

SORRCA

Scale Off Road RC Association

2011 Official Scale Rock Crawling Competition Rules

Introduction:

This rulebook is intended to standardize scale off road RC competitions that are held at various locations throughout the world. The intention is for all clubs/events to use these rules as written; however, they may be modified on a local basis. Any and all changes made to these rules at a SORRCA sanctioned event must be covered in a preliminary drivers meeting and publicly posted before the event.

Class Descriptions

Class-1 "Street"

- Description - A Street Legal off-road vehicle that you would drive to work and the trail head and outfit like an expedition vehicle such as the Camel Trophy truck D90 rigs.

Class-2 "Trail"

- Description - A stock vehicle that has been modified to become a capable trail rated rig and is not necessarily street legal.

Class-3 "Modified"

- Description - An off-road vehicle that you would build from the ground up and might see in a TTC/KOH type competition.

General Vehicle Details

- You are encouraged to go above and beyond to make your truck as scale as possible
- Vehicles must resemble a real 1:1 rig and it will be up to the collective group to vote on whether a questionable rig is accepted or not.
- Tire size will be determined by advertised manufacturer specs. (tires without available specs will be measured off the truck as mounted on the wheel laid flat)

•Tire modification:

Class-1 Street. No tire modification is allowed.

Class-2 Trail. Tire lugs may be removed, sipped, grooved and/or trimmed.

Class-3 Modified. Tire reduction and narrowing is permitted, as well as all modifications listed above.

- You must run a rail chassis (for example: Bruiser/Mountaineer, SCX-10, Reign RC K2-3S, 3L, 4, 5, MFM, X-Trail, CR-01, UTE, etc...) No TVP (twin vertical plate) chassis' or frame rail extensions on a TVPs. The exception to this rule is the Tamiya CC-01 or TA-02, (Hummer, S-10, Ford F-150 and Toyota Hilux)and Modified class Tubers.
- 4 wheel steering or dig is allowed in modified class only (must choose 1 per course)
- No "Motor On Axle" (MOA) of any kind. Your axles must be driven by one transmission or transfer case and a minimum of two drive shafts (except CC-01, TA -02 etc..). No separate throttle control of drive shafts or axles.
- There are no Wheel distinctions. For example you can run a 1.55, 1.9, 2.0 or 2.2 rim in any class. Wheels larger than 2.2 are not allowed in any class and no Short course style wheels 1.9/2.2 split diameters
- Spare Tires must be within 1/4" Diameter of Drive tires to receive points
- Any functional recovery tools you wish to use during your run, you must carry it on your rig at all times. IE tow strap, pull pal and, sand ladders.
- Winching can only be performed off of natural objects (i.e. trees, rocks, ect...), other vehicles or stakes supplied by the course maker. Winching off of a person such as their shoe or hand is not allowed.
- All vehicles without an enclosed cab must have the motor, transmission, and electronics covered and hidden when viewed from the top and sides. Batteries must be chassis mounted and also hidden from view.
- Course will be tough and made to push the scale vehicle limits. This is to encourage competitors to improve their rigs from one event to another.
- Winches are HIGHLY recommended!!!! Expect to use a winch.
- Water proofing is HIGHLY recommended!!!! Expect your rig to get wet.

Tire Ban List

- Losi Claws (all sizes, and types)
- Hot Bodies Rovers (all sizes)
- Hot Bodies Sedonas
- HPI Rock Grabbers
- Panther Cougars
- Panther Leopards
- Pro-Line Chisels (all sizes)
- RC4WD Rocklin
- RC4WD X-Locks (all sizes)
- RC4WD Crazy Crawlers

- Imex Red Rocks
- Imex Skulls and Bones
- Losi Bashers

Tires should be scale appearing, if it is questionable have it reviewed before the event, or plan to run a different tire. As new competition specific tires are released this list may be updated.

Class-1 “Street” Details

- Vehicle must have a windshield that fills the entire windshield frame
- Full width bumpers are required on the front and rear of the vehicle. Bumpers that are molded into the body qualify. A rear bumper is not required on a flatbed, but adding one to the flatbed will gain the additional scale points. (Bumpers are measured from the outsides and must be the width of your windshield).
- Wheels must be aligned within the body wheel wells (center of wheels to center of wheel wells +/- 1/2 inch total combined)
- The vehicles body must be mostly intact. Mild trimming such as flairs & removing a hardtop allowed only. If hardtop is removed full interior is required. (no extreme trimming of bodies allowed See below.)
- The tread of the tires cannot extend outside of the wheel wells more than 1/2 of the tread width, flairs can be added to reach min. spec.
- Vehicle must run a full length rail chassis (The rail chassis must be as long as the vehicles wheelbase)(Tamiya CC-01 Chassis are allowed)
- Truggies are not allowed, flatbeds with full length rail chassis are allowed. The bed must be as wide as the cab the entire length of the bed. Cab only not allowed.
- Tires can never extend beyond the body’s bumpers or the rear of any truck bed. (Any stingers, fairleads, shackles, bolts, etc are not considered part of a bumper when determining this.)
- Dovetailing is not allowed.
- Sectioning or narrowing of the body is not allowed.
- Bobbing a truck bed is allowed, but must follow All body specs
- Boat sides are not allowed.
- 106mm / 4.19" Max tire size including spares
- Gates will be a minimum of 11" wide (so mind your width)

Class-2 “Trail” Details

- The inside of the front tires cannot extend outside of the width of the cab at the doors
- The body (including bumpers) must be 3" longer than the wheelbase
- A front bumper is required and must be mounted to vehicles rail chassis and wider than the chassis (chassis cross rails do not count as bumpers)
- Vehicle must run a full length rail chassis (The rail chassis must be as long as the vehicles wheelbase extensions are legal for bumpers as long as the chassis meets other specs)
- Truggies are allowed, but must have a rail chassis up to the rear of the skid minimum. The truggy structure must extend to the back of the rear axles pumpkin or beyond to be legal.
- Flatbeds that run the full length of the rail chassis are allowed. The bed must be as wide as the cab the entire length of the bed.
- 2 of the 3 following modifications are allowed

- Dovetailing the rear (a truggy/tube bed that is narrower than the cab counts as dovetail).
- Boat sides (no more than 1" measured vertically)
- Pinching the front (2/3 the width of the widest part of the cab)
- Sectioning or narrowing of the body is not allowed
- Body / Cage work must be at least 4.5" tall (including boat sides) and wider than the inside measurement of the vehicles track width (front or rear, whichever is wider).
- 120mm / 4.75" max tire size with a 2.2 max rim size including spare
- Gates will be a minimum of 12" wide (so mind your width)

Class-3 "Modified" Details

- 146mm / 5.75" max tire size with a 2.2 max rims size including spare
- A bumper is not required, but to be counted for points, must be mounted to vehicles chassis and wider than the chassis (chassis cross rails do not count as bumpers)
- Gates will be a minimum of 13" wide
- All bodies (Including tubers) must measure a minimum of five inches wide from front to rear of door, measure a minimum of 4.5 inches tall as measured from the skid to the tallest point on the body and must be as long as the vehicles wheelbase
- Body modifications including, but not limited to, pinched front, dove-tailing and boat-siding are permitted as long as the final dimensions comply with the minimum size rules.

Scale Points

Bed :

- Tube bed OR Flat Bed: metal -3, plastic -1
- Bed mounted headache rack or roll bar: metal -2 Plastic -1

Truggy & back halved truck

- Truggy/back halved truck: metal -4, plastic -2

(Must replace the ladder frame from the rear of the skid Min. to the back of the vehicle. Must have a roll bar hoop. Must have integrated shock mounts. Must be a structural part of the rear of the vehicle. (If your bed does not meet ALL of the preceding criteria, it does not count as a truggy bed)).

Tuber: metal -8, plastic -4

A tuber consists of a complete body structure where the front, cab, and rear sections are comprised entirely of structural tubework.

- Rigid Metal/plastic body panels -1

Interior cage or exo-cage: (-3 metal -1 Plastic) per row of seats protected. (Must have down bars and cross bars in front & behind each row.)

Tube accessories

- Sliders: (both sides) metal -3, plastic -1

- Tube fenders: Metal -1 per pair
- Integrated tube shock mounts: metal -1 (per pair)

Body

- Hard body: full -8, Cab -4
- Drop bed : -3
- Complete Custom built body: (metal or hard plastic, no lexan) full -4, Cab -2 (in addition to hard body points)
- Inner fender wells: -1 per pair

Bumpers (items must be chassis mounted and separate from the body)

- Bumpers : metal -3 each , plastic -1 each
- Stinger/grill guard: -1
- Spare tire carrier (must be bumper mounted): -1

Exterior roof rack / light bar (may only choose one)

- roof rack: metal: -2, plastic -1
- Roof top light bar : metal -1

Interior:

- 3D interior: 2 seat -3, 4 seat -4, SUV cargo area -1.
- 2D/half interior: 2 seat -1, 4 seat -2.
- Realistic Scale Human figures: full(knees up) -2, part -1(torso up) (max 2 figures)

Suspension/Drive train/Steering:

- Leaf springs (front/rear): -3 ea, -7 both.
- Multiple axles: 3 driven axles -3, 4 (or more) driven axles -5
- Chassis mounted steering servo: -5 (front) rear -2 (Class 3 only)
- Transfer case: -4.
- 3D engine: -4.

Realistic exterior items (max -6 pts): Items that are non functional but you would see on a trail truck

- Fuel cell, exhaust, jerry can, hubs on all wheels, steering stabilizer, disc/drum brakes on all wheels, mirrors(2), wipers(2), antenna, license plate, Fire extinguisher, trail tools (Hi-lift jack, etc.)first aid, Etc. -1 each

Functional items (max -8 pts):

- Tow strap, -D-ring, Pull Pal, sand ladder, hitch, Etc. -1 each
- Headlights(2) and taillights(2) -2
- Winch -2 Each
- Full size spare tire. -3