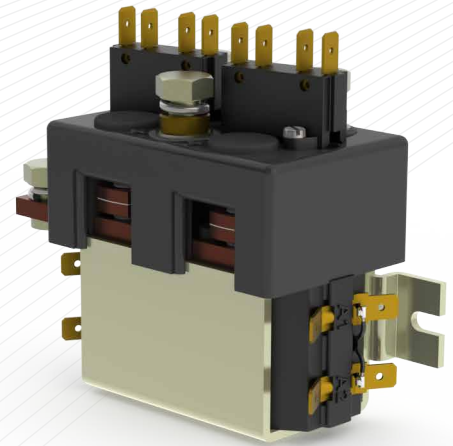


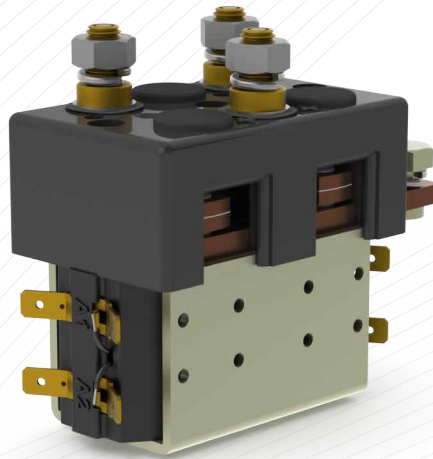
Application	Interrupted	Uninterrupted
Thermal Current Rating (I _{th})	▶	100A
Intermittent Current Rating:		
30% Duty	▶	185A
40% Duty	▶	160A
50% Duty	▶	140A
60% Duty	▶	130A
70% Duty	▶	120A
Rated Fault Current Breaking Capacity (I _{cn}) 5ms Time Constant: (in accordance with UL583*)		
DC88	▶	800A at 48V
DC88B	▶	600A at 80V
Maximum Recommended Contact Voltages (U _e):		
DC88	▶	48V D.C.
DC88B	▶	96V D.C.
Typical Voltage Drop per pole across New Contacts at 100A:		
Normally Open	▶	< 40mV
Normally Closed	▶	< 50mV
Mechanical Durability	▶	>5 x 10 ⁶ Cycles
Coil Voltage Available (U _s) (Rectifier board required for A.C.)	▶	From 6 to 240V D.C.
Coil Power Dissipation:		
Highly Intermittent Rated Types	▶	20 - 30 Watts
Intermittently Rated types	▶	15 - 20 Watts
Prolonged Rated Types	▶	13 - 15 Watts
Continuously Rated Types	▶	7 - 13 Watts
Maximum Pull-In Voltage (Coil at 20° C) Guideline:		
Highly Intermittent Rated types (Max 25% Duty Cycle)	▶	60% U _s
Intermittently Rated types (Max 70% Duty Cycle)	▶	60% U _s
Prolonged Operation (Max 90% Duty Cycle)	▶	60% U _s
Continuously Rated Types (100% Duty Cycle)	▶	66% U _s
Drop-Out Voltage Range	▶	10 - 25% U _s
Typical Pull-In Time	▶	20ms
Typical Drop-Out Time (N/O Contacts to Open):		
Without Suppression	▶	5ms
With Diode Suppression	▶	50ms
With Diode and Resistor (Subject to resistance value)	▶	8 - 20ms
Typical Main Contact Changeover Time (milliseconds):		
Normally Closed to Normally Open	▶	7ms
Normally Open to Normally Closed	▶	4ms
Typical Contact Bounce Period	▶	3ms
Operating Ambient Temperature	▶	- 40°C to + 60°C
Guideline Contactor Weight:		
DC88	▶	990 gms
Per Auxiliary	▶	+ 20 gms
With Blowouts	▶	+ 50 gms
Auxiliary Details		
Auxiliary Thermal Current Rating	▶	5A
Auxiliary Contact Switching Capabilities (Resistive Load):		
	▶	5A at 24V D.C.
	▶	2A at 48V D.C.
	▶	0.5A at 240V D.C.
Connection Conductor Sizes for Maximum Continuous Current Should be Rated Suitable for Application		
Key: ▶ = Interrupted ▲ = Uninterrupted		
Note: Where applicable values shown are at 20°C		
* Please check our web site for product UL status		

The DC88 motor reversing type of contactor has been designed for direct current loads, particularly motors as used on electric vehicles such as industrial trucks. The DC88 is a monoblock construction, resulting in a compact design which is compatible with modern electronic control systems. Developed for both interrupted and uninterrupted loads, the DC88 is suitable for switching Resistive, Capacitive and Inductive loads.

- **Interrupted** current - opening and closing on load with frequent switching (results in increased contact resistance).
- **Uninterrupted** current - no or infrequent load switching requirements (maintains a lower contact resistance).

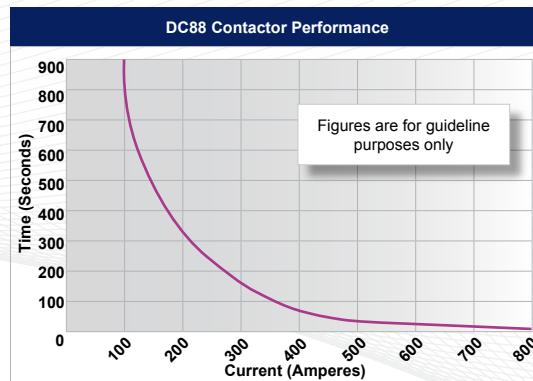


DC88A (with integral bracket)



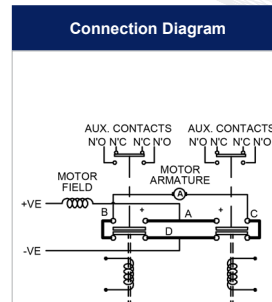
DC88 (with optional tapped holes)

The main contact circuit, designed for motor reversing, has a built in failsafe, so that if both coils are energised simultaneously the contact arrangement is open circuit. The DC88 has double breaking main contacts with silver alloy contact tips, which are weld resistant, hard wearing and have excellent conductivity. The DC88 M8 main stud terminals can be configured in a variety of ways in order to suit the application. Coil connections are by means of 6.3mm spades and mounting is via the supplied bracket and can be horizontal or vertical, when vertical the M8 contact studs should point upwards. If the requirement is for downwards orientation we can adjust the contactor to compensate for this.



DC88 Contactor Performance

Contact Performance Key:
— Interrupted and Uninterrupted Current



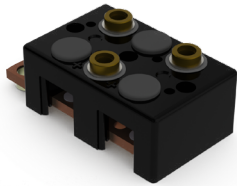
Connection Diagram

DC88 Available Options		
General		Suffix
Auxiliary Contacts	○	A
Auxiliary Contacts - V3	X	
Magnetic Blowouts†	○	B
Magnetic Blowouts - High Powered†	○	B
Armature Cap	○	
Mounting Brackets (For options see overleaf)	○	
Magnetic Latching† (Not fail safe)	○	M
Closed Contact Housing‡	○	
Environmentally Protected IP66 (see DC88-1000P Catalogue sheet)	○	P
EE Type (Steel Shroud)	○	
Contacts		
Large Tips	○	L
Textured Tips	○	T
Silver Plating	X	
Coil		
AC Rectifier Board (Fitted)	○	
Coil Suppression†	○	
Flying Leads	○	F
Manual Override Operation	○	
M4 Stud Terminals	X	
M5 Terminal Board	○	
Vacuum Impregnation	○	
Key: Optional ○ Standard ● Not Available X		
† Connections become polarity sensitive		
‡ Open Housing Available		

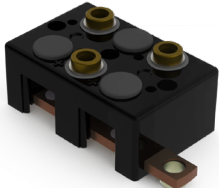
- Performance data provided should be used as a guide only. Some de-rating or variation from figures may be necessary according to application.
- Thermal current ratings stated are dependant upon the size of conductor being used
- For further technical advice email: technical@albrightinternational.com
- Albright reserve the right to change data without prior notice

Top Cover Configurations

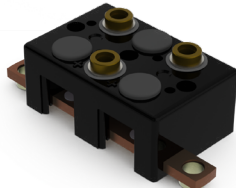
Normally Closed Contact



Standard

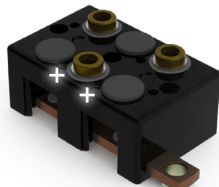


Alternative

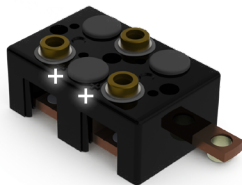


Double Ended

Polarity Orientation



+ Forward

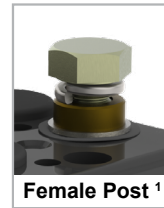


+ Reversed

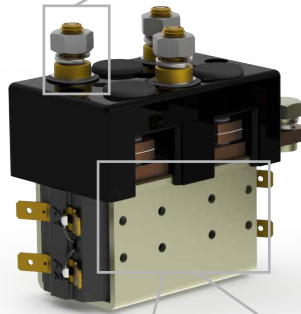
Main Terminal Options and Mounting Options



Stud Male Post

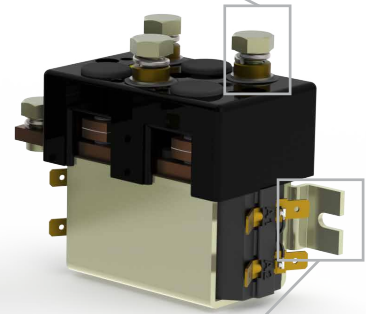


Female Post ¹



M4 Tapped Holes

L Bracket ²



Integrated Bracket ¹

¹ Fitted as Standard ² See Stud Range Catalogue for Details

