

# Measuring Building Height



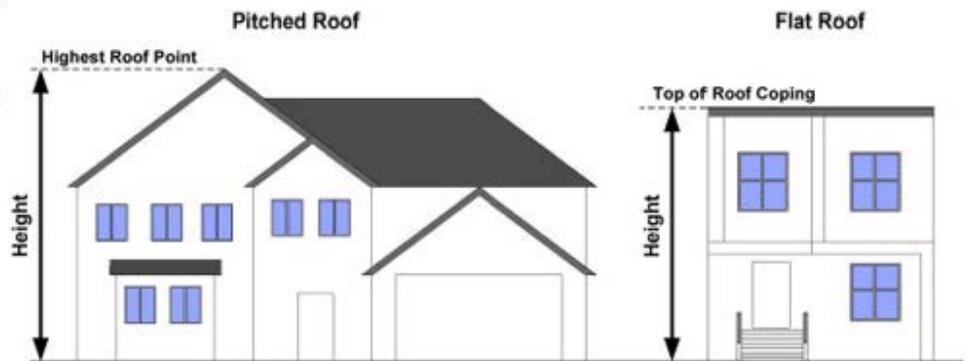
**Building height** means the average maximum vertical height of a building or structure measured at a minimum of three equidistant points from finished grade to the highest point on the building or structure along each building elevation. Architectural elements that do not add floor area to a building or structure, such as parapet walls, chimneys, vents, and roof equipment are not considered part of the height of a building or structure (See page 3 for special restrictions in the Central Business and Waterway Overlay zones).

See [Bend Development Code Ch 1.2](#) for definitions.

## How is building height measured?

Building height is measured from finished grade located within 2 feet of the foundation wall to the highest point on the building or structure.

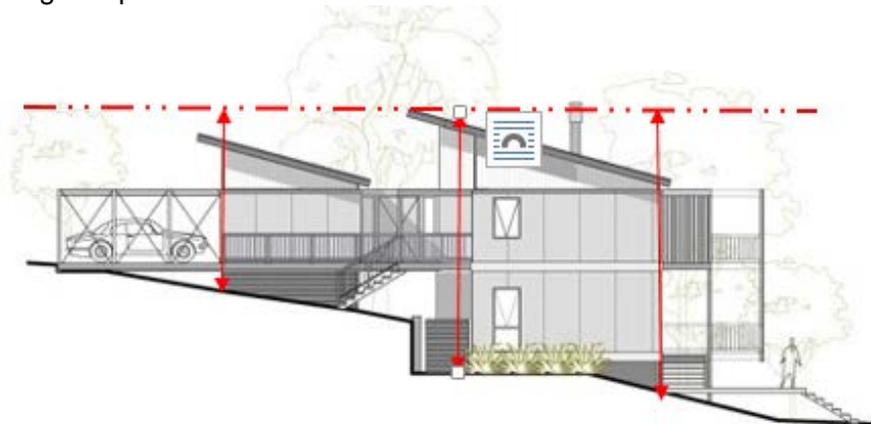
The standard practice used by the City when calculating building height is to identify the highest point on the building or structure, excluding architectural elements such as chimneys, flag poles, skylights, etc., and draw a line parallel to the finished grade shown on the elevation plans. The building height is the vertical distance between finished grade and the highest point on the building, provided that the measured elevation does not include fill or berms.



However, on sloped sites the building height is measured from the average finished grade to the highest point on the building. In order to calculate the average finished grade a minimum of three equidistant points are marked on all elevations, one on each end of an elevation and one mid-point, and the vertical measurements from finished grade to the highest point on the building are averaged to determine the building height. See the following page for more information on calculating the average finished grade.

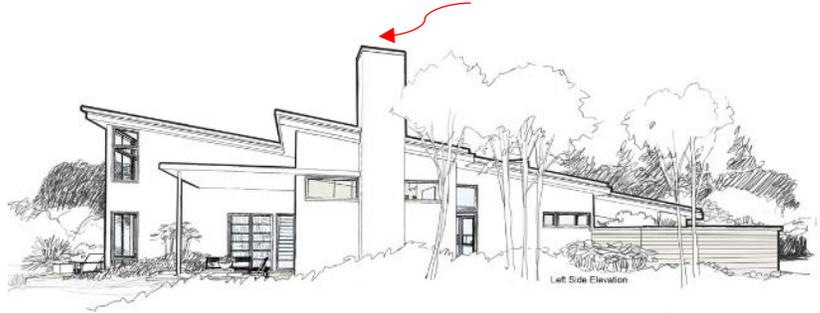
## What if my building has multiple elevations?

In that instance you would identify the highest point on the structure that is an enclosed area and draw a line horizontally from that point on each elevation. Then draw a minimum of three equidistant points on each elevation, one on each end of the building within 2 feet of the foundation wall and one at mid-point, beginning at the highest point and ending at finished grade below. The average of these dimensions is the building height.



## Are any building features excluded from building height calculations?

Small appurtenances such as chimneys, antennas, smoke and ventilation stacks, and flagpoles are not included in the building height.



## How do I determine average finished grade on a sloping site?

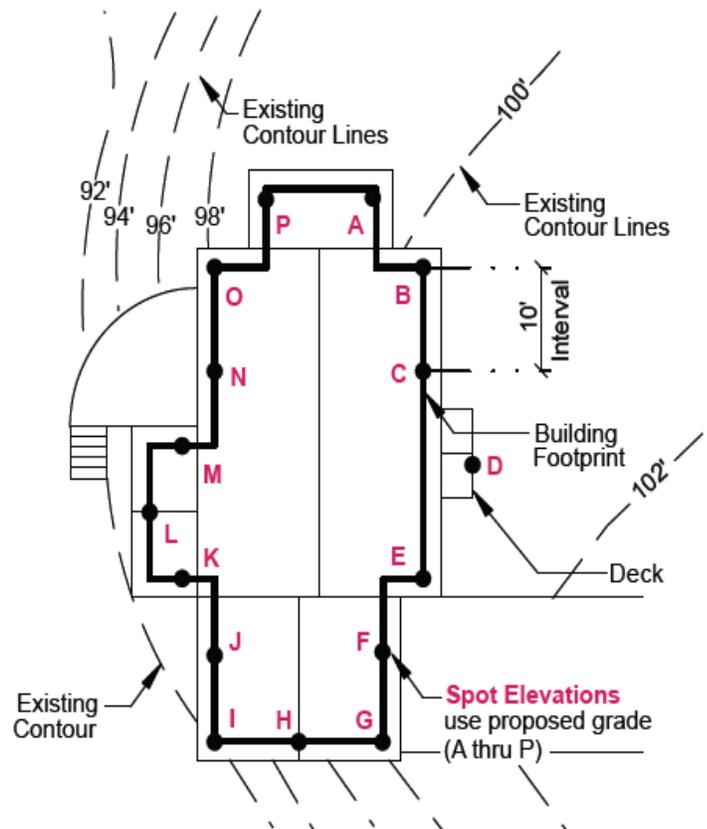
**Step 1.** Provide an accurate drawing of the building footprint on the site. Show the existing topography using contour lines at 2' intervals.

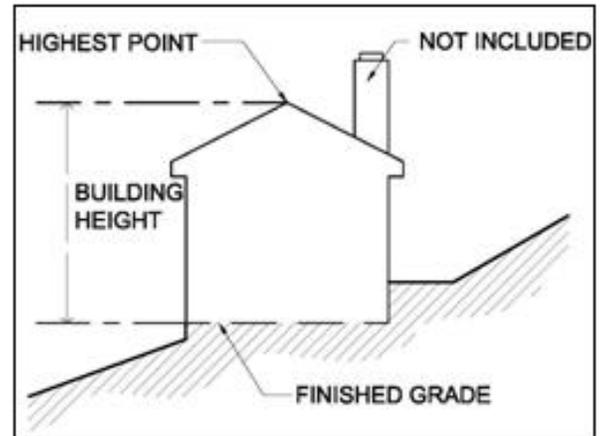
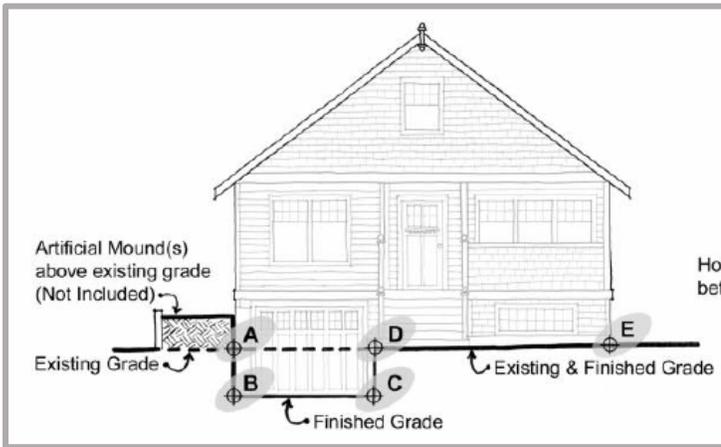
**Step 2.** Show points on the drawing around the building footprint. A minimum of 3 equidistance points per elevation. For each point provide spot elevations of the topography as it exists at the time of permit application.

**Step 3.** Add up all of the spot elevations and divide by the quantity of those spot elevations. This gives you your average existing or finished grade. Show this table on the site plan.

## What does “existing grade” mean?

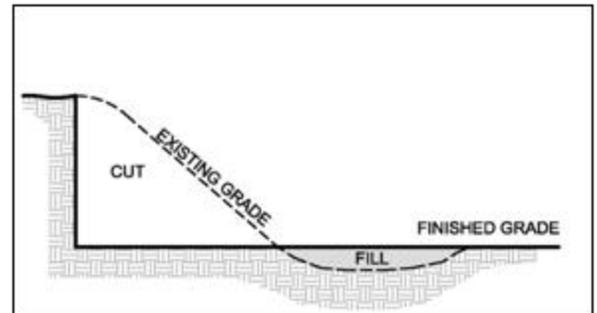
“Existing grade” means the existing condition of the elevation of the ground surface at the time of permit application and which represents (1) the natural grade prior to placement of fill on the site or the excavation or removal of earth from the site, or (2) the manufactured grade following the completion of an approved grading operation including grading approved in conjunction with the subdivision of the site.





## What does “finished grade” mean?

“Finished grade” means the final grade of the site after all clearing and grading has been completed that conforms to an approved clearing and grading plan.



## What does “elevation” mean?

Definition of “elevation” means a building face, or scaled drawing of the same, from natural grade to the highest point on the structure.

## Maximum Height Exceptions for the Central Business Zone

Projections and architectural elements that do not add habitable interior floor area to a building, such as chimneys, spires, steeples, clock towers, skylights, atriums, elevator shaft housings, stair enclosures, trellises, railings, flag poles, signs, mechanical equipment and screens, antennas and other similar items not used for human occupancy, shall be allowed to exceed the maximum allowable building height limit by **10 feet or less**.

## Maximum Height Exceptions for the Waterway Overlay Zone

- Maximum structure height shall be limited to 30 feet at the minimum setback line.
- The Bend Urban Area Planning Commission may allow increases in building heights up to the allowed height in the underlying zone the farther building sets back from the river.
- The Bend Urban Area Planning Commission may also limit building height the closer to the river a building is allowed. The building height shall be measured from the lowest natural grade facing the river to the highest measurable point on or projecting from the roof of the structure.