

# Cub-mobile Downhill Race Rules and Regulations

## 1) Participation

- A) Racing is open to all registered Cub Scouts
- B) Wear your uniform
- C) It is recommended that all dens "test drive" their cars before race day to familiarize themselves with the steering and braking mechanism of the Cub Mobile. SAFETY FIRST Please do not let your scout drive something that may get him hurt.

## 2) Cub Mobile Construction:

Build car as close as possible to the picture and photos.  
All cars must pass a Pre-Race inspection prior to racing.

### A) Wheels

Wheel diameter must not exceed 10"

The outside circumference of the wheels may vary from 30 to 36 inches

Solid rubber tires ONLY (air filled tires are not allowed)

Tires with bearings will be allowed

Axles should be lag type fastener – however straight axles will be allowed if affixed correctly and in a safe manner.

### B) Frame

2 x 4 construction grade lumber only. Not 4x4, 4x6, 6x6

Maximum car length is 5'-0" (Including wheels)

Car width must be between 30" and 36" (Outside of wheels)

Wheel base may not exceed 4'-0" (center-to-center of wheels)

Frame must be bolted together. Remaining items can be attached with screws as long as parts are held secured. No Nails

(a) 3/8" plywood minimum

### C) Steering Blocks

Car must be equipped with steering "safety" blocks to limit turning radius

Maximum gap between frame and block is 1/8" on both sides

### D) Steering

Car is controlled with a rope connected to the outer ends of the front axle

Scout may also use his feet on the front axle to assist steering

Ensure rope is of adequate size for a comfortable grip

Rope length should be tested by all scouts for length and comfort

Foot rests are allowed and encourage to give scouts leverage for steering

### E) Seat Belt

Car must be equipped with an adjustable seatbelt securely fastened to the car

frame

F) Brake

Car must be equipped with a rubber "drag" pad or equivalent. Brakes must stop car in a timely manner. Any car which no longer has good working brakes or has a problem with the braking system must have it repaired prior to racing. The use of a dual braking system as shown in the photos is encouraged as an added safety measure.

G) Seat

Securely fastened to the frame (see pictures and photos)

Build as close as possible

A seat with a backrest is required

H) Floor board to discourage the scouts from braking with their feet is required. It should be positioned between brakes and front axle. (Must not interfere with operation of brakes or steering.) - Made from 3/8" plywood can be up to 10" long and 24" wide. (see photos) No additional weighting to the car will be allowed as a means to increase speed

J) Lightweight items such as flags can be attached to car as long as it's secured. Be creative.

K) The use of an enclosure around the driver is not permitted as this increases the weight of the car.

L) Decorations and paint schemes shall uphold BSA values and traditions.

3) Safety Equipment

A) Helmet

Bicycle type

B) Shoes

No sandals or bare feet will be allowed

C) Gloves

Leather or Roller blading is recommended

D) Elbow pads and kneepads are also permitted and recommended.

E) Full length pants are to be worn during this event.

4) Racing

A) Each scout will drive a Cub Mobile car racing in his own class or rank division.

The car can either be the scouts own creation or he may choose to borrow another scouts or use a car created by the den or pack.

B) Each run will be judged and logged by the head judge

C) In the event of a crash not of a driver's own doing, runs for both cars will be voided and rerun. No more than 2 re-starts will be allowed.

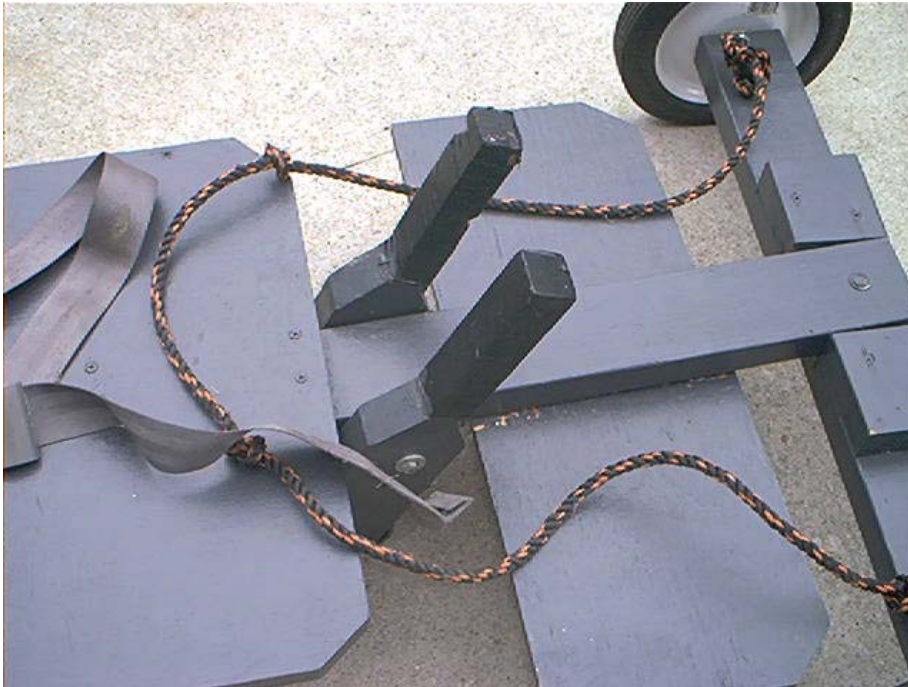
- D) Judges will determine a maximum “default time” for all cars that will be assessed in the event a racer does not finish the course.
- E) Judges reserve the right to modify the rules at any time without prior notice.
- F) The race will be double elimination meaning the scout will have to loose twice to be out of the race.
- E) Cars crossing the centerline into the other drivers lane will be disqualified from that race.

5) Behavior

Please no disorderly or un-sportsmanlike conduct

It will be expected that all Scouts will behave appropriately.

***Photo of floorboard and Dual braking system***



# CUBMOBILE. Use a helmet and safety belt.

