Providing choice of path

Tw4 1h7roaches are used:

Transfer with Multiplexer

The if-then else control structure, when applied to identity micro-ops, results in the destination register requiring selective access to two different source registers.

I f $(K_1=1)$ **then R0¬ R1**
else if $(K_2=1)$ **then R0¬ R2**

$$K_1: R0¬ R1, K_1\overline{K_2}:R0¬ R2$$

he

From this we derive the circuit schematic, assuming 4-bit Registers.