



Product type designation  Contact characteristics  Number of poles  Nr. 3	Power contactor BF65
Contact characteristics Number of poles Nr. 3	
Number of poles Nr. 3	
'	
<u> </u>	3
	1000
Rated impulse withstand voltage Uimp kV 8	
Operational frequency	
	25
	400
	100
Operational current le	
•	100
·	30
· · ·	70
· · ·	65
· · · · · · · · · · · · · · · · · · ·	31
Rated operational power AC-3 (T≤55°C)	<u> </u>
· · · · · · · · · · · · · · · · · · ·	18.5
	30
	37
	37
	37 45
	30
Rated operational current AC-3 (T≤55°C)	30
	65
	65
	65
	65
	53
	47
	25
Rated operational power AC-1 (T≤40°C)	23
. , ,	38
	56 65
	32 32
	114
IEC max current le in DC1 with L/R ≤ 1ms with 1 poles in series	114
	=0
	50 50
	50 50
	50
IEC max current le in DC1 with L/R ≤ 1ms with 2 poles in series ≤24V A 7	70
=24V A /	10



	48V	Α	70
	75V	Α	70
	110V	Α	60
	220V	Α	9
IEC max current le in DC1 with L/R ≤ 1ms with 3 poles in series			
TEO max ouncire to in Bo 1 with E/1 = 1mo with o poleo in series	≤24V	Α	70
	48V	A	70
	75V		
		A	70
	110V	A	60
150	220V	Α	90
IEC max current le in DC1 with L/R ≤ 1ms with 4 poles in series		_	
	≤24V	Α	70
	48V	Α	70
	75V	Α	70
	110V	Α	70
	220V	Α	110
IEC max current le in DC3-DC5 with L/R ≤ 15ms with 1 poles in series			
	≤24V	Α	35
	48V	Α	25
	75V	Α	25
	110V	Α	3
	220V	A	_
IEC max current le in DC3-DC5 with L/R ≤ 15ms with 2 poles in series	2201	- / \	
ILO max current le in Dos-Dos with L/N = 15ms with 2 poles in series	≤24V	۸	4 E
		A	45
	48V	A	40
	75V	A	40
	110V	Α	30
	220V	Α	5
IEC max current le in DC3-DC5 with L/R ≤ 15ms with 3 poles in series			
	≤24V	Α	55
	48V	Α	50
	75V	Α	50
	110V	Α	35
	220V	Α	52
IEC max current le in DC3-DC5 with L/R ≤ 15ms with 4 poles in series			
	≤24V	Α	60
	48V	Α	60
	75V	Α	60
	110V	A	50
	220V	A	65
Short-time allowable current for 10s (IEC/EN60947-1)	220 v	A	640
Protection fuse			UTU
i ioteotion iuse	~C /IFO\	۸	105
	gG (IEC)	A	125
M 1: " (DMO 1 )	aM (IEC)	A	80
Making capacity (RMS value)		Α	650
Breaking capacity at voltage			
	440V	Α	520
	500V	Α	425
	690V	Α	376
Resistance per pole (average value)		mΩ	0.8
Power dissipation per pole (average value)			
, , , , , ,	Ith	W	8
	AC-3	W	3.4
Tightening torque for terminals	7.0 0	• •	J. 1
Tightoning torque for terminais			



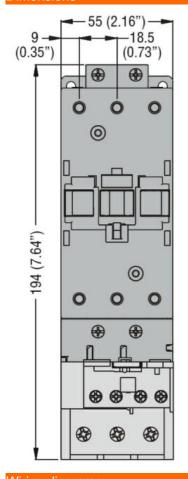
		min	Nm	4
		max	Nm	5
		min	Ibin	2.95
		max	Ibin	3.69
Tightening torque for o	coil terminal			
rigintorning torquo for t		min	Nm	0.8
			Nm	1
		max		
		min	lbin	0.8
<del></del>		max	Ibin	0.74
	simultaneously connectable		Nr.	2
Conductor section				
	AWG/Kcmil			
		max		2
	Flexible w/o lug conductor section			
	, and the second	min	mm²	1.5
		max	mm²	35
	Flexible c/w lug conductor section	Пих		
	1 ISAISIO OF WING CONTINUOTO SECTION	min	mm²	1.5
				35
Danier tame to the training	tion according to IEO/EN 00500	max	mm²	
	tion according to IEC/EN 60529			IP20 front
Mechanical features				
Operating position				
		normal		Vertical plan
		allowable		±30°
Fixing				Screw / DIN rail 35mm
Weight			~	1060
			u	1000
			g	1000
Conductor section	AWG/kamil conductor section		<u>g</u>	1000
	AWG/kcmil conductor section	mov	<u>g</u>	
Conductor section	AWG/kcmil conductor section	max	g	2
Conductor section  Operations	AWG/kcmil conductor section	max		2
Conductor section  Operations  Mechanical life	AWG/kcmil conductor section	max	cycles	15000000
Conductor section  Operations  Mechanical life  Electrical life	AWG/kcmil conductor section	max		2
Operations Mechanical life Electrical life Safety related data		max	cycles	15000000
Operations Mechanical life Electrical life Safety related data	AWG/kcmil conductor section  Od according to EN/ISO 13489-1	max	cycles	15000000
Operations Mechanical life Electrical life Safety related data		max rated load	cycles	15000000
Operations Mechanical life Electrical life Safety related data			cycles cycles	2 15000000 1400000
Operations Mechanical life Electrical life Safety related data Performance level B1	0d according to EN/ISO 13489-1	rated load	cycles cycles	2 15000000 1400000 1400000 15000000
Operations Mechanical life Electrical life Safety related data Performance level B1 Mirror contats accordi		rated load	cycles cycles	2 15000000 1400000 1400000 150000000 yes
Operations Mechanical life Electrical life Safety related data Performance level B1  Mirror contats accordi EMC compatibility	0d according to EN/ISO 13489-1	rated load	cycles cycles	2 15000000 1400000 1400000 15000000
Conductor section  Operations Mechanical life Electrical life Safety related data Performance level B1  Mirror contats accordi EMC compatibility AC coil operating	0d according to EN/ISO 13489-1 ng to IEC/EN 609474-4-1	rated load	cycles cycles	2 15000000 1400000 1400000 150000000 yes
Operations Mechanical life Electrical life Safety related data Performance level B1  Mirror contats accordi EMC compatibility	0d according to EN/ISO 13489-1 ng to IEC/EN 609474-4-1	rated load mechanical load	cycles cycles cycles cycles	2 15000000 1400000 1400000 15000000 yes yes
Conductor section  Operations Mechanical life Electrical life Safety related data Performance level B1  Mirror contats accordi EMC compatibility AC coil operating	0d according to EN/ISO 13489-1 ng to IEC/EN 609474-4-1	rated load mechanical load min	cycles cycles cycles cycles	2 15000000 1400000 1400000 150000000 yes yes
Operations Mechanical life Electrical life Safety related data Performance level B1  Mirror contats accordi EMC compatibility AC coil operating Rated AC voltage at 5	0d according to EN/ISO 13489-1 ng to IEC/EN 609474-4-1	rated load mechanical load	cycles cycles cycles cycles	2 15000000 1400000 1400000 15000000 yes yes
Conductor section  Operations Mechanical life Electrical life Safety related data Performance level B1  Mirror contats accordi EMC compatibility AC coil operating	0d according to EN/ISO 13489-1 ng to IEC/EN 609474-4-1	rated load mechanical load min	cycles cycles cycles cycles	2 15000000 1400000 1400000 150000000 yes yes
Operations Mechanical life Electrical life Safety related data Performance level B1  Mirror contats accordi EMC compatibility AC coil operating Rated AC voltage at 5	0d according to EN/ISO 13489-1  ng to IEC/EN 609474-4-1  0/60Hz, 60Hz  of 50/60Hz coil powered at 50Hz	rated load mechanical load min	cycles cycles cycles cycles	2 15000000 1400000 1400000 150000000 yes yes
Operations Mechanical life Electrical life Safety related data Performance level B1  Mirror contats accordi EMC compatibility AC coil operating Rated AC voltage at 5	0d according to EN/ISO 13489-1 ng to IEC/EN 609474-4-1	rated load mechanical load min	cycles cycles cycles cycles	2 15000000 1400000 1400000 150000000 yes yes
Operations Mechanical life Electrical life Safety related data Performance level B1  Mirror contats accordi EMC compatibility AC coil operating Rated AC voltage at 5	0d according to EN/ISO 13489-1  ng to IEC/EN 609474-4-1  0/60Hz, 60Hz  of 50/60Hz coil powered at 50Hz	rated load mechanical load min	cycles cycles cycles cycles	2 15000000 1400000 1400000 150000000 yes yes
Operations Mechanical life Electrical life Safety related data Performance level B1  Mirror contats accordi EMC compatibility AC coil operating Rated AC voltage at 5	0d according to EN/ISO 13489-1  ng to IEC/EN 609474-4-1  0/60Hz, 60Hz  of 50/60Hz coil powered at 50Hz	rated load mechanical load min max	cycles cycles cycles cycles	2 15000000 1400000 1400000 150000000 yes yes 60 110
Operations Mechanical life Electrical life Safety related data Performance level B1  Mirror contats accordi EMC compatibility AC coil operating Rated AC voltage at 5	of 50/60Hz coil powered at 50Hz drop-out	rated load mechanical load min max	cycles cycles cycles cycles	2 15000000 1400000 1400000 150000000 yes yes 60 110
Operations Mechanical life Electrical life Safety related data Performance level B1  Mirror contats accordi EMC compatibility AC coil operating Rated AC voltage at 5	Od according to EN/ISO 13489-1  ng to IEC/EN 609474-4-1  O/60Hz, 60Hz  of 50/60Hz coil powered at 50Hz drop-out	rated load mechanical load min max	cycles cycles cycles cycles	2 15000000 1400000 1400000 150000000 yes yes 60 110
Operations Mechanical life Electrical life Safety related data Performance level B1  Mirror contats accordi EMC compatibility AC coil operating Rated AC voltage at 5	of 50/60Hz coil powered at 50Hz drop-out	rated load mechanical load  min max  min	cycles cycles cycles cycles v v	2 15000000 1400000 1400000 15000000 yes yes 60 110 ≤70 Us min
Operations Mechanical life Electrical life Safety related data Performance level B1  Mirror contats accordi EMC compatibility AC coil operating Rated AC voltage at 5	od according to EN/ISO 13489-1  ng to IEC/EN 609474-4-1  of 50/60Hz coil powered at 50Hz drop-out  of 50/60Hz coil powered at 60Hz pick-up	rated load mechanical load min max	cycles cycles cycles cycles	2 15000000 1400000 1400000 150000000 yes yes 60 110
Operations Mechanical life Electrical life Safety related data Performance level B1  Mirror contats accordi EMC compatibility AC coil operating Rated AC voltage at 5	of 50/60Hz coil powered at 50Hz drop-out	rated load mechanical load  min max  min	cycles cycles cycles cycles v v	2 15000000 1400000 1400000 15000000 yes yes 60 110 ≤70 Us min

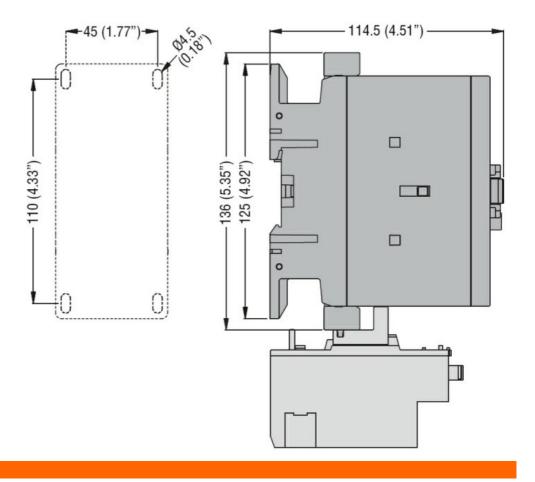


AC average coil consu				
	of 50/60Hz coil powered at 50Hz			
		in-rush	VA	35120
		holding	VA	1.53.7
	of 50/60Hz coil powered at 60Hz			
		in-rush	VA	35120
		holding	VA	1.53.7
Dissipation at holding:			W	12.5
DC coil operating				
DC rated control voltage	 je			
	•	min	V	60
		max	V	110
DC operating voltage				
3 3 3 3 3	pick-up			
	p.o.c. up	min	%Us	80 Us min
		max	%Us	110 Us max
	drop-out	IIIdA	,003	110 00 1110.
	alop out	max	%Us	≤70 Us min
	tion <20°C	IIIax	/803	270 OS IIIII
Average con consump	uon ≥20 C	دا میں سیا	۱۸/	22 60
		in-rush	W	2368
May avalog frequency		holding	W	1.21,9
Max cycles frequency			l/l-	4500
Mechanical operation			cycles/h	1500
Operating times				
Average time for Us co				
	in AC			
	Closing NO	_		
		min	ms	12
		max	ms	28
	Opening NO			
		min	ms	8
		max	ms	22
	' DO			
	in DC			
	Closing NO			
		min	ms	40
	Closing NO	min max	ms ms	40 85
				85
	Closing NO			85 20
	Closing NO	max	ms	85
UL technical data	Closing NO Opening NO	max min	ms ms	85 20
	Closing NO	max min	ms ms	85 20
	Closing NO Opening NO	max min	ms ms	85 20
	Closing NO Opening NO	max min max	ms ms ms	85 20 55
Full-load current (FLA)	Closing NO Opening NO for three-phase AC motor	max min max at 480V	ms ms ms	85 20 55 65
Full-load current (FLA)	Closing NO Opening NO of for three-phase AC motor erformance	max min max at 480V	ms ms ms	85 20 55 65
Full-load current (FLA)	Closing NO Opening NO for three-phase AC motor	max min max at 480V at 600V	ms ms ms	85 20 55 65 62
Full-load current (FLA)	Closing NO Opening NO of for three-phase AC motor erformance	max min max  at 480V at 600V	ms ms ms	85 20 55 65 62 20
Full-load current (FLA)	Closing NO Opening NO of for three-phase AC motor erformance	max min max  at 480V at 600V  200/208V 220/230V	ms ms ms A A	85 20 55 65 62 20 25
Full-load current (FLA)	Closing NO Opening NO of for three-phase AC motor erformance	max min max  at 480V at 600V  200/208V 220/230V 460/480V	ms ms ms A A HP HP	85 20 55 65 62 20 25 50
Full-load current (FLA) Yielded mechanical pe	Closing NO Opening NO of for three-phase AC motor erformance	max min max  at 480V at 600V  200/208V 220/230V	ms ms ms A A	85 20 55 65 62 20 25
Full-load current (FLA) Yielded mechanical pe	Opening NO  Opening NO  of for three-phase AC motor  erformance for three-phase AC motor	max min max  at 480V at 600V  200/208V 220/230V 460/480V	ms ms ms A A HP HP	85 20 55 65 62 20 25 50
Full-load current (FLA)	Closing NO Opening NO of for three-phase AC motor erformance	max min max  at 480V at 600V  200/208V 220/230V 460/480V	ms ms ms A A HP HP	85 20 55 65 62 20 25 50



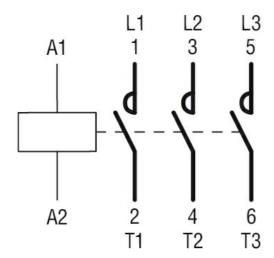
	High fault			
	· ·	Short circuit current	kA	100
		Fuse rating	Α	200
		Fuse class		J
	Standard fault			
		Short circuit current	kA	10
		Fuse rating	Α	200
		Fuse class		RK5
Ambient conditions				
Temperature				
	Operating temperature			
		min	°C	-40
		max	°C	70
	Storage temperature			
		min	°C	-50
		max	°C	80
Max altitude			m	3000
Resistance & Protection	on			
Pollution degree				3
Dimensions				





Wiring diagrams





#### Certifications and compliance

Compliance

CSA C22.2 n° 60947-1

CSA C22.2 n° 60947-4-1

IEC/EN/BS 60947-1

IEC/EN/BS 60947-4-1

UL 60947-1

UL 60947-4-1

Certificates

CCC

cULus

#### ETIM classification

ETIM 8.0

EC000066 -Power contactor, AC switching