

Automotive Relays

FUJITSU FBR512 SERIES COMPACT POWER TWIN AUTOMOTIVE RELAY

Features:

- 1 Pole x 2-25A
- Two independent relays mounted in a single package
- Miniature size
- High current contact capacity
- High resistance to vibration and shock
- Improved heat resistance and extended operating temperature range
- Two contact gap options

For quantities of 2500 and up, call for quote.

MOUSER STOCK NO.	Fujitsu Part No.	Fig.	Contact Form	Nominal Voltage (VDC)	Contact Rating	Price Each			
						1	100	500	1000
817-FBR512ND10-W1	FBR512ND10-W1	A	SPDT	10	25A				

DIMENSIONS: mm

A **B** **C** **D**

FUJITSU FTR-P2 SERIES: SILENT TWIN AUTOMOTIVE RELAYS

Features:

- 1 POLE x 2, H-Bridge, 25A
- Low operating sound
- Compact, high density package
- High capacity
- Ease of PCB layout
- High breaking capability
- Applications: Power windows, Doorlocks, Power seat, Wiper (for H-bridge circuit)

For quantities of 2500 and up, call for quote.

MOUSER STOCK NO.	Fujitsu Part No.	Fig.	Nominal Voltage (VDC)	Nominal Power	Coil Resistance (±10% at 20°C)	Price Each			
						1	100	500	1000
817-FTR-P2CN010W1	FTR-P2CN010W1	B	10	455mW	220Ω				

FUJITSU FTR-P3 SERIES: AUTOMOTIVE RELAYS

Features:

- 1 POLE - 25A
- Compact, high density package
- High contact capacity
- Applications: Power windows/seat, Doorlocks, Sun roof, Wiper/IWW

For quantities of 2500 and up, call for quote.

MOUSER STOCK NO.	Fujitsu Part No.	Fig.	Nominal Voltage (VDC)	Nominal Power	Coil Resistance	Price Each
817-FTR-P3CN010W1	FTR-P3CN010W1	C	10	0.6W	167Ω	

FUJITSU FTR-P4 SERIES: COMPACT TWIN AUTOMOTIVE RELAYS

Features:

- 1 POLE x 2, H-Bridge - 25A
- High density package
- High contact capacity
- Coil power savings
- Applications: Power windows/seat, Doorlocks, Sun roof, Tilt steering, Retractable antenna

For quantities of 2500 and up, call for quote.

MOUSER STOCK NO.	Fujitsu Part No.	Fig.	Nominal Voltage (VDC)	Nominal Power	Coil Resistance	Price Each
817-FTR-P4CN009W1	FTR-P4CN009W1	D	9	0.6W	135Ω	
817-FTR-P4CN010W1	FTR-P4CN010W1	D	10	0.6W	167Ω	

NEC EP2/EP1 SERIES: 25A AUTOMOTIVE RELAYS

- The EP2 H bridge type is a twin relay for forward and reverse control of motors (SPDT x 2 contact form)
- The EP2 separate type contains 2 separated relays in 1 package (SPDT x 2 contact form)
- The EP1 series is a single SPDT relay
- Nom. Operating Power: 640mW
- Flux tight housing

For quantities of 500 and up, call for quote.

MOUSER STOCK NO.	NEC Part No.	Fig.	Pin Config.	Nominal Voltage (VDC)	Coil Resistance (Ω) ±10%	Nominal Power (W)	Price Each			
							1	25	50	100
H Bridge Type										
551-EP2-3N1S	EP2-3N1S	A	1	12	225	0.64				
Separate Type										
551-EP2-3N1ST	EP2-3N1ST	A	2	12	225	0.64				
Single										
551-EP1-3N1S	EP1-3N1S	B	3	12	225	0.64				

NEC ET2/ET1 SERIES: 25A AUTOMOTIVE RELAYS

- The ET2 is a twin type relay with SPDT x 2 contact form
- The ET1 is a single SPDT relay
- Flux tight housing
- Nom. operating power: 640mW

For quantities of 500 and up, call for quote.

MOUSER STOCK NO.	NEC Part No.	Fig.	Pin Config.	Nominal Voltage (VDC)	Coil Resistance (Ω) ±10%	Nominal Power (W)
551-ET2-B3M1S	ET2-B3M1S	C	1	12	225	640
551-ET1-B3M1S	ET1-B3M1S	D	4	12	225	640

NEC EN2 SERIES: 35A AUTOMOTIVE TWIN RELAYS

- The H bridge type is for forward and reverse control of motors
- The separate type contains 2 separated relays in 1 package
- Flux tight housing
- Contact form: SPDT x 2
- Nom. operating power: 1.15W

For quantities of 500 and up, call for quote.

MOUSER STOCK NO.	NEC Part No.	Fig.	Pin Config.	Nominal Voltage (VDC)	Coil Resistance (Ω) ±10%	Nominal Power (W)	Price Each			
							1	25	50	100
H Bridge Type										
551-EN2-1N1S	EN2-1N1S	E	1	12	125	1.15				
Separate Type										
551-EN2-1N1ST	EN2-1N1ST	E	2	12	125	1.15				

NEC EQ1 SERIES: 35A AUTOMOTIVE RELAYS

- Nom. operating power: 640mW for motor control; 800mW for lamp control
- Contact form: SPDT for motor control; SPST for lamp control
- Flux tight housing

For quantities of 500 and up, call for quote.

For General Purpose Motor Control										
MOUSER STOCK NO.	NEC Part No.	Fig.	Pin Config.	Nominal Voltage (VDC)	Coil Resistance (Ω) ±10%	Nominal Power				
551-EQ1-3100S	EQ1-3100S	F	4	12	225	640mW				
For Lamp and LCR Circuit Control										
MOUSER STOCK NO.	NEC Part No.	Fig.	Pin Config.	Nominal Voltage (VDC)	Coil Resistance (Ω) ±10%	Nominal Power				
551-EQ1-2211S	EQ1-2211S	F	5	12	180	800mW				
551-EQ1-1111S	EQ1-1111S	F	5	12	144	1000mW				

NEC EX1/EX2 SERIES: 25A PC BOARD MOUNT AUTOMOTIVE RELAYS

Features:

- Approx. 75% relay volume of ET2; 65% of ET1
- Approx. 88% relay weight of ET2; 78% of ET1
- Approx. 60% relay space of ET2; 50% of ET1
- Applications: Motor control, Heater control, Solenoid control

For quantities of 500 and up, call for quote.

MOUSER STOCK NO.	NEC Part No.	Fig.	Pin Config.	Nominal Voltage (VDC)	Coil Resistance (Ω) ±10%	Nominal Power	Price Each			
							1	25	50	100
551-EX1-2U1S	EX1-2U1S	G	6	12	160	900mW				
551-EX2-2U1S	EX2-2U1S	H	7	12	160	900mW				

DIMENSIONS: mm

A **B** **C** **D** **E** **F** **G** **H**

PIN CONFIGURATIONS

1 Bridge Type 2 Separate Type 3 1 Form C 4 5 6 7

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