Law of conservation of energy.

$$E_i + W = E_F$$

$$(KE + PE_g + PE_e)_i + W = (K + PE_g + PE_e)_F$$

$$KE_i + W = KE_F$$

$$W = KE_f - KE_i$$

$$W = \Delta KE$$ WORK-KE THEOREM.

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$$ME_i + W = ME_F$$

ME = mechanical energy (energy which can be observed with an naked eye - macro; easily measured). In this course we will deal with ME only.
There are other types of energy: chemical, thermal, nuclear - which are micro in nature (atomic level).

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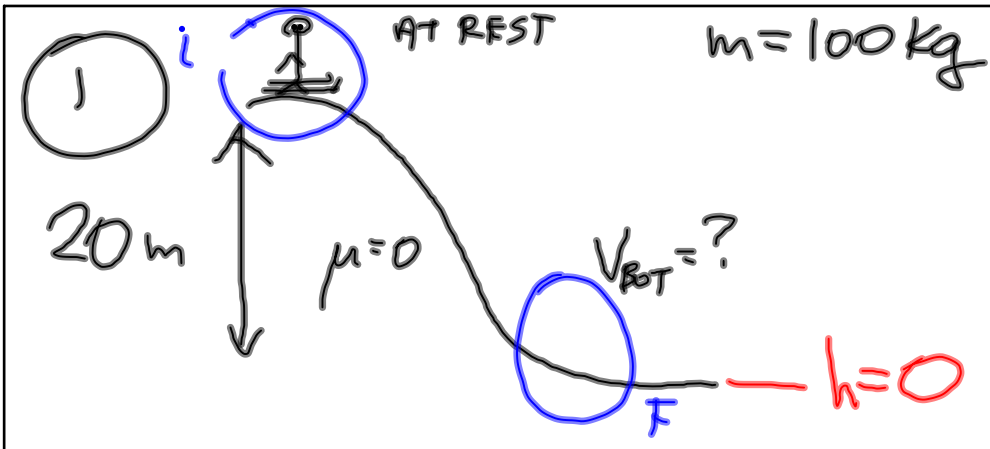

$$E_i + W = E_F$$

$$K_i + PE_{gi} = KE_F + PE_F$$

HW: Calculate the speed at the bottom of the hill.

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