

# How to Select the Proper Caster & Wheel

There is no simple formula or rule that can be followed in selecting the proper casters. Many varying and individual factors must be balanced to make the selection that will do the best job for you. The following are several of the more important considerations.

**Load Weight.** The heavier the load, the larger the wheel required for the caster. The weight of the load also influences the mobility of the wheel. Roller or ball bearings are recommended for loads over 400 pounds. Weight capacities are shown for each caster in this catalog.

**Floor Conditions.** Make sure the wheel you select is large enough to pass over cracks in the floor, tracks, moldings and other obstructions. For floor protection on linoleum, tile, carpet, etc., use polyurethane or Performa rubber wheels.

**Unusual Conditions.** Each wheel material has certain characteristics which will give the best results where unusual conditions exist. For example, where acids, oils, chemicals and other conditions harmful to rubber are present, Colson polyurethane, polyolefin, Maxim, phenolic or steel wheels are recommended. Check conditions, then select the caster and wheel.

**Rolling Ease.** The larger the wheel diameter, the easier it rolls. To maximize ergonomics and rolling ease, use Precision Ball Bearings where available. When possible, use the largest ball bearing wheel for best results.

**Extreme Climates.** Room temperatures are no problem for most casters, but extreme cold or heat can be a problem. Colson helps solve this problem with "Colson 45"—the green lube which assures caster rolling ease from 45°F below zero to 260°F above. It's standard on most Colson casters. (**Note:** Some wheel types should not be used in extreme temperature ranges. Consult factory.)

**Your Local Distributor.** Colson casters are available from stocking distributors across the U.S., Canada, & Mexico. Each is a caster specialist who can help you select the proper caster to suit your needs. Visit our website ([www.colsoncaster.com](http://www.colsoncaster.com)), or contact us for details at 1-800-643-5515.

## Caster Terms



## Wheel Terms

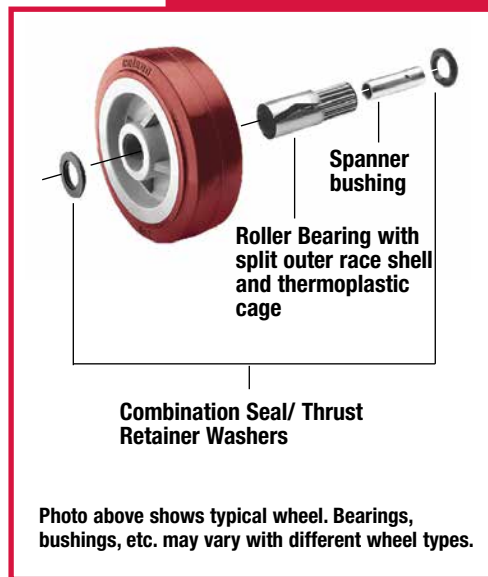


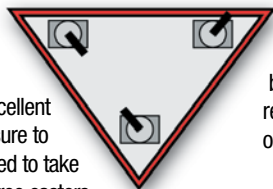
Photo above shows typical wheel. Bearings, bushings, etc. may vary with different wheel types.

## Caster Combinations for Trucks

In building, repairing and refurbishing mobile equipment, various effective caster combinations may be used. Several types of mountings are illustrated below.

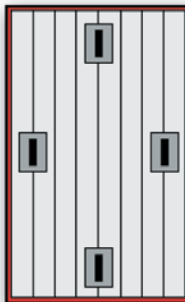
### Three Swivel.

For barrel dollies and small portable machines. Affords excellent maneuverability. Be sure to select casters designed to take the weight load on three casters rather than the usual four.

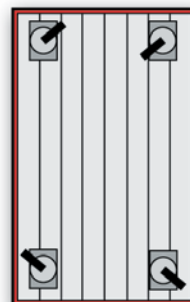


**Tilt Mounting.** A tilt mounting is the most economical, but should be limited to lighter loads.

The tilt is best when the load wheels are 1/8" taller than the balance wheels. Not recommended for use on ramps.

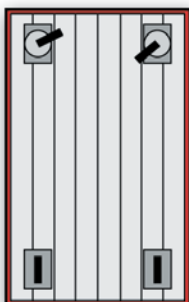


**Four Swivel.** Where a side motion is frequently needed, the four swivel arrangement is excellent. If the casters are equipped with swivel locks, this mounting is also practical for long straight travel as well as use on ramps. A most versatile arrangement.



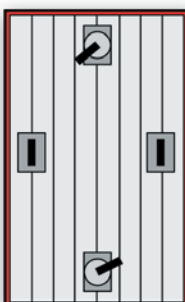
### Two Rigid, Two Swivel.

Most practical and inexpensive arrangement for straight and/or long distances. Can be used for heavy or medium loads, depending upon the weight capacity of the casters selected.



### Diamond Mounting.

Two rigid and two swivel casters, but the diamond shaped mounting greatly increases maneuverability. This mounting is not recommended for ramps.



### Four Swivel, Two Rigid.

This is a level mounting design for heavy loads and long trucks. The two rigid casters help to distribute and reduce the load on the swivel units and thereby maintain good maneuverability and easy steering.

