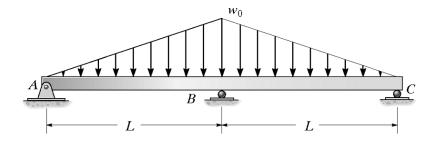
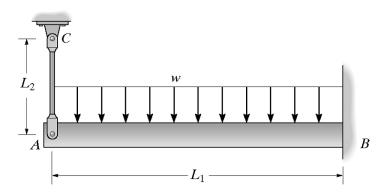
Name:

Student ID:

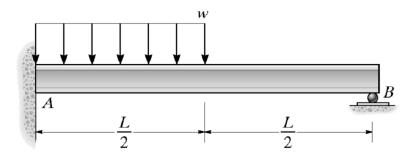
1. Determine the reactions at the supports, then draw the shear and moment diagrams. *EI* is constant.



2. The beam has a constant E_1I_1 and is supported by the fixed wall at B and the rod AC. If the rod has a cross-sectional area A_2 and the material has a modulus of elasticity E_2 , determine the force in the rod.



3. Determine the reactions at the supports *A* and *B*. *EI* is constant.



4. The beam is supported by a pin at *A*, a spring having a stiffness *k* at *B*, and a roller at *C*. Determine the force the spring exerts on the beam. *EI* is constant.

