



# 12<sup>th</sup> F2 ELECTRIC STOCK CAR SECTION 2019

CONSTRUCTION  
& PROCEDURAL  
RULES



## F2 CONSTRUCTION RULES 2019

- 1) Models to be a reasonable representation of a full size open wheel F2 Brisca stock car. F2 Stock car Body for all Championship meeting.
- 2) No car shall be constructed so as to be dangerous to persons or cause damage to competitor's cars, or to the track surface. No sharp or protruding objects are allowed on the cars.
- 3) Overall chassis length to be between 285mm and 310mm. Overall chassis width to be a maximum of 163mm.
- 4) Front and rear bumpers must be fitted, and have a contact surface between 9mm and 16mm. The maximum bumper height must not exceed 46mm (measured at the top of the bumper) and have a minimum height of 27mm (measured from the bottom of the bumper) All bumpers must be plugged and have no sharp edges and must be constructed from a non-metallic material.
- 5) Nerf bars must be fitted on the same level as the bumpers and attached to the chassis rails with a maximum contact surface of 12mm.
- 6) Over riders must be bolted to front and rear bumpers. The height from the top of the bumper to the top of the overrides must be between 19mm and 32mm at the front and must have a maximum of 19mm at the rear.
- 7) The baseplate can be constructed from alloy, glass fibre or carbon sheet, and must not have splits or cuts for suspension.
- 8) Rear suspension to be of the pod type, with a single pivot at the front and simple spring arrangement. No oil filled shock absorbers.
- 9) Independent front suspension can be used (a simple Spring arrangement) with no damping allowed. No oil filled shock absorbers. No beam axle and no alloy wishbones.
- 10) Ball raced Axles are allowed front and rear.
- 11) There is a minimum ground clearance of 3mm, this includes any protruding screws, 1mm clearance for spur gear.
- 12) Tyres must be foam or rubber, Tyre additives are not allowed.
- 13) Tyres must have a minimum 20mm and maximum 26mm width, and a maximum 60mm diameter.
- 14) The use of multiple speed transmissions (gearboxes) is not allowed, only 32dp pitch gears will be allowed. Limited slip devices and differentials of any kind are not allowed, solid rear axles only. Single nut fixing at either end are allowed only. No carbon axles allowed.
- 15) The cost of the rolling car (excluding all radio, batteries, Esc, and motor) must not exceed £125.00. In the case of scratch built cars the entrant must be prepared to produce replicas of the car if so required for a price of £125.00 or less.
- 16) MOTORS. Only one drive motor per car. Only Mardave G2 2010 motors or SATURN 20 to be used. These must remain unopened and unmodified.
- 17) BATTERIES. Cells to be sub-C sized, 4 cell, 4.8v Nominal. Any capacity is allowed.
- 18) Mechanical or Electronic Speed Controllers may be used. Maximum RRP of £85.
- 19) All cars must have reverse fitted and working at the start of the race.
- 20) Body and chassis must be securely joined at the start of a race and must remain on car during the race. When initially entered at a meeting the bodysell must be neatly finished and complete.
- 21) Bodies and aerofoils must be made from ABS or polycarbonate, (LEXAN). Metal bodies or aerofoils are not allowed.
- 22) ABS Bodies must have all four windows cut out, LEXAN bodies can have their windows uncut but must be left clear.

The height of the body roof from the floor to be between 88mm and 126mm. Aerofoils if fitted must have no sharp edges and be mounted in a safe manner. The maximum size of the centre panel to be no more than 126mm-126mm, and the side panels 126mm-70mm.
- 23) The roof must be painted down to the waistline of the body with the driver's grading colour if an aerofoil is not fitted. If an aerofoil (roof fin) is fitted, this alone may be painted with the driver's grading colour.
- 24) Driver's national race number must be displayed on the exterior of the car. The drivers name must also be on the outside of the body.
- 25) Steel whip aerials and rollover masts are not allowed.
- 26) If you intend to alter your car in any way that is not covered by the rules, you must check with the class scrutineer for approval. We expect all drivers to use common sense when modifying cars and to enter into the spirit of the sport.
- 27) Racing is in an anti-clockwise direction only.
- 28) Contact is allowed, though no follow ins, striking stranded cars or roof shots. Anyone seen to be deliberately doing any of the above will be asked to remove their car from the track.

- 29) Race ready cars to race on track must have a minimum weight of 1150 g, this will be measured before every race.

## **F2 PROCEDURAL RULES 2019**

### **GENERAL RULES AND REGULATIONS**

These General Rules cover all F2 Meetings. They should also be read in conjunction with specific construction rules.

### **GENERAL RULES**

- 1) The Chairman and Secretary positions elected at the section's AGM shall be held for two years. These positions should be elected on alternate years.
- 2) Any competitor found to be in contravention of the rules and procedures will be disqualified from that meeting, be it at club or nationals events etc. and will serve a suspension period deemed appropriate by the committee.
- 4) A Junior must be under the age of 16 at the start of the season and shall remain a junior for the entire season. The start of the season is defined by the date of the first 12th Stock car National.
- 5) New race fee for Adults £10.00 Juniors £6.00.

### **GENERAL NATIONAL & OPEN RACE MEETING RULES**

- 1) BRCA membership cards must be shown during booking in procedure. It is advised that any club holding a BRCA sanctioned event should include an agenda of the meeting with the entry form.  
This agenda to cover such items as:
  - a) Venue, date, and approximate times of practice, heats and finish time.
  - b) Contact names, addresses and phone numbers.
  - c) Closing date for entries.
  - d) Any special requirements of the venue ; power points, lead acid batteries etc.
  - e) Details of available refreshments.
  - f) Entry forms must include a space for the driver's BRCA membership number & official BRCA race number.
- 2) Lap scoring at all national championship meetings to use an automated system with amb/mylaps/ mrt transponders, on a reliable computer system approved by the committee.
- 3) A suitable audible signal will start each race.
- 4) The following officials must be present at each sanctioned event: Race Director, who

must be present throughout the meeting. Chief Scrutineer, who will ensure that all cars meet the requirements of the rules. BRCA Steward, who has absolute authority at race meetings and is responsible for interpretations of the rules.

- 5) Health and Safety. These rules are mandatory and the meeting may not proceed until the BRCA steward is satisfied that these have been observed:
  - a) A first aid kit is to be made available for self-administration. This is to be held in an easily accessible area (at club official's discretion).
  - b) Fire extinguishers should be available at all venues.
  - c) Marshalling sticks must be provided.
  - d) If drivers are to stand on a rostrum over 2 foot in height e.g. stage or platform then a suitable fixed front barrier is required and must meet the satisfaction of the safety officer or BRCA steward in attendance.
- 6) All open and national meetings shall be run on carpet. Minimum track width is 1 metre. Start lines must be clearly visible.
- 7) National venues to have minimum six power points available for competitor's use.
- 8) Lap scores may only be questioned by the driver involved. A parent or guardian can represent a junior member.
- 9) Drivers to marshal races as instructed, failure to comply will result in a 25 lap penalty from their total qualifying score. Junior drivers do not have to marshal so long as a substitute marshal can replace them. Once cars have raced , they need to be placed into a park-ferme (as designated by race control) until marshaling duties are finished.
- 10) Code of conduct Any misconduct by a driver or their pit crew may be penalized at any committee member's discretion. Drivers or pit crew who fail to observe the code of conduct will be disqualified from the meeting.
- 11) Drivers shall be responsible for the collection and fitting of the correct transponder in their car.
- 12) All competitors will drive from the designated position. Failure to comply will result in the loss of that race's score.
- 13) Any car losing a wheel or tyre during a race must be removed from the track and have it replaced. Failure to comply will result in immediate disqualification from that race.
- 14) Any repairs to vehicles must be affected off the track.
- 15) Once a race has started, the changing of cells is strictly forbidden.

- 16) Transmitters must be switched off whilst not racing. External battery packs for radio transmitters are not allowed. Voltage supply to the transmitter may not exceed the manufacturer's recommendations.
- 17) Protests must be in writing and must include a £10.00 fee. This fee is refunded if the protest is upheld. If a standard motor is protested and found to be legal then the value of the motor is reimbursed to its owner.
- 18) Only legal transmitter frequencies may be used and all equipment must conform to the current regulations.
- 19) Trophies to be given out as soon as possible to allow people who have travelled a long way to start their journeys earlier.
- 20) At all national meetings the cars will be scrutineered by the BRCA official scrutineer or deputy or official club scrutineer before each heat and before & after finals. A scrutineering box and gauge to be made available for all BRCA meetings. Once cars are scrutineered they must stop on the scrutineers table (park-ferme) until 30 seconds before the race starts.
- 21) If a motor is changed, the scrutineer must approve it. Failure to get the motor approved will result in loss of any results whilst using the new motor.
- 22) At the end of the meeting, all score sheets to be given to the BRCA points compiler who will check all results and be responsible for the distribution of the points tables.
- 23) In the event of an issue with lap counting (for more than one car) the race affected will be run again.
- 24) Team Powers 2018 F2 Golden helmet Championship sponsored by Team Powers 4 Rounds will be added to the world championship qualifying rounds to make a speed weekend on a Saturday night/Sunday running team Powers stock brushed motors and 4.8v Nimh batteries with the finals to be run on World Finals Championship weekend in September.

## F2 STOCKCAR RACING RULES

- 1) Meeting format, 5 minutes races, 4 rounds with your best 3 rounds to count, commencing with white grades on the back straight, opposite the start/finish line, then yellow a quarter lap down, blue grades a further quarter behind and so on. Top 2 go straight to the final, the next 16 cars go through to the two consolation races, the top 3 from each consolation race are promoted to make an 8 car final. Finals and consolations will start in qualifying order and will be of a 6 minute duration Awarding of

points from the event.

1st 100, 2nd 99 etc.... down to 8th place in the final. Then 9th place will be the person who finished 3rd in there semi (with the highest laps) 92, then 3rd in the other semi 91, then 4th in there semi (with the highest laps) 90, then 4th in there other semi 89 etc.... down to the lowest lap score in the semi, then 80 for the first none semi qualifier... down to the last racer, One extra point for top qualifier.

- 2) A Minimum five, maximum nine cars in any one race This applies at qualifying stage only. A tie at any meeting will be decided by the highest lap score of any round followed by the next highest etc., then if still a tie, it will be decided on split times of the highest lap.
- 3) Stock cars will race anticlockwise on an oval track.
- 4) Points for the meeting will be awarded as follows:
  - 100 points for winner of final, dropping by one point for each driver down to last place, with one extra point for top Qualifier.
- 5) Worse round score to be dropped when qualifying for the World Final with the Top 32 drivers from qualifying going into 4 quarter finals, top four from each quarter go through, leaving 16 finalists going into 2 semi-finals, top four from each semi-final leaving an 8 car final, if the existing world champion fails to make the top 32, they can start at the back of the grid in the final.
- 6) Closed grids in all nationals, semis, grand nationals consolation and world series Not staggering like gt12s Grand National championship has 12 qualifiers.
- 7) Over seas race- top 4 from race get a place in each of the 4 quarters for world final.
- 8) Minimum of 3 rounds of qualifying to be done before a place can be gained in the world finals.
- 9) Any part of the car may be substituted at a meeting except the bottom chassis without having it stamped by scrutineer. old one to be left in scrutineering until the end of the meeting.