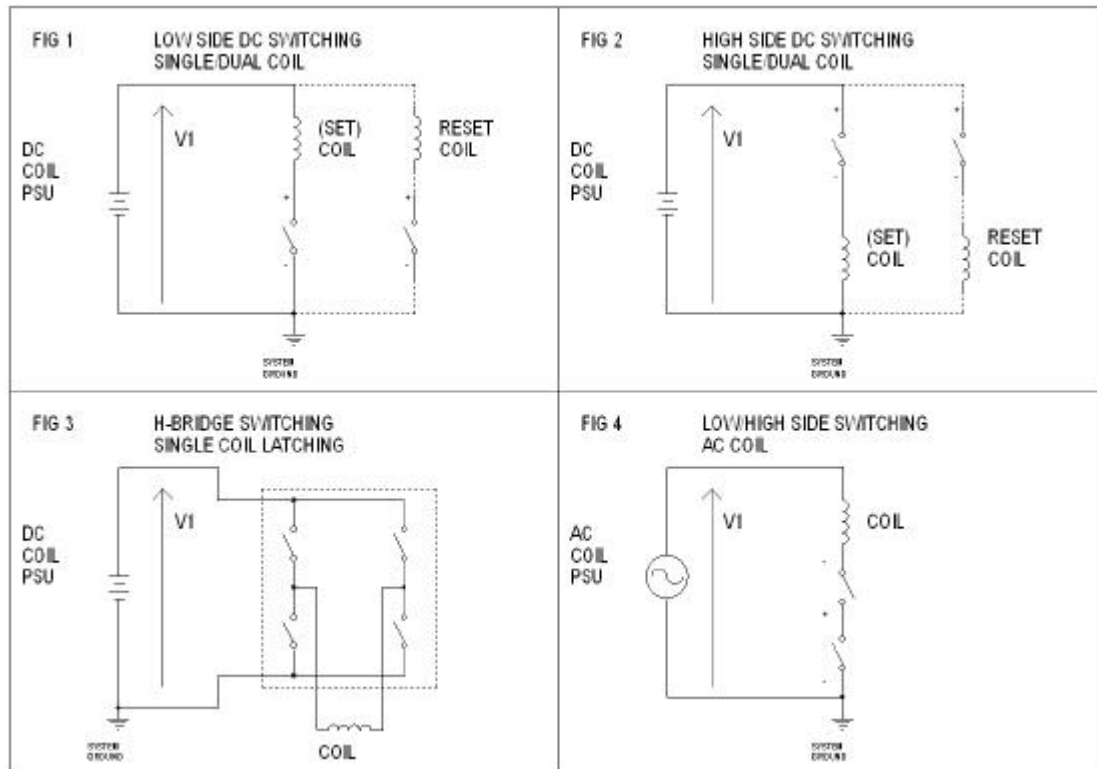


AN250706: Reflex 51 DC Switch Module Selector

The following information should be used to assist the selection of the most appropriate DC (FET based) switch module for a particular application. For more information please contact Applied Relay Testing.

The figures below show typical configurations for switching a DUT coil. The switches can also be used for general purpose switching of device loads, PSUs etc.



Notes:

1. Dual and quad DC switches are suitable for switching single coil monostable and dual coil latching relays (see fig. 1 and fig. 2).
2. H-bridge switches are suitable for switching single coil bistable (latching) relays (see fig. 3).
3. AC coils can be switched using two DC switch module elements (see fig. 4), please refer to application note AN171005 for more details. SSR relays are also available, see 'Reflex AC (SSR) Switch Module Selector' for more information about this.

DC SWITCH MODULE OPTIONS:

Switch modules are available in dual (2 switch element) and quad (4 switch element) variants. Each module is controlled via a STP RJ45 connection to a switch controller card (ASY5739) located in the reflex chassis. Up to four switch modules can be controlled by a switch controller card. The DC switch modules use optically isolated

high speed FET switching. The H-bridge switch option is designed to switch single latching relays.

QUAD SWITCHES:

Part Number	Number of switching elements	DC/AC	Max. working voltage, V1 (Volts)	Max. working current per switch (Amps)	Min. Transient clamping voltage (Volts)
Q400DC-6	4	DC*	400	6	510
Q400DC-4	4	DC*	400	4	510
Q400DC-2	4	DC*	400	2	510
Q200DC-8	4	DC*	200	8	255
Q100DC-10	4	DC*	100	10	142
Q100DC-5	4	DC*	100	5	142
Q100DC-2	4	DC*	100	2	142
Q50DC-30	4	DC*	50	30	71
Q50DC-15	4	DC*	50	15	71

DUAL SWITCHES:

Part Number	Number of switching elements	DC/AC	Max. working voltage, V1 (Volts)	Max. working current per switch (Amps)	Min. Transient clamping voltage (Volts)
D400DC-6	2	DC*	400	6	510
D400DC-4	2	DC*	400	4	510
D400DC-2	2	DC*	400	2	510
D200DC-8	2	DC*	200	8	255
D100DC-10	2	DC*	100	10	142
D100DC-5	2	DC*	100	5	142
D100DC-2	2	DC*	100	2	142
D50DC-30	2	DC*	50	30	71
D50DC-15	2	DC*	50	15	71
D50DCB-0.5	2 H-Bridge	DC	50	0.5	142

*An AC switch can be constructed by connecting 2 opposed DC switch elements in series.