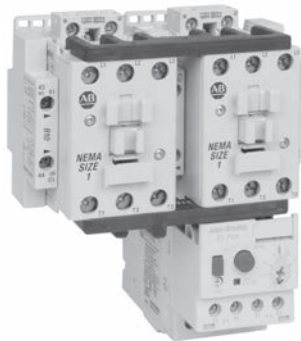


AC Compact Reversing Starters

Product Overview/Product Selection

1



Bulletin 305 — NEMA AC Starters

- NEMA sizes 0...2
- Cost saving design
- E1 Plus electronic overload relays
- Compact size

Bulletin 305 reversing starters are most commonly used for full-voltage starting and reversing of polyphase squirrel-cage motors. Starters size 0...2 are electrically and mechanically interlocked to avoid both contactors being closed simultaneously. Bulletin 305 reversing starters are available with Bulletin 193 E1 Plus electronic overload relays for additional flexibility in motor protection.

For pricing, please consult your local Rockwell Automation sales office or Allen-Bradley distributor.

Table of Contents

Product Selection this page
 Specifications..... 1-64
 Accessories..... 1-66
 Approximate Dimensions..... 1-71

Standards Compliance

- NEMA, EEMAC ICS 2 (Industrial Control Systems)
- UL 508, CSA C22.2 No. 14, ABS 4/15.115
- USCG 46 CFR 111.70
- CE Marked

Certifications

- cULus Listed (File No. E3125, Guide No. NLDX, NLDX7)

Product Selection

3-Phase • 600V AC Maximum • 60 Hz • with 3-Pole Overload Protection

NEMA Size	Continuous Ampere Rating [A]	Maximum Horsepower Rating Full Load Current Must Not Exceed "Continuous Ampere Rating"				Open Type without Enclosure*
		Motor Voltage				
		200V	230V	50 Hz	460...575V	
				380...415V		
0	18	3	3	5	5	305-AO⊗-⊕
1	27	7-1/2	7-1/2	10	10	305-BO⊗-⊕
2	45	10	15	25	25	305-CO⊗-⊕

* Enclosed starters are available through NEMA Modified Standards. Contact Rockwell Automation Technical Sales for additional information.

⊗ Voltage Suffix Code and Terminal Position (NEMA Sizes 0...2)

The cat. no. as listed is incomplete. Select a voltage suffix code from the table below to complete the cat. no. Example: **Cat. No. 305-AO⊗-⊕** becomes **Cat. No. 305-AOD-⊕**. For other voltages, please consult your local Rockwell Automation sales office or Allen-Bradley distributor.

[V]	24	110	120	220	240	440	480	550	600
AC, 50 Hz	—	D	—	A	—	B	—	C	—
AC, 60 Hz	—	—	D	—	A	—	B	—	C
AC, 50/60 Hz	KJ	—	—	—	—	—	—	—	—

⊗ Voltage Suffix Code for DC Control

NEMA Size	24V DC Electronic Coil Code
0, 1, and 2	EJ

⊕ Overload Relay Codes

The cat. no. as listed is incomplete. Select an overload relay code from the table below to complete the cat. no. Example: **Cat. No. 305-AOD-⊕** becomes **Cat. No. 305-AOD-EEC**. For other voltages, please consult your local Rockwell Automation sales office or Allen-Bradley distributor.

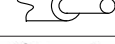
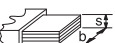
NEMA Size	Full Load Current Adjustment Range	Overload Relay Code
0	1.0...5	EEC
0, 1	5.4...27	EEE
2	9...45	EEF



AC Compact Contactors and Starters

Specifications

Coil Type : Conventional Electronic — EI		NEMA Size					
		0	1	2	3	4	5
		X	X	X	X	X	—
Resistance and Power Dissipation		—	—	—	—	—	X
Main current circuit resistance	[mΩ]	2.7	2	1.5	0.9	0.42	0.42
Power dissipation by all circuits at I_e AC-3/400V	[W]	2.1	8.2	8.3	19.5	40.8	40.8
Total power dissipation							
At I_e AC-3/400V	AC [W]	4.7	11.2	11.5	17.5	50.8	46.8
	DC [W]	8.1	17.4	18.4	17.5	48.8	46.8
Lifespan							
Mechanical AC control	[Mil. operations]	13	13	12	10	10	10
Mechanical DC control	[Mil. operations]	13	13	13	10	10	10
Electrical AC-3 (400 V)	[Mil. operations]	1.3	1.3	1	1	1	1

Coil Type : Conventional Electronic — EI		NEMA Size					
		0	1	2	3	4	5
		X	X	X	X	—	—
Conductor Cross Sections - Main Contacts		—	—	—	—	X	X
Terminal type							
	(1) conductor [mm ²]	1...4	2.5...10	2.5...16	2.5...35	—	—
	(2) conductors [mm ²]	1...4	2.5...10	2.5...10	2.5...25	—	—
	(1) conductor [mm ²]	1.5...6	2.5...16	2.5...25	2.5...50	—	—
	(2) conductors [mm ²]	1.5...6	2.5...16	2.5...16	2.5...35	—	—
	b max. [mm]	—	—	—	—	25	30
	c max. [mm]	—	—	—	—	12.5	15
	s max. [mm]	—	—	—	—	5	6
	Ø min. [mm]	—	—	—	—	8.3	10.5
Recommended torque	[N•m]	1.5...2.5	2.5...3.5	2.5...3.5	3.5...6	22	43
Cross section per UL/CSA	[AWG]	16...10	14...4	14...4	14...1	—	—
Recommended torque	[lb-in]	13.3...22	22...31	22...31	31...53	195	380
With terminal lug kit		—	—	—	—	100-DL180†	100-DL420‡
Cross section per UL/CSA	[AWG]	—	—	—	—	6...300 MCM	(2x) 4...350 MCM
Recommended torque	[lb-in]	—	—	—	—	250	250
With Frame Terminal Block		—	—	—	—	100-DTB180‡	100-DTB420*
	top opening [mm ²]	—	—	—	—	16...35	25...240
	bottom opening [mm ²]	—	—	—	—	16...95	25...240
	top opening [mm ²]	—	—	—	—	16...50	25...300
	bott. opening [mm ²]	—	—	—	—	16...120	25...300
	b max. [mm ²]	—	—	—	—	20	25
	s top [mm ²]	—	—	—	—	3...9	4...20
	s bottom [mm ²]	—	—	—	—	3...14	4...20
Recommended torque	[N•m]	—	—	—	—	14	25
Cross section per UL/CSA top	[AWG]	—	—	—	—	6...1 / 0 AWG	4 AWG...600 MCM
bottom	[AWG]	—	—	—	—	6 AWG...250 MCM	4 AWG...600 MCM
Recommended torque	[lb-in]	—	—	—	—	124	220

* Pozidriv No. 2/Blade No. 3 screw

‡ Pozidriv No. 2/Blade No. 4 screw

† Hexagonal socket screw

§ Hexagonal screw

♣ 25...95 mm² with sleeve per DIN 46228

Coil Type			NEMA Size					
			0	1	2	3	4	5
			X	X	X	X	—	—
Conventional	Electronic	— EI	—	—	—	—	X	X
Operating Limits								
50 Hz, 60 Hz, 50/60 Hz	pick-up	[x Us]	0.85...1.1		0.85....1.1		0.85....1.1	
	dropout	[x Us]	0.3...0.6		0.3...0.6		0.3...0.5	
DC (conventional)	pick-up	[x Us]	0.8...1.1		0.8...1.1		0.85....1.1	
	dropout	[x Us]	0.1...0.6		0.1...0.6			
DC (electronic)	pick-up	[x Us]	0.7...1.25			—	0.3...0.5	
	dropout	[x Us]	0.4			—		
Coil Consumption								
50 Hz, 60 Hz, 50/60 Hz	pick-up	[VA/W]	70/50	80/60	130/90	200/110	380/240*	
	hold-in	[VA/W]	8/2.6	9/3	10/3.2	16/4.5	13/6	
DC (conventional)	pick-up	[W]	6.5	9.2	10.1	200	—	
	hold-in	[W]	6.5	9.2	10.1	4.5		
DC (electronic)	pick-up	[W]	17	17	10.1	—	265*	
	hold-in	[W]	1.7	1.7	10.1	—	6	
Operating Times								
AC	closing delay	[ms]	15...30	15...30	15...30	20...40	20...45	
	opening delay	[ms]	10...60	10...60	10...60	10...60	25...110	
With RC module	opening delay	[ms]	10...60	10...60	10...60	10...60	—	
DC (conventional)	closing delay	[ms]	40...70	50...80	50...80	20...40	25...50	
	opening delay	[ms]	7...15	7...15	7...15	—	35...110	
With integ. diode	opening delay	[ms]	14...20	17...23	17...23	≤ 220V 20...35	—	
With external diode	opening delay	[ms]	70...95	80...125	80...125	—	—	
DC (electronic)	closing delay	[ms]	—	20...40		—	25...50	
	opening delay	[ms]	—	20...40		—	35...110	
Max. Ripple			± 15%			—	—	
Min. OFF time			200			—		

* Electronic coil drives are designed to minimize power requirements, but this control may exhibit a higher inrush (540 W, < 10 ms) when energizing. This must be taken into account for the proper sizing of supply devices, all-or-nothing relays and cross-sections of coil supply lines. Please contact your local Rockwell Automation sales office or Allen-Bradley distributor for detailed information.

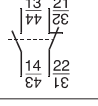
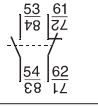
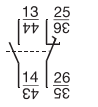
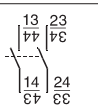
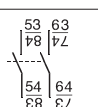
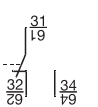
Auxiliary Contacts

	Description			For Use With NEMA Sizes	Cat. No.	Bifurcated Auxiliary Contact Cat. No.
		N.O.	N.C.			
	Auxiliary Contact Blocks for Front Mounting* - 2- and 4-pole - Quick and easy mounting without tools - Electronic-compatible contacts down to 17V, 5 mA - Mechanically linked performance between N.O. and N.C. poles and to the main contactor poles (except for L types) - Models with equal function with several terminal numbering choices L = Late break N.C./early make N.O.	0	2	0...3	100-FA02	100-FAB02
		1	1		100-FA11	100-FAB11
		2	0		100-FA20	100-FAB20
		1L	1L		100-FBL11	—
		0	4		100-FA04	100-FAB04
		1	3		100-FA13	100-FAB13
		2	2		100-FA22	100-FAB22
		3	1		100-FA31	100-FAB31
		4	0		100-FA40	100-FAB40
		1+1L	1+1L		100-FAL22	—
	Auxiliary Contact Blocks for Side Mounting with Sequence Terminal Designations* - 1- and 2-pole - Two-way numbering for right or left mounting on the contactor - Quick and easy mounting without tools - Electronic-compatible contacts down to 17V, 10 mA - Mirror contact performance to the main contactor poles L = Late break N.C./early make N.O.	0	1	0...3	100-SB01	—
		1	0		100-SB10	—
		0	2		100-SB02	—
		1	1		100-SB11	—
		2	0		100-SB20	—
		1L	1L		100-SBL11	—

* Max. number of auxiliary contacts that may be mounted:

AC coil contactors — max. 4 N.O. contacts on the front of the contactor, 2 N.O. contacts on the side, 4 N.C. front or side, 6 total.

DC coil contactors — max. 4 N.O. contacts on the front of the contactor or max 2 N.O. contacts on the side, 4 N.C. front or side, 4 total.

	Description			Connection Diagram	For Use With NEMA Sizes	Cat. No.
		No. of N.O. Contacts	No. of N.C. Contacts			
	Auxiliary Contacts Side mounted With sequence terminal designations	1	1		4...5 Left/Right inside mounting	100-DS1-11
		1	1		4...5 Left/Right outside mounting	100-DS2-11
		1	1L		4...5 Left/Right inside mounting	100-DS1-L11
		2	0		4...5 Left/Right inside mounting	100-DS1-20
		2	0		4...5 Left/Right outside mounting	100-DS2-20
	Auxiliary Contacts • Electronic-compatible auxiliary contacts • Ideal for use when switching low-power control circuits • With IEC sequence terminal designations • Contact ratings: AC-12, 250V, 0.1 A AC-15, DC-13, 3...125V, 1...100 mA	1	1		4...5 Left/Right inside mounting	100-DS1-B11

Control Modules

	Description		For Use With NEMA Sizes		Cat. No.		
	Pneumatic Timing Modules Pneumatic timing element contacts switch after the delay time. The contacts on the main control relay continue to operate without delay.	On-Delay 0.3...30 s Range 1.8...180 s Range Off-Delay 0.3...30 s Range 1.8...180 s Range	0...3 with AC coils 0...3	100-FPTA30 100-FPTA180 100-FPTB30 100-FPTB180			
	Electronic Timing Modules — On-Delay Delay of the contactor or control relay solenoid. The contactor or control relay is energized at the end of the delay time.	On-Delay 0.1...3 s Range 1...30 s Range 10...180 s Range 110...240V, 50/60 Hz 110...250V DC	0...3	100-ETA3 100-ETA30 100-ETA180			
	Electronic Timing Modules — Off-Delay Delay of the contactor or control relay solenoid. After interruption of the control signal, the contactor or control relay is de-energized at the end of the delay time.	Off-Delay 0.3...3 s Range 1...30 s Range 10...180 s Range 110...240V, 50/60 Hz	0...3 with AC coils	100-ETB3 100-ETB30 100-ETB180			
	Electronic Timing Modules Delay of the contactor solenoid. Contactor K 3 (Y) is de-energized (off) and K 2 (D) is energized (on) after the end of the set Y end time. (Switching delay at 50 ms.) Continuous adjustment range High repeat accuracy	Transition Time Y Contactor 1...30 s Range 110...240V, 50/60 Hz	0...3 with AC coils	100-ETY30			
	Mechanical Interlocks For interlocking of two contactors. Common interlock for all Bul. 300 contactor sizes 0...3 Interlocking of different sizes possible Mechanical and electrical interlocking possible in one module by means of integrated auxiliary contacts 9 mm dovetail connector included	Mechanical only, without auxiliary contacts	0...3	100-MCA00			
		Mechanical/ electrical interlock with 2 N.C. auxiliary contacts	0...3	100-MCA02			
	DC Interface (electronic) Interface between the DC control signal (PLC) and the AC operating mechanism of the contactor/control relay. Control (input) voltage 12V DC 18...30V DC (24V nominal) 48V DC Requires no additional surge suppression on the relay coils		0...3 with AC coils	100-JE			
	Mechanical Latch Following contactor latching, the contactor coil is immediately de-energized (off) by the N.C. auxiliary contact (65-66). Electrical or manual release 1 N.O. + 1 N.C. auxiliary contacts Suitable for all Bul. 300 contactor sizes 0...3		0...3 with AC coils	100-FL11 ⊗			
	Surge Suppressors For limitation of coil switching transients. Plug-in, coil mounted Suitable for all Bul. 300 contactor sizes 0...3 RC, varistor, and diode versions		RC Module AC operating mechanism	0...3 with AC coils	Voltage Range		Cat. No.
					24...48V AC, 50/60 Hz		100-FSC48
	Varistor Module AC/DC operating mechanism		0...3	110...280V AC, 50/60 Hz	100-FSC280		
				380...480V AC, 50/60 Hz	100-FSC480		
				12...55V AC/ 12...77V DC	100-FSV55		
				56...136V AC/ 78...180V DC	100-FSV136		
				137...277V AC/ 181...350V DC	100-FSV277		
				278...575V AC	100-FSV575		

⊗ Voltage Suffix Code

The cat. no. as listed is incomplete. Select a voltage suffix code from the table below to complete the cat. no. Example: 120V, 60 Hz:
Cat. No. 100-FL11⊗ becomes **Cat. No. 100-FL11D**.

Voltage*	24V	48V	100V	110V	120V	230-240V	240V	277V	380-400V	400-415V	440V	480V
50 Hz	K	Y	KP	D	—	VA	T	—	N	G	B	—
60 Hz	J	—	—	—	D	—	A	T	—	—	N	B

* For special voltages, consult your local Rockwell Automation sales office or Allen-Bradley distributor.

Assembly Components

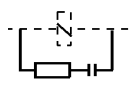
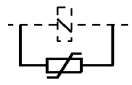
	Description	For Use With NEMA Sizes	Pkg. Quantity	Cat. No.
 Cat. No. 100-S0	Dovetail Connectors For use in contactor and starter assemblies. Single Connector — 0 mm Spacing	0...3	10	100-S0
	Dovetail Connectors For use in contactor and starter assemblies. Dual Connector — 9 mm Spacing			100-S9
 Cat. No. 100-SCCA	Protective Covers Provides protection against unintended manual operation For contactors and front mounted auxiliary contacts, pneumatic timers and latches	0...3	1	100-SCCA
 Cat. No. 100-SCFA		100-FA, -FB, -FC, -FP, -FL;	10	100-SCFA
 Cat. No. 105-PW23	Reversing Power Wiring Kits For reversing connection with a solid-state or thermal overload relay	0	1	105-PW23
		1		105-PW37
		2		105-PW43
		3		105-PW85
 Cat. No. 199-DR1	DIN (#3) symmetrical rail 35 x 7.5 x 1 m	0...2	10	199-DR1

Marking Systems

	Description	Pkg. Qty.*	Cat. No.
	Label Sheet 105 self-adhesive paper labels each, 6 x 17 mm	10	100-FMS
	Marking Tag Sheet 160 perforated paper labels each, 6 x 17 mm, to be used with a transparent cover	10	100-FMP
	Transparent Cover To be used with marking tag sheets	100	100-FMC
	Marking Tag Adapters To be used with marking tag: System V4/V5	100	100-FMA1
	Marking Tag Adapters To be used with marking tag: System 1492 W	100	100-FMA2

* Must be ordered in multiples of package quantities.

Suppressor Modules

	Description	Circuit Diagram	Suppressor Rating	For Use With NEMA Sizes	Cat. No.
	Suppressor Module for Bul. 100-D Contactors - For limiting surge voltage when coil circuits are interrupted - Supplied as standard on all conventional DC coil contactors and all electronic coil contactors (as part of the supply module or delivered with separate suppressor module)		RC Module (AC control) for contactors with conventional coil 21...48V, 50 Hz; 24...55V, 60 Hz	4	100-DFSC48
			95...110V, 50 Hz; 110...127V, 60 Hz		100-DFSC110
			180...277V, 50 Hz; 208...277V, 60 Hz		100-DFSC240
			380...550V, 50 Hz; 440...600V, 60 Hz		100-DFSC550
			Varistor Module for contactors with conventional coil 55V AC	4	100-DFSV55
			56...136V AC		100-DFSV136
			137...277V AC		100-DFSV277
			278...600V AC		100-DFSV575
			208...277V AC*	5	100-DFSV550

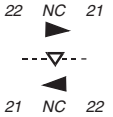
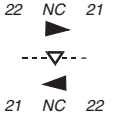
* For overvoltage category IV (IEC 947 for 100-D...-EI) e.g., lightning protection requirements.

Connecting Components

	Description	Output Connection	For Use With NEMA Sizes		Terminal Connection	Cat. No.
			4	5		
	Reversing: Input Connection Wye-Delta: Main-Delta connection	50 mm ²	X		Lugs, 100-DL...	100-D180-VL
		120 mm ²		X		100-D420-VL
		50 mm ²	X		Terminal Blocks, 100-DTB...	100-D180-VLTB
		120 mm ²		X		100-D420-VLTB
	Reversing: Output Connection Wye-Delta: Delta-Wye connection	50 mm ²	X		Lugs, 100-DL...	100-D180-VT
		120 mm ²		X		100-D420-VT
		50 mm ²	X		Terminal Blocks, 100-DTB...	100-D180-VTTB
		120 mm ²		X		100-D420-VTTB
	Delta-Wye connection if 100-D95...180 is used as a Wye contactor	80 mm ²		X	Terminal Blocks, 100-DTB...	100-D420-VYTB
	Wye-Delta: Neutral bridge	—	X		—	100-D180-VYU
		—		X	—	100-D420-VYU
	Power Wiring Kits (for contactors using 100-DL lug kits)	NEMA Size 4 • Reversing • Two-speed, or changeover • Wye-Delta/Star-Delta				100-DPW180 100-D180-VL 100-DPY180
		NEMA Size 5 • Reversing • Two-speed, or changeover • Wye-Delta/Star-Delta				100-DPW420 100-D420-VL 100-DPY420

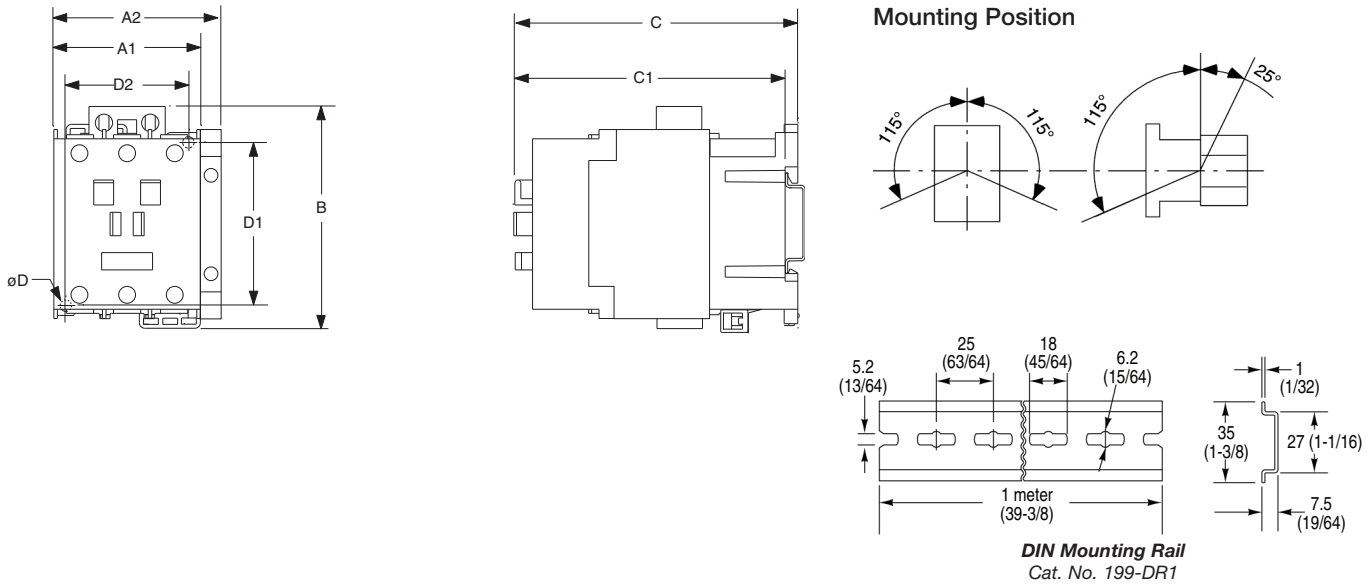
	Description	For Use With NEMA Sizes		Cat. No.
	Terminal Lugs • Set of two • Protection class IP2X per IEC 60529 and DIN 40 050	4, 193-EC_F, 193-EE_F		100-DTB180
		5, 193-EC_G, 193-EF2C, 193-EE_G		100-DTB420
	Terminal Lugs (UL/CSA), Copper Frame Set of three	4, 193-EC_F, 193-EE_F		100-DL180
		5, 193-EC_G, 193-EE_G		100-DL420
	Terminal Lugs (UL/CSA), Aluminum Frame Set of three	4		100-DLA180
		5		100-DLA420
	Control Circuit Terminal 2 x 2.5 mm ²	4		100-DAT1
		5		100-DAT2
	Terminal Shields • Set of two • Protection class IP10 per IEC 60529 and DIN 40 050 • For direct-on-line, reversing, two-speed, and wye-delta/star-delta assemblies	4		100-DTS180
		5		100-DTS420
	Terminal Covers • Protection class IP20 per IEC 60529 and DIN 40 050 • For direct-on-line, reversing, two-speed, and wye-delta/star-delta assemblies	4, 193-EC_F, 193-EE_F		100-DTC180
		5, 193-EC_G, 193-EE_G		100-DTC420
	Mounting Plate • Galvanized steel plate for starter combinations • For direct-on-line, reversing, two-speed, wye-delta/star-delta, and Dahlander assemblies	4	Direct-on-line	100-DMS180
			Reversing, two-speed or changeover	100-DMU180
			Y-Δ or Dahlander	100-DMY180
		5	Direct-on-line	100-DMS420
			Reversing, two-speed or changeover	100-DMU420
			Y-Δ or Dahlander	100-DMY420
	Mounting Plate For two-speed or changeover switches	For interlocking between two size 4 contactors		100-DMU85

Interlocks

	Description	Circuit Diagram	For Use With NEMA Sizes	Cat. No.
1 	Interlock — Mechanical Only No additional space required		4...5	100-DMA00
	Interlock — Dual Electrical/Mechanical No additional space required Two N.C. auxiliary contacts		4...5	100-DMD02
	Interlock — Mechanical Only No additional space required		4...5	100-DMD00
	Interlock — Mechanical Only Provides interlocking between size 3 and size 4 contactors.		3...4	100-DMC00
	Interlock — Dual Electrical/Mechanical Provides interlocking between size 3 and size 4 contactors. Two N.C. auxiliary contacts		3...4	100-DMC02

Approximate dimensions are shown in inches (millimeters). Dimensions are not intended to be used for manufacturing purposes.

Bulletin 300 Contactors and Accessories



AC Contactors

Cat. No.	NEMA Size	A1	A2	B	C	C1	Mounting Dimensions		
							ØD	D1	D2
300-AO_	0	1.76 (45)	—	3.19 (81)	3.39 (86)	3.19 (81)	0.17 (4.5)	2.36 (60)	1.38 (35)
300-BO_	1	—	2.12 (54)	3.19 (81)	4.06 (103)	3.86 (98)	0.17 (4.5)	2.36 (60)	1.38 (35)
300-CO_	2	—	2.48 (63)	3.19 (81)	4.17 (106)	3.98 (101)	0.17 (4.5)	2.36 (60)	1.77 (45)
300-DO_	3	—	3.19 (81)	4.80 (122)	4.80 (122)	4.61 (117)	0.22 (5.4)	3.94 (100)	2.17 (55)

Accessories

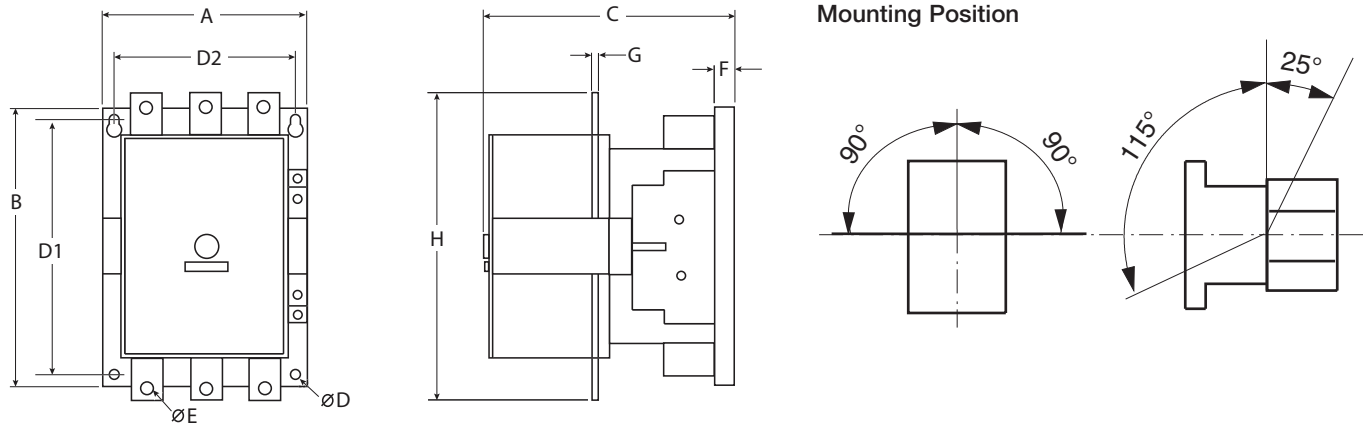
Contactors with			in. (mm)
Auxiliary contact block for front mounting	2- or 4-pole		C/C1 + 1.54 (39)
Auxiliary contact block for side mounting	1- or 2-pole		A + 0.35 (9)
Pneumatic Timing Module			C/C1 + 2.28 (58)
Electronic Timing Module	on coil terminal side		B + 0.94 (24)
Mechanical Interlock	on side of contactor		A + 0.35 (9)
Mechanical Latch			C/C1 + 2.40 (61)
Interface Module	on coil terminal side		B + 0.35 (9)
Surge Suppressor	on coil terminal side		B + 0.12 (3)
Labeling with:	label sheet		+ 0
	marking tag sheet with clear cover		+ 0
	marking tag adapter for System V4/V5		+ 0.22 (5.5)
	marking tag adapter for System Bul. 1492W		+ 0.22 (5.5)

Bulletin 300 Line
AC Compact Contactors and Starters
Approximate Dimensions

Approximate dimensions are shown in Inches (millimeters). Dimensions are not intended to be used for manufacturing purposes.

Bulletin 300 Contactors and Accessories, Continued

1



Cat. No.	NEMA Size	A	B	C	Mounting Dimensions			ØE	F	G	H
					ØD	D1	D2				
300-EO_	4	4.72 (120)	6.69 (170)	6.14 (156)	0.21 (5.2)	5.71 (145)	3.94 (100)	0.34 (8.5)	0.59 (15)	0.157 (4)	7.17 (182)
300-FO_	5	6.10 (155)	8.07 (205)	7.09 (180)	0.26 (6.5)	7.09 (180)	5.12 (130)	0.41 (10.4)	0.59 (15)	0.236 (6)	8.74 (222)

Contactors with		in. (mm)
Auxiliary contact block*	100-DS1_	A
	100-DS2_	A + 0.53 (13.5) each
Mechanical Interlock	100-DM...	A + A
Frame terminal block	100-DTB110	B + 0.28 (7) each
	100-DTB180	B + 0.28 (7) each
	100-DTB420	B + 0.33 (8.5) each
Label holder		C + 0.20 (5) each

* Conventional DC coil contactors will accept only Cat. No. 100-DS2_ auxiliary contacts.