suits/overalls **MUST** be maintained in a clean and tidy condition.
- 902.01.05 Race-suits/overalls manufactured/certified to Karting standards, including, but not limited to, the CIK-FIA Level 1 or Level 2 standards, are **NOT** permitted as they do **NOT** provide the appropriate level of heat/flame protection.

902.02 Gloves

- 902.02.01 Flame resistant gloves **MUST** be worn.
- 902.02.02 Flame resistant gloves **MUST** be clearly marked with the relevant SFI, FIA or equivalent standard, or the manufacturer's statement of protection.

902.03 Balaclavas

- 902.03.01 A flame resistant balaclava **MUST** be worn.
- 902.03.02 Flame resistant balaclavas **MUST** be clearly marked with the relevant SFI, FIA or equivalent standard, or the manufacturer's statement of protection.

902.04 Undergarments

- 902.04.01 Flame resistant socks and undergarments provide a high degree of protection and are highly recommended to all competitors.

902.05 Wet-Weather Protection

- 902.05.01 Any wet-weather clothing must be worn in **ADDITION** to the required flame resistant race-suit/overall specified above.

903 Head/Neck Restraint

903.01 All Junior Formulas (Competitors Under The Age Of 16)

- 903.01.01 An FHR or neck-brace **MUST** be worn.
- 903.01.02 If a neck-brace is used, it **MUST** be of the complete-circle type, i.e. it must form a complete circle around the competitor's neck with no gaps.
- 903.01.03 The use of "U" shaped, or "horseshoe" neck-braces is **NOT** permitted.

903.02 ORCi Saloon Stock Cars, Lightning Rods And Stock Rods

- 903.02.01 The use of an FHR or neck-brace is recommended.

903.03 Other Formulas

- 903.03.01 The use of an FHR or neck-brace **MUST** be in accordance with the regulations laid down by the governing body for each formula, e.g. BriSCA F1, NHRPA, Stoxkarts Ltd., Spedeworth, etc.
- 903.03.02 Where no specific FHR/neck-brace regulations exist for each formula, the use of an FHR or neck-brace is recommended.

904 Safety Harness

904.01 Usage

- 904.01.01 A full safety harness **MUST** be used in accordance with the specifications below.
- 904.01.02 All mandated straps **MUST** be used at all times.

904.02 Type And Design

- 904.02.01 **ALL Formulas, EXCEPT Banger Type Formulas** - the harness **MUST** comprise of a **MINIMUM** of 2 shoulder straps, 2 lap straps, and an anti-submarine strap (also referred to as a sub-strap, or crotch-strap) in a **MINIMUM** 5-point design.
- 904.02.02 **Banger Type Formulas ONLY** - The use of a sub-strap in Banger type formulas is not recommended, and therefore in Banger type formulas the harness **MUST** comprise of a **MINIMUM** of 2 shoulder straps and 2 lap straps in a **MINIMUM** 4-point design.
- 904.02.03 Shoulder straps with a sternum protection latch are highly recommended.
- 904.02.04 The harness **MUST** incorporate a quick-release buckle (including rotary buckles, and NASCAR lever-latch type buckles), to which all straps **MUST** be connected.

904.02.05 Where a NASCAR lever-latch type buckle is used, it is advisable to fit a method of protection to prevent race-suit/overall sleeves from accidentally unhooking the buckle during racing. A small section of “Tubegrip” elasticated bandage, slid over the hooked buckle is sufficient for this purpose.

904.03 Harness Strap Width – ALL Adult Formulas (Competitors Aged 16 And Over)

904.03.01 Shoulder and Lap/Pelvic Straps

Applies to: ALL Harnesses (Unless Specified Below) – The shoulder and lap/pelvic straps of ALL harnesses MUST measure at least a MINIMUM of 3in/75mm in width, unless explicitly stated below. This applies to, but is not limited to:

- ALL non-homologated harnesses
- ALL harnesses with NASCAR lever-latch type buckles
- ALL harnesses homologated to SFI standards
- ALL harnesses homologated to FIA standards that do not meet the alternate FIA criteria below

904.03.02 Anti-Submarine Strap(s)

Applies to: ALL Harnesses – The anti-submarine strap MUST measure at least a MINIMUM of 1¾in /44mm in width on ALL harnesses.

904.03.03 Lap/Pelvic Straps Exception

Applies to: Only FIA Approved Harnesses with Lap/Pelvic Straps less than 75mm/3in in width – The use of narrower lap/pelvic straps is permitted on FIA approved harnesses ONLY. The harness MUST meet ALL the following criteria:

- The harness MUST be certified/homologated to the current FIA standards: 8853/98 or 8853-2016
- The shoulder straps MUST measure at least a MINIMUM of 2.75in/70mm in width (unless used in conjunction with an FHR device – see below).
- The lap/pelvic straps MUST measure at least a MINIMUM of 2in/50mm in width.
- The FIA identification/homologation/date labels MUST be intact and visible to scrutineers on ALL sections of the harness.
- The harness MUST be within its visibly stated validity period.

904.03.04 Shoulder Straps Exception

Applies to: Only Harnesses Used with an FHR Device – Where an FHR device is used by a competitor, it is permitted to use shoulder straps that narrow below the minimum specification (stated above) in order to ensure the correct fitment of the harness/FHR device combination.

- This exception applies to the shoulder straps ONLY.
- Any such straps MUST be manufactured by a recognised industry supplier AND be specifically designed for use with an FHR device.

904.04 Harness Strap Width – ALL Junior Formulas (Competitors Under The Age Of 16)

904.04.01 The shoulder and lap/pelvic straps MUST measure at least a MINIMUM of 2in/50mm in width.

904.04.02 The anti-submarine strap MUST measure at least a MINIMUM of 1¾in /44mm in width.

904.05 Installation

904.05.01 The harness MUST be securely mounted to the floor, roll-cage, and/or chassis of the race car.

904.05.02 Harness manufacturers specify their own installation requirements depending on the design of their harnesses. Therefore, harnesses MUST be installed according to the manufacturer’s recommended best practice using only approved mounting components/methods.

904.05.03 All the major manufacturers have installation information on their websites, and competitors are advised to refer to this when fitting harnesses to their racecars. Useful websites include (addresses correct at time of publication):

Manufacturer’s Websites

- www.willans.com
- www.schrothracing.com
- www.trs-motorsport.com
- www.racequip.com

Safety Standards

- www.sfifoundation.com
- www.fia.com/homologations

904.05.04 Key general guidelines from manufacturers for the installation of harnesses state that:

- Strap lengths should be kept as short as possible to avoid excessive stretching under impact.

- Shoulder straps should be supported at or just below shoulder level.
- Shoulder straps should be prevented from moving sideways, such that they may drop off a competitor's shoulders under severe impact/stretching.

904.05.05 It is recommended that any seat apertures, through which the straps pass, are lined to prevent chaffing of the straps.

904.06 Condition and Maintenance

904.06.01 Special attention **MUST** be paid to the condition of straps and fixings once installed.

904.06.02 The harness **MUST** be maintained according to the manufacturer's recommended best practice, and where possible kept free of dirt, oil and grease that could degrade any materials.

905 Window Nets

905.01 Requirement

905.01.01 A quick-release fabric window net **MUST** be fitted in the driver's side door window aperture of all saloon car formulas, with the exception of Banger type formulas.

905.02 Specification/Installation

905.02.01 The width of the netting holes must **NOT** exceed a **MAXIMUM** size of 3in/75mm wide.

905.02.02 The window net **MUST** be fitted such that it hangs down level with the steering wheel.

905.02.03 The window net **MUST** be flexible and easily removable, independent of any movement of the driver's-side door.

906 Fire Extinguishers

906.01 Requirements

906.01.01 A fire extinguisher, meeting the specifications below, **MUST** be carried in the competitor's tow-vehicle/transporter at all times.

906.01.02 The fire extinguisher **MUST** be within easy reach of the competitor and team members at all times, especially when re-fuelling the racecar.

906.02 Specification

906.02.01 The fire extinguisher capacity **MUST** be at least a **MINIMUM** of 2Kg.

906.02.02 The fire extinguisher **MUST** be of a dry powder or gas type.

906.02.03 Old type BCF (green) fire extinguishers are **NOT** permitted.