



Main

Range of product	TeSys
Range	TeSys
Product name	TeSys B
Product or component type	Contacteur
Device short name	CV1BF
Contacteur application	Resistive circuits, heating, lighting Motor
Utilisation category	AC-3 AC-1
Control circuit type	DC
Poles description	3P
Pole contact composition	2 NO + 1 NC
[Ie] rated operational current	80 A AC for control circuit
Current rating code of contacteur	BF
Auxiliary contact composition	1 NO + 1 NC
[Uc] control circuit voltage	110 V AC 50 Hz

Complementary

Auxiliary contacts type	Type instantaneous (1 NO + 1 NC)
Control circuit voltage limits	0.85...1.1 U _c at (<= 55 °C) operational 0.1...0.65 U _c at (<= 55 °C) drop-out
[Ui] rated insulation voltage	690 V - conforming to IEC 60947-4
Connections - terminals	Control circuit : cable with lug 1 cable 25 mm ² Control circuit : cable connector 2 cable 16 mm ²
Tightening torque	Control circuit : 1.2 N.m - on with cable end - cable 2...4 mm ² Control circuit : 1.2 N.m - on with cable end - cable 1...4 mm ² Power circuit : 9 N.m - on cable with lug - cable 25 mm ² Power circuit : 9 N.m - on cable connector - cable 16 mm ² Control circuit : 1.2 N.m - on without cable end - cable 2...6 mm ² Control circuit : 1.2 N.m - on without cable end - cable 1...6 mm ²
[U _e] rated operational voltage	690 V AC for control circuit
[I _{th}] conventional free air thermal current	80 A at <= 40 °C for control circuit
I _{rm} s rated making capacity	1600 A at 690 V DC for control circuit conforming to IEC 60947-4-1

[I _{cw}] rated short-time withstand current	640 A at ≤ 40 °C 5 s control circuit 640 A at ≤ 40 °C 10 s control circuit 380 A at ≤ 40 °C 30 s control circuit 320 A at ≤ 40 °C 60 s control circuit 200 A at ≤ 40 °C 180 s control circuit 130 A at ≤ 40 °C 600 s control circuit
Associated fuse rating	80 A aM at ≤ 400 V for control circuit 125 A g1 at ≤ 400 V for control circuit
Power dissipation per pole	7.6 W AC-3 9.6 W AC-1
Inrush power in W	20...27 W
Hold-in power consumption in W	20...27 W
Operating time	130 ms contactor closed DC 30 ms contactor open DC
Mechanical durability	5000000 cycles
Operating rate	≤ 120 cyc/mn at ≤ 55 °C
Rated operational power in W	300 W at 24 V - electrical durability: 1000000 cycles - for control circuit 115 W at 24 V - electrical durability: 3000000 cycles - for control circuit 45 W at 24 V - electrical durability: 10000000 cycles - for control circuit
Compatibility code	CV1BF

Environment

Standards	IEC 60947-4 EN 60947-4
Product certifications	Bureau Veritas CEI CSA
IP degree of protection	IP00 conforming to IEC 60529
Ambient air temperature for operation	-5...55 °C
Ambient air temperature for storage	-60...80 °C
Operating altitude	2000 m
Shock resistance	4 gn for frequencies ≤ 30 Hz 2 gn for frequencies > 30 Hz
Vibration resistance	4 gn for frequencies ≤ 30 Hz 2 gn for frequencies > 30 Hz