





Product designation Product type designation			Power contactor BG09
Contact characteristics			БСОЭ
Number of poles		Nr.	3
Rated insulation voltage Ui IEC/EN		V	690
Rated impulse withstand voltage Uimp		kV	6
Operational frequency			
operation in equations	min	Hz	25
	max	Hz	400
IEC Conventional free air thermal current Ith		Α	20
Operational current le			
·	AC-1 (≤40°C)	Α	20
	AC-1 (≤55°C)	Α	18
	AC-1 (≤70°C)	Α	15
	AC-3 (≤440V ≤55°C)	Α	9
	AC-4 (400V)	Α	4
Rated operational power AC-3 (T≤55°C)			
	230V	kW	2.2
	400V	kW	4
	415V	kW	4.3
	440V	kW	4.5
	500V	kW	5
	690V	kW	5
Rated operational power AC-1 (T≤40°C)			
	230V	kW	8
	400V	kW	14
	500V	kW	16
	690V	kW	22
IEC max current le in DC1 with L/R ≤ 1ms with 1 poles in series			
	≤24V	Α	12
	48V	Α	10
	75V	Α	4
	110V	A	3
150	220V	Α	
IEC max current le in DC1 with L/R ≤ 1ms with 2 poles in series	40 AV /	•	4-
	≤24V	A	15
	48V	A	14
	75V	A	9
	110V	A	8
IFC may current le in DC1 with L/D < 1 mg with 2 notes in series	220V	Α	
IEC max current le in DC1 with L/R ≤ 1ms with 3 poles in series	<2A1	۸	16
	≤24V 48V	A	16 16
	48 V 75 V	A	16 10
	75V 110V	A A	10
	1100	^	10





	220V	Α	2
IEC max current le in DC1 with L/R ≤ 1ms with 4 poles in series			
	≤24V	Α	16
	48V	Α	16
	75V	A	10
	110V	A	10
	220V	A	2
IEC max current le in DC3-DC5 with L/R ≤ 15ms with 1 poles in series	220 V		
ILO MAX current le in DO3-DO3 with L/IV 3 13ms with 1 poles in series	~ 04\/	٨	7
	≤24V	A	7
	48V	Α	6
	75V	Α	2
	110V	Α	1
	220V	Α	_
IEC max current le in DC3-DC5 with L/R ≤ 15ms with 2 poles in series			
	≤24V	Α	8
	48V	Α	8
	75V	Α	5
	110V	Α	4
	220V	A	_
IEC max current le in DC3-DC5 with L/R ≤ 15ms with 3 poles in series	ZZU V		-
TEO may content to in 200-2003 with E/K > 13ms with 3 poles in series	-01V	۸	10
	≤24V	A	10
	48V	Α	10
	75V	Α	6
	110V	Α	5
	220V	Α	0,8
IEC max current le in DC3-DC5 with L/R ≤ 15ms with 4 poles in series			
	≤24V	Α	10
	48V	Α	10
	75V	Α	6
	110V	Α	5
	220V	A	0,8
Short time allowable current for 10s (IEC/ENG0047.1)	220 V	A	96
Short-time allowable current for 10s (IEC/EN60947-1)		A	90
Protection fuse	. 0 (150)		00
	gG (IEC)	Α	20
	aM (IEC)	A	10
Making capacity (RMS value)		Α	92
Breaking capacity at voltage			
	440V	Α	72
	500V	Α	72
	690V	Α	72
Resistance per pole (average value)		mΩ	10
Power dissipation per pole (average value)			. •
. 5.1.5. Glospation por poro (avorago valuo)	Ith	W	4
	AC-3	W	0.81
Tightoning targue for terminals	AU-3	٧٧	U.O I
Tightening torque for terminals			0.0
	min	Nm	0.8
	max	Nm	1
	min	lbin	9
	max	lbin	9
Tightening torque for coil terminal			
	min	Nm	0.8
	max	Nm	1
	min	lbin	9
	111111	15111	•





		max	lbin	9
Max number of wires	simultaneously connectable		Nr.	2
Conductor section				
	AWG/Kcmil			
		max		12
	Flexible w/o lug conductor section			
		min	mm²	0.75
		max	mm²	2.5
	Flexible c/w lug conductor section			
		min	mm²	1.5
		max	mm²	2.5
	Flexible with insulated spade lug conductor section			
	, ,	min	mm²	1.5
		max	mm²	2.5
	- '			IP20 when
Power terminal prote	ection according to IEC/EN 60529			properly wired
Mechanical features				
Operating position				
. 01		normal		Vertical plan
		allowable		±30°
				Screw / DIN rail
Fixing				35mm
Weight			g	177
Conductor section				
	AWG/kcmil conductor section			
	/ W G/Komiii domaddor dddidii	max		12
Auxiliary contact chai	racteristics	Пах		12
Thermal current Ith	(40.01101100		А	10
IEC/EN 60947-5-1 de	esignation		,,	A600 - Q600
Operating current AC	-			71000 0000
operating current Ac	710	230V	Α	3
		400V	A	1.9
		500V	A	1.4
Operating ourrest DC	212	300 V	^	1.4
Operating current DC	,12	440)/	۸	0.0
O		110V	A	2.9
Operating current DC	713			0.0
		- · · ·		-) ()
		24V	A	2.9
		48V	Α	1.4
		48V 60V	A A	1.4 1.2
		48V 60V 110V	A A A	1.4 1.2 0.6
		48V 60V 110V 125V	A A A	1.4 1.2 0.6 0.55
		48V 60V 110V 125V 220V	A A A A	1.4 1.2 0.6 0.55 0.3
		48V 60V 110V 125V	A A A	1.4 1.2 0.6 0.55
		48V 60V 110V 125V 220V	A A A A	1.4 1.2 0.6 0.55 0.3 0.1
Mechanical life		48V 60V 110V 125V 220V	A A A A A cycles	1.4 1.2 0.6 0.55 0.3 0.1
Mechanical life Electrical life		48V 60V 110V 125V 220V	A A A A	1.4 1.2 0.6 0.55 0.3 0.1
Mechanical life Electrical life Safety related data		48V 60V 110V 125V 220V	A A A A A cycles	1.4 1.2 0.6 0.55 0.3 0.1
Mechanical life Electrical life Safety related data	10d according to EN/ISO 13489-1	48V 60V 110V 125V 220V	A A A A A cycles	1.4 1.2 0.6 0.55 0.3 0.1
Mechanical life Electrical life Safety related data	10d according to EN/ISO 13489-1	48V 60V 110V 125V 220V	A A A A A cycles	1.4 1.2 0.6 0.55 0.3 0.1
Mechanical life Electrical life Safety related data	·	48V 60V 110V 125V 220V 600V	A A A A A Cycles	1.4 1.2 0.6 0.55 0.3 0.1 20000000 500000
Mechanical life Electrical life Safety related data Performance level B	·	48V 60V 110V 125V 220V 600V	A A A A A Cycles cycles	1.4 1.2 0.6 0.55 0.3 0.1 20000000 500000
	me	48V 60V 110V 125V 220V 600V	A A A A A Cycles cycles	1.4 1.2 0.6 0.55 0.3 0.1 20000000 500000 500000





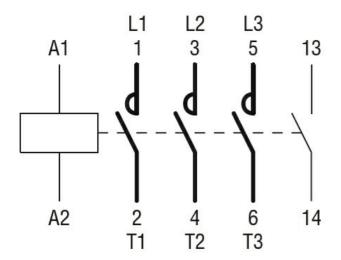
	: 50/60Hz			V	400
C operating voltage					
	of 50/60Hz coil pov	pick-up			
		ρισκ-αρ	min	%Us	75
			max	%Us	115
		drop-out			
			min	%Us	20
			max	%Us	55
	of 50/60Hz coil pov				
		pick-up		0/11	
			min	%Us	80
		drap out	max	%Us	115
		drop-out	min	%Us	20
			max	%Us	55
C average coil con	sumption at 20°C		- Indx	7000	
	of 50/60Hz coil pov	wered at 50Hz			
			in-rush	VA	30
			holding	VA	4
	of 50/60Hz coil pov	vered at 60Hz			
			in-rush	VA	25
			holding	VA	3
	of 60Hz coil power	ed at 60Hz			
			in-rush	VA	30
Ni - i 4i 4 - -	<00°C FOLI-		holding	VA	4
Dissipation at holdin Max cycles frequence				W	0.95
Mechanical operation				cycles/h	3600
Operating times				Cyclc3/11	3000
verage time for Us	control				
J	in AC				
		Closing NO			
			min	ms	12
			min max	ms ms	12 21
		Opening NO	max	ms	21
		Opening NO	max min	ms ms	9
			max	ms	21
		Opening NO Closing NC	max min max	ms ms ms	21918
			max min max min	ms ms ms	2191817
		Closing NC	max min max	ms ms ms	21918
			max min max min max	ms ms ms ms	219181726
		Closing NC	max min max min max min	ms ms ms ms	2191817267
	in DC	Closing NC	max min max min max	ms ms ms ms	219181726
	in DC	Closing NC	max min max min max min	ms ms ms ms	2191817267
	in DC	Closing NC Opening NC	max min max min max min	ms ms ms ms	21 9 18 17 26 7 17
	in DC	Closing NC Opening NC Closing NO	max min max min max min max	ms ms ms ms ms	21 9 18 17 26 7 17
	in DC	Closing NC Opening NC	max min max min max min max min max	ms ms ms ms ms ms	21 9 18 17 26 7 17
	in DC	Closing NC Opening NC Closing NO	max min max min max min max min max min max	ms	21 9 18 17 26 7 17
	in DC	Closing NC Opening NC Closing NO Opening NO	max min max min max min max min max	ms ms ms ms ms ms ms ms ms	21 9 18 17 26 7 17
	in DC	Closing NC Opening NC Closing NO	max min max min max min max min max min max	ms	21 9 18 17 26 7 17 18 25 2 3
	in DC	Closing NC Opening NC Closing NO Opening NO	max min max min max min max min max min max	ms	21 9 18 17 26 7 17 18 25



Opening NC

	Opening in	0		
		min	ms	11
		max	ms	17
UL technical data				
	for the combined A.C. market			
Full-load current (FLA)	for three-phase AC motor		_	
		at 480V	Α	7.6
		at 600V	Α	6.1
Yielded mechanical pe	erformance			
riolada moonamaa po	for single-phase AC motor			
	ioi sirigie-priase AC motor	440/420\/	LID	0.5
		110/120V	HP	0.5
		230V	HP	1.5
	for three-phase AC motor			
		200/208V	HP	2
		220/230V	HP	3
		460/480V	HP	5
_ 		575/600V	HP	5
General USE				
	Contactor			
		AC current	Α	20
Short-circuit protection	fuse 600V			
Chort official protoction				
	High fault	Chart discult assess of	I. A	400
		Short circuit current	kA	100
		Fuse rating	Α	30
		Fuse class		J
	Standard fault			
		Short circuit current	kA	5
		Fuse rating	Α	30
		Fuse class		RK5
0 1 1 1 1		ruse class		
	ary contacts according to UL			A600 - Q600
Ambient conditions				
Temperature				
	Operating temperature			
		min	°C	-50
		max	°C	+70
	Ctoro ao tomo o acturo	IIIax		+10
	Storage temperature		^~	00
		min	°C	-60
		max	°C	+80
Max altitude			m	3000
Resistance & Protection	on			
Pollution degree				3
Dimensions				
(0.38") (0.38")	57 (2.24") (2.24") (3.37")	3.2 (1.37") 3.2 (0.12)	(2.28")	RE9 7.6 (0.30")
8.5 (0.33")		(1.73")		89.2 (3.51") (0.30")
Wiring diagrams				





Certifications and compliance

Compliance

CSA C22.2 n° 60947-1

CSA C22.2 n° 60947-4-1

IEC/EN 60947-1

IEC/EN 60947-4-1

UL 60947-1

UL 60947-4-1

Certificates

CCC

cULus

EAC

ETIM classification

ETIM 8.0

EC000066 -Power contactor, AC switching