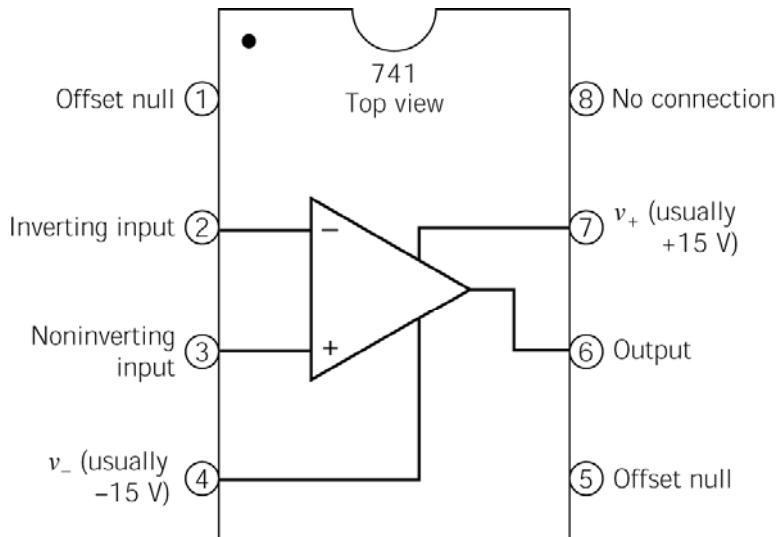
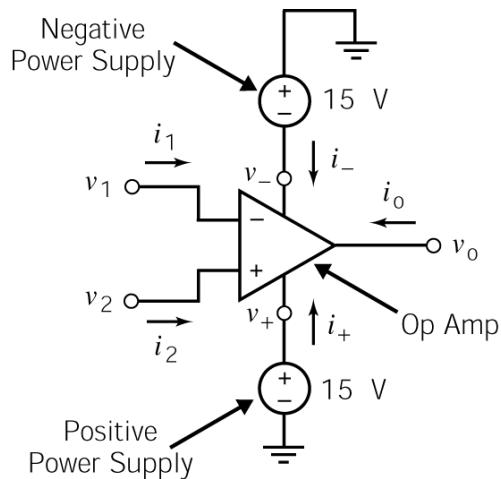


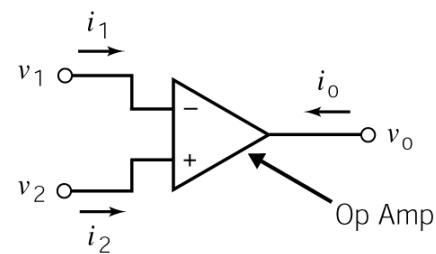
(a)



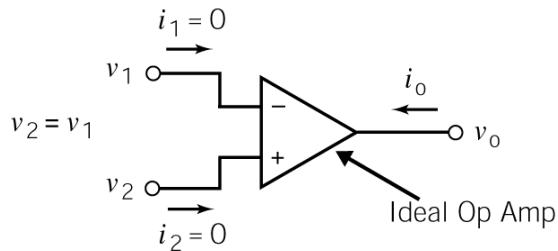
(b)



**5 terminal op amp**

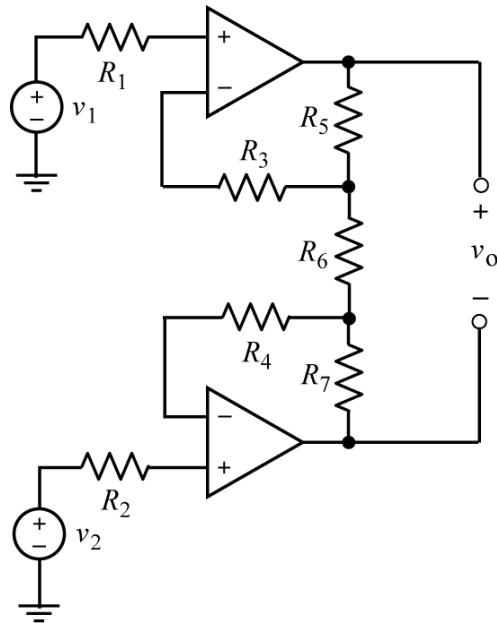


**3 terminal op amp**



**ideal op amp**

**P1** Express the output voltage,  $v_o$ , of this circuit as function of the input voltages,  $v_1$  and  $v_2$ .



**P2** Determine the values of the node voltages;  $v_1$ ,  $v_2$  and  $v_o$ ; of this circuit.

