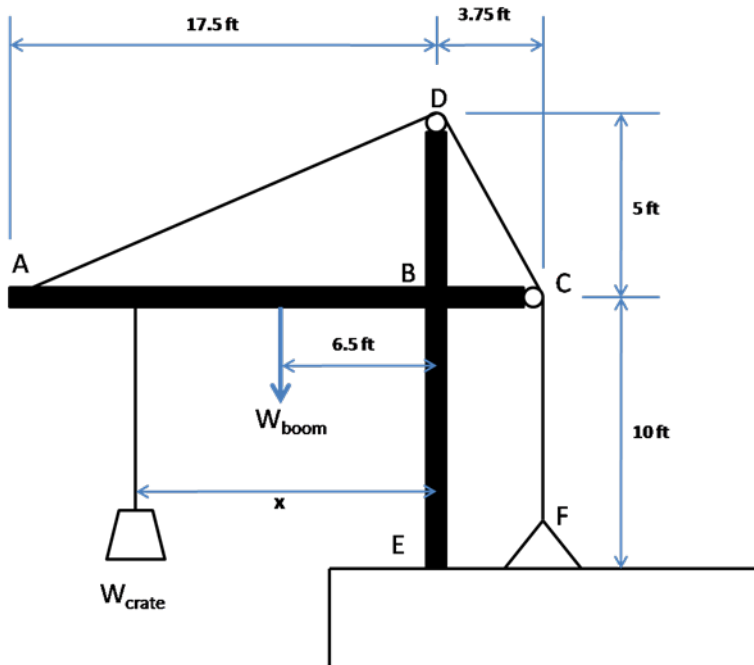


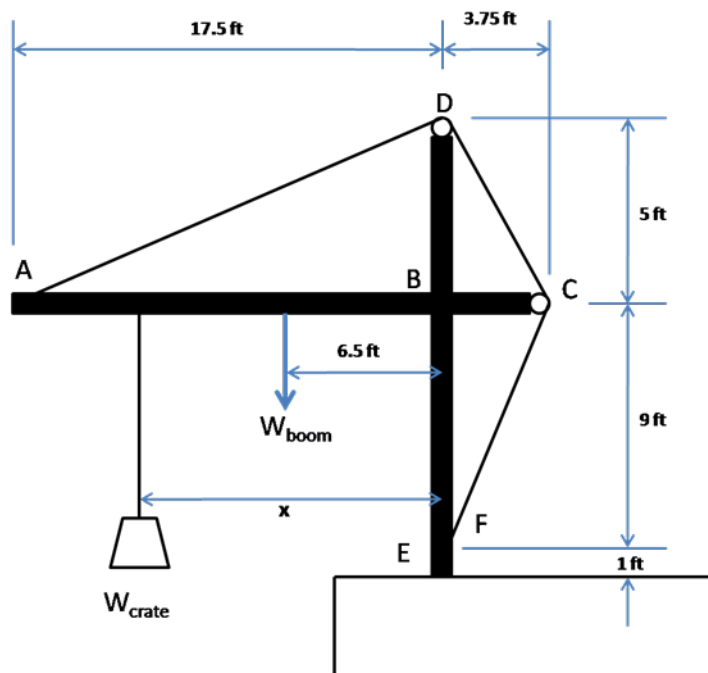
## Example

The rig shown below consists of a 1200-lb boom  $ABC$  and a vertical member  $DBE$  welded together at  $B$ . (There are frictionless pulleys at both  $C$  and  $D$ .) The rig is being used to suspend a 3600-lb crate at a distance  $x = 12$  ft from the vertical member. If the tension in the cable is 4 kips, determine the reaction at  $E$ .



## Example

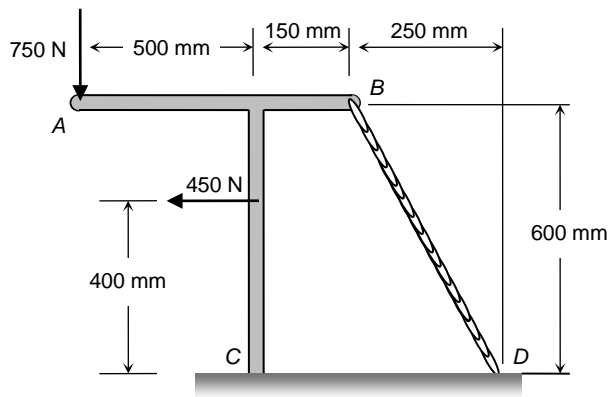
If the cable attachment point in the last example is changed as shown below, find the new reaction at  $E$ .



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### Example

Knowing that the tension in the wire  $BD$  is  $1300\text{ N}$ , determine the reaction at the fixed support  $C$  of the structure shown. Assume that the weight of the structure is negligible.



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### Example

Find the tension in the wire  $BD$ . Assume that the weight of the structure is negligible.

