



Capitol Area Council Pinewood Derby Official  
 Rules 2011 (adopted from 2010)

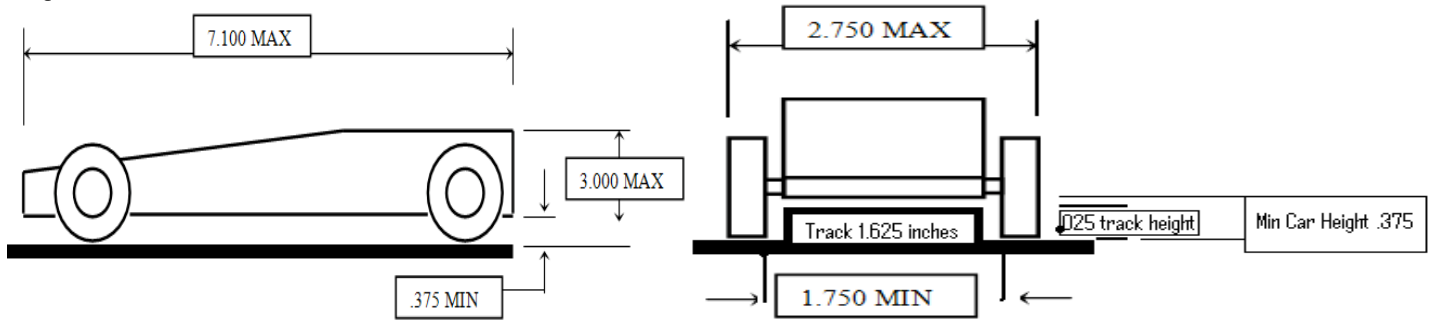


**I: REGISTRATION: On Race Day**

**II: Length, Width & Clearance:**

- Maximum overall width (including wheels and axles) shall not exceed 2-3/4 (2.750) inches.
- Minimum width between wheels shall be 1-3/4 (1.750) inches at the axles.
- Minimum clearance between bottom of car and track shall be 3/8 (.375) inch.
- Maximum length shall not exceed 7.100 inches
- Maximum height between the wheels and the top of the car shall not exceed 3.000 inches.

**\*\* NOTE:** All dimensions will be verified by the official race templates. Failure to meet these specifications will result in disqualification.



**III: Weight:**

The weight of the finished car shall not exceed 5.0 ounces. The reading of the official race scale is considered final.

**IV: Appearance:**

Details such as steering wheel, driver, spoiler, decals, painting, etc. are permissible as long as all of the size and weight specifications are met. Paint and glues must be dry when submitted for inspection or the car will not be accepted.

**V: Lubrication:**

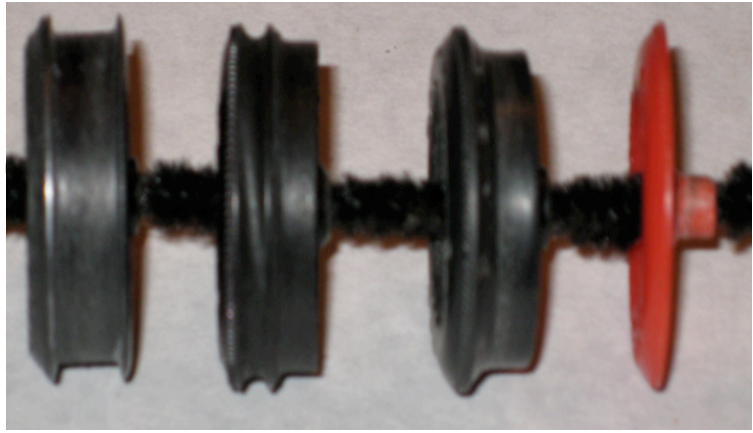
All lubricants must be completely dry when submitted for inspection. Includes all wet products. (NYOIL)

Dry powdered lubricants such as graphite or Teflon may be used as well. Lubricants must be applied before inspection and no lubricants may be applied after the car has been accepted.

**\*\* Please lubricate your car at home. Every year we find and have to clean up a graphite mess after the event.**

**VI: Wheels: Important, please read these very carefully. If your wheels are not as listed below your car will be disqualified.**

- Only official Scout wheels with “BSA PINE WOOD DERBY” molded on the outside may be used.
- Wheels may be sanded to remove the molding seams from the tread.
- Minimum wheel diameter is based upon the judge’s visual inspection of the serrated edge. The “bumped” edge must remain intact and unmodified, no exceptions. (see photo below) (you are looking at the dots that appear as bumps)
- No “hub caps” are allowed.
- Unlimited modifications are allowed to the wheel tread see photo below (these are just four examples).



The serrated edge shown in the right picture must remain unmodified. The bumps that appear as dots can't be removed or modified in any way.

H-Cut

V-Cut

Angle cut

Razor cut

The goal of the wheel language is to not have to disqualify cars at registration. There are two rules for wheels:

1. The words "BSA" and "Pinewood Derby" must be unmodified
2. The bumps must be unmodified.



Material can be removed either from the front of the wheel as shown above or from the back.

### VIII: Axles / Nail:

- Unlimited modifications to the nails are allowed.
- Free floating washers on the nails are prohibited.
- The distance between the front and rear axles may be changed from that of the standard derby car kit.
- Axles must be oriented to where at least three of the four wheels touch the track. (One wheel can be off the ground)

### IX: Wood Block:

- No pre-cut wooden blocks can be used (as purchased from the internet or other seller).
- Each Scout must build his own car from an official BSA block of wood.

### X: Build, Don't Buy: Scouts and parents must build "their best" not "buy the best".

- No pre-made or store bought cars allowed.
- Official BSA parts must be used. The BSA wood block, nails and wheels can only be modified by the Scout and their parents / guardian. These items cannot be purchased, if they have been modified in any way. This is not a contest on who has the largest bank account. This is a contest of who can build the fastest cars themselves. The PWD rules judge will have final say on if the parts appear to have been purchased. Purchased parts will result in disqualification.
- **\*\* To be very clear; any car perceived to have "purchased" parts will be disqualified. \*\***

## **X: Ground Rules:**

- The race is open to qualified Tiger Cubs, Cub Scouts and Webelos. Each Scout must enter only one car they built new for this year's race season.
- If a car suffers a mechanical problem, loses an axle, breaks a wheel, etc. and a repair can be accomplished within 5 minutes, the heat will be run again. If not, the car will automatically lose the heat. Repairs must be done in the pit area. Any car that has been repaired must be re-inspected before re-entering the race. Lubricant may not be reapplied during or after repairs.
- No cars or parts of cars from previous years may be used.
- The car must be freewheeling with no starting device or other means of propulsion.
- If a car jumps off the track, the heat will be run again. If the same car jumps off the track a second time, it will automatically lose the heat.
- An electronic timer will be used at the finish line. If the timer malfunctions, then the line judge at the finish line will call the winner. If the race was too close to easily call, then the heat will be re-run.
- Only race officials and boys racing in the current heat will be permitted in the track area.
- Scouts need to be present while their car is competing. If a Scout leaves during racing and/or judging, the Scout must appoint someone who does not have a car entered to be present when his car is racing or is being judged. Cars without a representative will be pulled from competition.

## **XI: Inspection & Disputes:**

- Each car must pass inspection by the official inspection committee of adults before it may compete. The inspectors will disqualify cars which do not meet these rules. Car owners will be informed of any violations and given an opportunity to modify the car to meet these rules.
- **Any car identified as having “purchased” parts will be disqualified.**
- Any participant (including parents) has the right to appeal to the Rules Committee for an interpretation of these rules. The Rules Committee, by majority vote, will be the final judge of these rules. If only one member of the Committee is present, they will have the final say.
- Good sportsmanship and behavior is expected. Race Officials may ask anyone not following these rules to leave.
- Remember that the focus of this event is not to win at any cost, but for each Scout to DO HIS BEST!

## **XII: Race Procedure:**

- Each Scout must bring his car to the inspection table during their designated registration time. If the car fails to meet any of the rules listed below then the Scout will be given an opportunity to correct the problem up to the close of their registration time slot.
- After inspection, the car will be registered and placed on pit row for voting. From this point forward, the Scout cannot handle the car. Only race officials can handle the cars during competition.
- The starter/derby coordinator will call each Scout to the track when it is time for his car to race. The Scout will sit next to the track to where his car is running. Once the races are completed, the scout will be asked to leave track area.
- Advancing or winning cars will be announced shortly afterwards.
- When a car has been eliminated from competition, it will be placed in a designated area marked “PICK UP”

## **XIII: AWARDS:**

Awards will be given for the “fastest” cars within each rank as follows:

- Speed: 1<sup>st</sup>, 2<sup>nd</sup> & 3<sup>rd</sup> place trophies will be awarded to the fastest cars from each den. (15 trophies)
- Overall Pack Finals: result in 1<sup>st</sup>, 2<sup>nd</sup> & 3<sup>rd</sup> awarded to the three fastest cars overall (3 trophies)
- Friends and Family: result in 1<sup>st</sup>, 2<sup>nd</sup> & 3<sup>rd</sup> awarded to the three fastest cars overall (3 trophies)
- Ribbons for all participating scouts.