(A) Which four of the eight connections [1]—[8] below are **needed** in order for a jump-and-link instruction to be implemented successfully? (Recall jump-and-link is \( R[d] \leftarrow \text{pc}; \ \text{pc} \leftarrow \text{addr} \))

(B) For each of those four connections, is it used in the fetch cycle, or the execute cycle?