KING FAHD UNIVERSITY OF PETROLEUM & MINERALS

ELECTRICAL ENGINEERING DEPARTMENT

EE-201 ELECTRIC CIRCUITS

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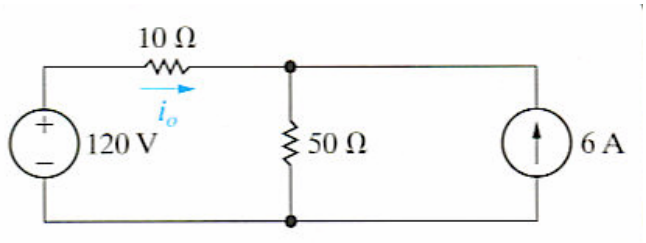
Sec: 8 **Quiz # 1** **Ser. #** **Name:** **I.D.#**

For the circuit shown below, find the value of the current "i_o".



Solution:

By KCL

$i_{50} = i_o + 6$

By KVL

$120 = 10\ (i_o) + 50\ (i_{50})$

Solve for i_o

$i_o = -3$ A