

R-Rated medium voltage fuses for motor circuit protection



Description:

- Indoor/enclosure, R-Rated medium voltage, current-limiting fuses for motor circuit protection.

Features and benefits

- Current-limiting R-Rated fuses will safely interrupt all currents between their minimum and maximum interrupting ratings and will melt in a range of 15 to 35 seconds at a value of 100 times the “R” number per ANSI C37.46.
- R-Rated fuses are physically dimensioned for easy installation in existing hardware.
- Available in standard, AMPGARD Hookeye and hermetically sealed, and bolt-on mounting styles to meet application needs.
- 4.8 kV Limitamp® bolt-on constructions available in ratings from 2R to 24R.
- 2.4 kV and 4.8 kV AMPGARD hermetically sealed constructions are suitable for Class I, Group D, Div. 2 hazardous locations.
- Open fuse indicator on all mounting styles speeds troubleshooting.
- Classified as backup fuses for current-limiting protection of medium voltage motor controllers (short-circuit performance only).
- These fuses are in a self-contained, non-venting package for installation indoors or outdoors in an enclosure.

Typical applications:

- Medium voltage motors and controllers

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2.4 kV R-Rated fuses

Catalog symbols:

Code-(amps) R	Construction
JCK-R 2CLS-R	Standard
JCK-A-R* 2ACLS-R	AMPGARD Hookeye
JCH-R 2HCLS-R	Hermetically sealed AMPGARD
JCK-B-R 2BCLS-R	Bolt-on

* For use in 400 amp AMPGARD motor starters.

Ratings:

- Volts
 - 2.4 kV (nominal)
 - 2.54 kV (max design)
- Amps 25-450 A
- Interrupting ratings
 - 50 kA Sym
 - 80 kA Asym

Agency information:

- UL Recognized: Guide MSSS2, File E96676 (JCK-R [2R-12R] and JCK-A-R [2R-12R])

Recommended fuse holders for standard constructions:

Amp range	Description	Cat. No.
Fuseclips		
25-230A	3" Enclosed fuseclip*	A3354730
25-450A	3" Open fuseclip	1A0065
	3" Spring loaded open fuseclip	9078A67G04
Fuse holders		
25-230A Single barrel	Non-disconnect holder, porcelain	2CLE-PNM-D
	Non-disconnect holder, glass polyester	2CLE-GNM-D
	Disconnect holder, porcelain	2CLE-PDM-D
	Disconnect holder, glass polyester	2CLE-GDM-E
390-450A Double barrel	Non-disconnect holder, porcelain	2CLE-PNM-E
	Non-disconnect holder, glass polyester	2CLE-GNM-E
	Disconnect holder, porcelain	2CLE-PDM-E
	Disconnect holder, glass polyester	2CLE-GDM-E

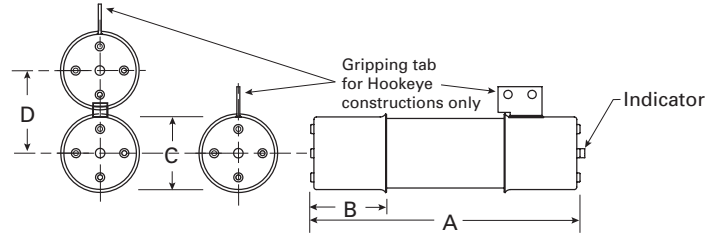
* Single barrel only, not sold in pairs.

Dimensions - in [mm]

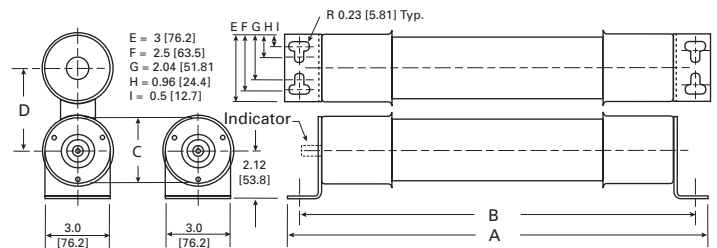
Construction	Amp range	Dimension			
		A	B	C	D
Standard - short	25-230A	10.8 (274)	3 (76)	3 (76)	—
	390-450A				3.3 (84)
AMPGARD Hookeye*	70-230A	19.2 (488)	17.9 (455)	3 (76)	—
	390-450A				3.3 (84)
Bolt-on	25-230A	19.2 (488)	17.9 (455)	3 (76)	—
	390-450A				3.3 (84)

* Includes hermetically sealed versions.

Standard and AMPGARD Hookeye



Bolt-on



2.4 kV R-Rated fuse catalog numbers

Amps	"R"		Mounting style (minimum interrupting rating in amps)							No. of barrels
	Des.	Standard	Standard	Standard AMPGARD	Hermetically sealed AMPGARD	Bolt-on				
25	—	—	2CLS-25* (100) †	—	2ACLS-25* (90) †	JCH-30* (90) †	2HCLS-25* (90) †	JCK-B-25* (90)	2BCLS-25* (90) †	1
70	2R	JCK-2R (165)	2CLS-2R (180) †	JCK-A-2R (165)	2ACLS-2R (180) †	JCH-2R (180) †	2HCLS-2R (180) †	JCK-B-2R (180)	2BCLS-2R (180) †	
100	3R	JCK-3R (220)	2CLS-3R (270) †	JCK-A-3R (220)	2ACLS-3R (270) †	JCH-3R (270) †	2HCLS-3R (270) †	JCK-B-3R (270)	2BCLS-3R (270) †	
130	4R	JCK-4R (320)	2CLS-4R (360) †	JCK-A-4R (320)	2ACLS-4R (360) †	JCH-4R (360) †	2HCLS-4R (360) †	JCK-B-4R (360)	2BCLS-4R (360) †	
150	5R	JCK-5R (410)	2CLS-5R (450) †	JCK-A-5R (410)	2ACLS-5R (450) †	JCH-5R (450) †	2HCLS-5R (450) †	JCK-B-5R (450)	2BCLS-5R (450) †	
170	6R	JCK-6R (480)	2CLS-6R (540) †	JCK-A-6R (480)	2ACLS-6R (540) †	JCH-6R (540) †	2HCLS-6R (540) †	JCK-B-6R (540)	2BCLS-6R (540) †	
200	9R	JCK-9R (720)	2CLS-200* (740) †	JCK-A-9R (720)	2ACLS-200* (740) †	JCH-200* (740) †	2HCLS-200* (740) †	JCK-B-200* (740)	2BCLS-200* (740) †	
230	12R	JCK-12R (970)	2CLS-230* (1080) †	JCK-A-12R (970)	2ACLS-230* (1080) †	JCH-230* (1080) †	2HCLS-230* (1080) †	JCK-B-230* (1080)	2BCLS-230* (1080) †	
390	18R	JCK-18R (1430)	2CLS-390* (1500) †	JCK-A-18R (1430)	2ACLS-390* (1500) †	JCH-390* (1500) †	2HCLS-390* (1500) †	JCK-B-390* (1500)	2BCLS-390* (1500) †	
450	24R	JCK-24R (1880)	2CLS-450* (2200) †	JCK-A-24R (1880)	2ACLS-450* (2200) †	JCH-450* (2200) †	2HCLS-450* (2200) †	JCK-B-450* (2200)	2BCLS-450* (2200) †	

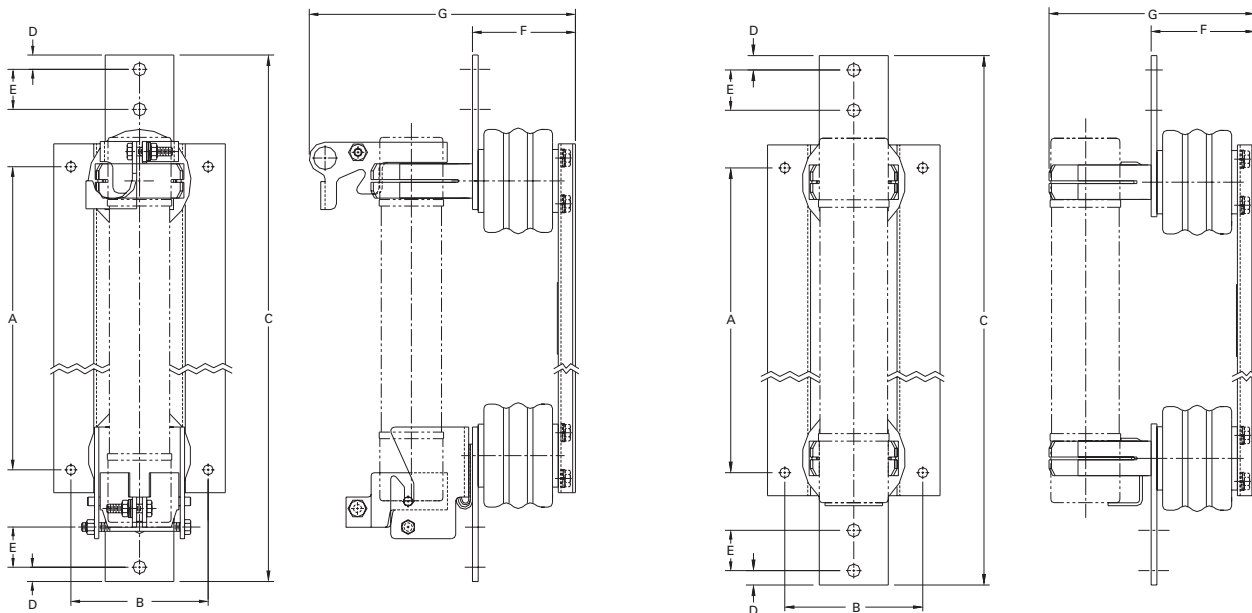
* Does not comply with ANSI C37.46 for "R" rating.
† Not UL

JCK and 2HCLS Type mountings -in (mm)

Catalog number	Hole centers		Overall length	Hole Inset	Hole centers	Contact height	Overall height	BIL (kV)
	A	B	C	D	E	F	G	
Disconnect single barrel†								
2CLE-GDM-D	8.24 (209.3)	6 (152.4)	18 (457.2)	0.62 (15.7)	1.75 (44.4)	4.5 (114.3)	11.72 (297.7)	60
2CLE-PDM-D								
Disconnect double barrel†								
2CLE-GDM-E	8.24 (209.3)	6 (152.4)	18 (457.2)	0.62 (15.7)	1.75 (44.4)	4.5 (114.3)	15.28 (388.1)	60
2CLE-PDM-E								
Non-disconnect single barrel								
2CLE-GNM-D	8.24 (209.3)	6 (152.4)	18 (457.2)	0.62 (15.7)	1.75 (44.4)	4.5 (114.3)	8.79 (223.3)	60
2CLE-PNM-D								
Non-disconnect double barrel								
2CLE-GNM-E	8.24 (209.3)	6 (152.4)	18 (457.2)	0.62 (15.7)	1.75 (44.4)	4.5 (114.3)	12.48 (317.0)	60
2CLE-PNM-E								

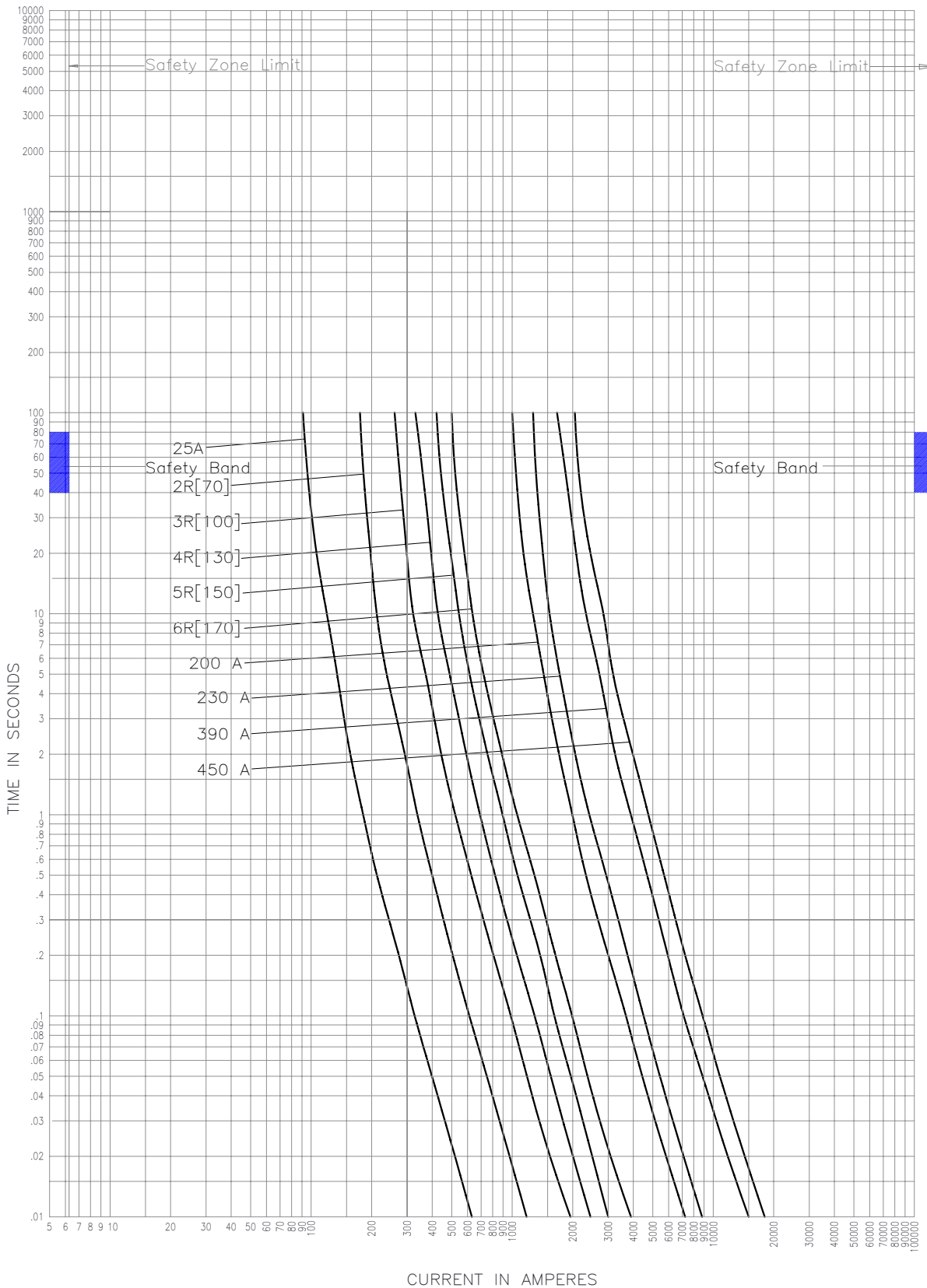
2.4 kV disconnect mounting†

2.4 kV non-disconnect mounting



† Disconnect mountings provide a means for fuse extraction only. Do not use a disconnect mounting for load switching or fuse removal while energized.

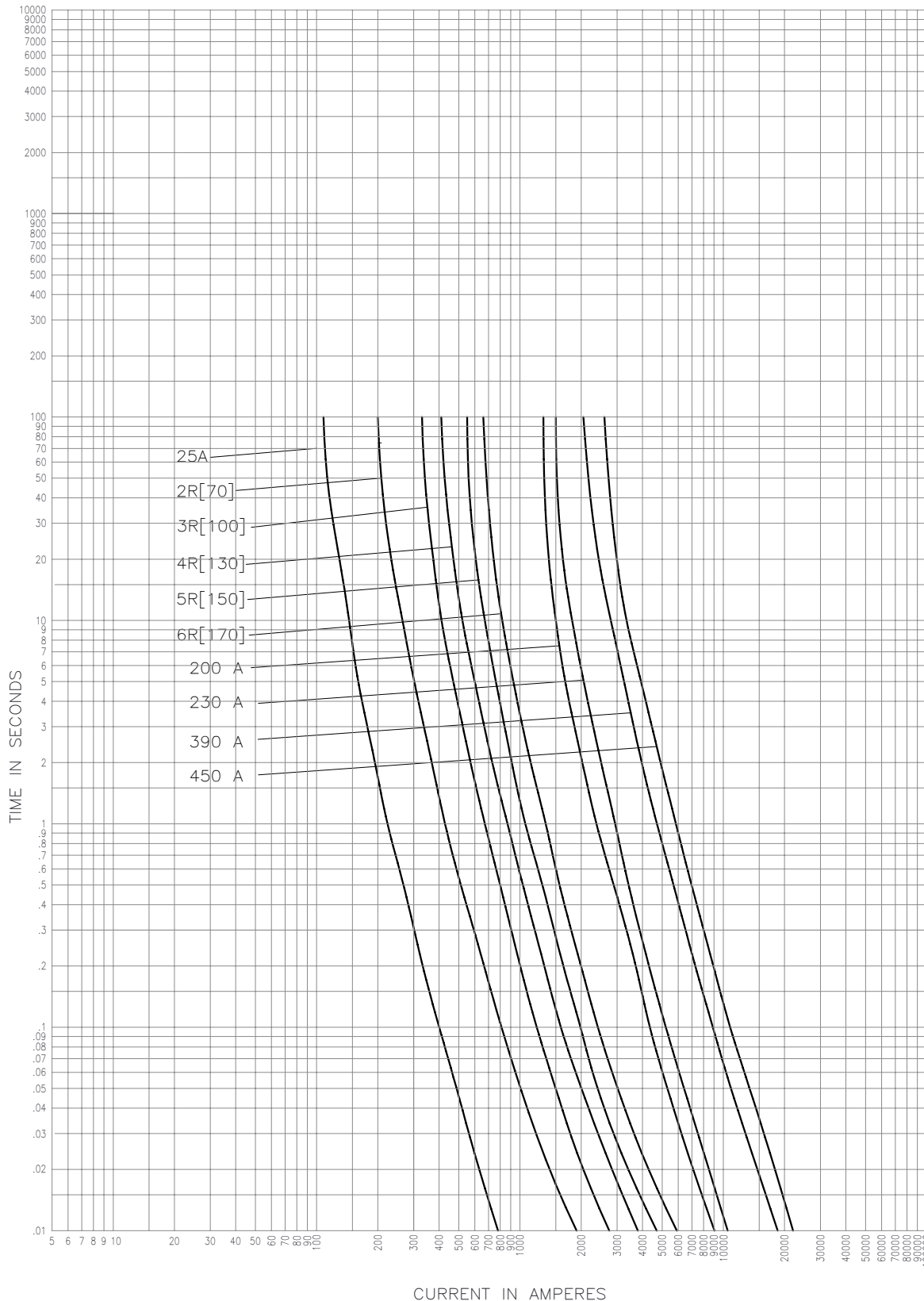
2.4 kV Time-current curves — minimum melting for 2HCLS_R, 2CLS-25A, 2R thru 450A, 2ACLS, and 2BCLS_R (25A, 2R-24R @25°C)



Type 2CLS, 2ACLS, 2BCLS, 2HCLS, JCK-B-25A, 2R-6R, 200A - 450A
 Motor Start Current Limiting Fuses Minimum Melting Time
 Current Characteristics

CURVE TC66664702
 January 2024

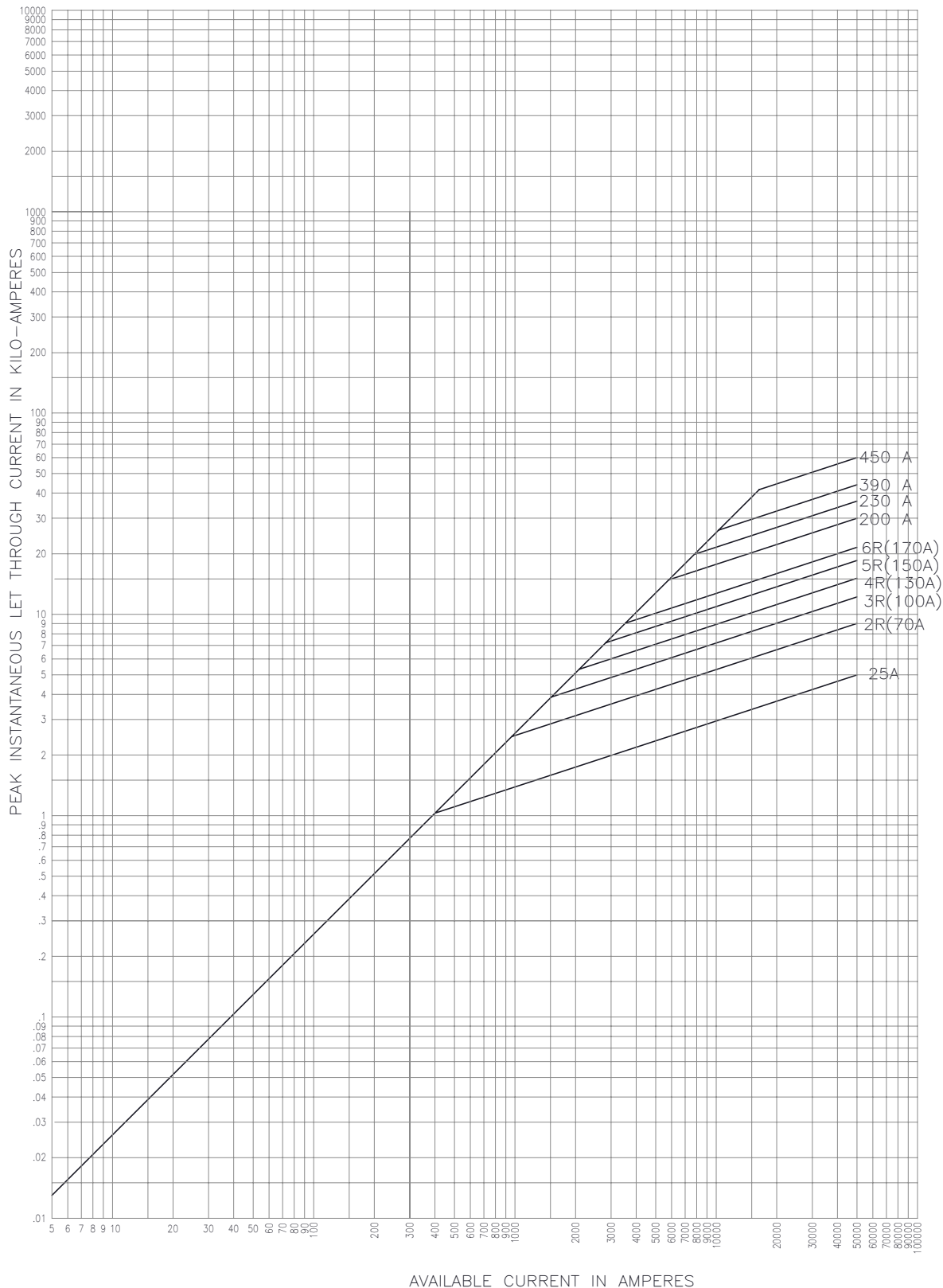
2.4 kV Time-current curves — total clearing for 2HCLS-R, 2CLS-25A, 2R thru 450A, 2ACLS, and 2BCLS-R (25A, 2R-24R @25°C)



Type 2CLS, 2ACLS, 2BCLS, 2HCLS, JCK-B-25A, 2R-6R, 200A - 450A
Motor Start Current Limiting Fuses Total Clearing Time
Current Characteristics

CURVE TC66664704
January 2024

2.4 kV Peak let-through curves for 2HCLS_R, 2CLS-25A, 2R thru 450A, 2ACLS, and 2BCLS_R (25A, 2R-24R @25°C)

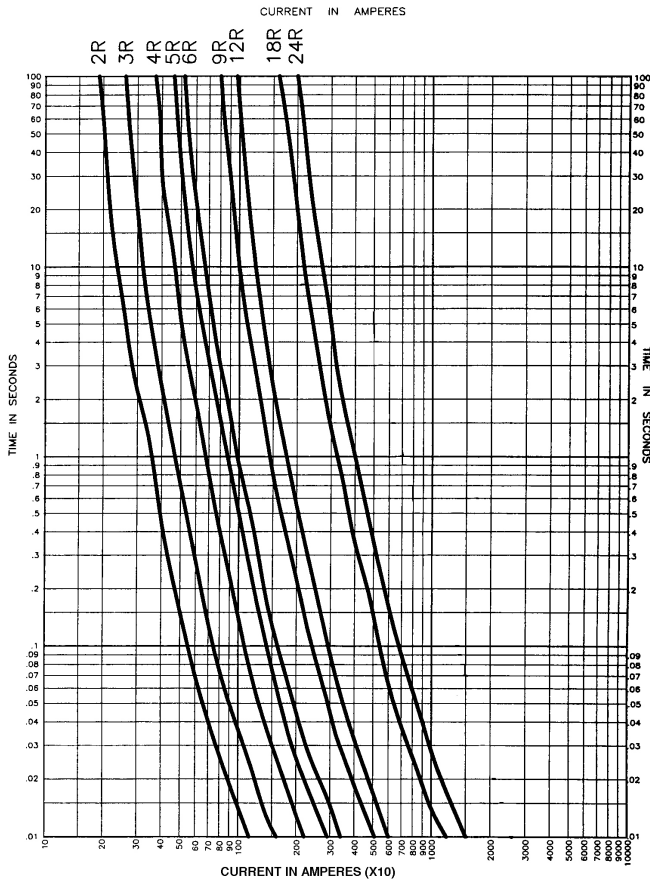


Type 2CLS, 2ACLS, 2BCLS, 2HCLS, JCK-B-25A, 2R-6R, 200A - 450A
Motor Start Current Limiting Fuses Peak Let Through
Current Characteristics

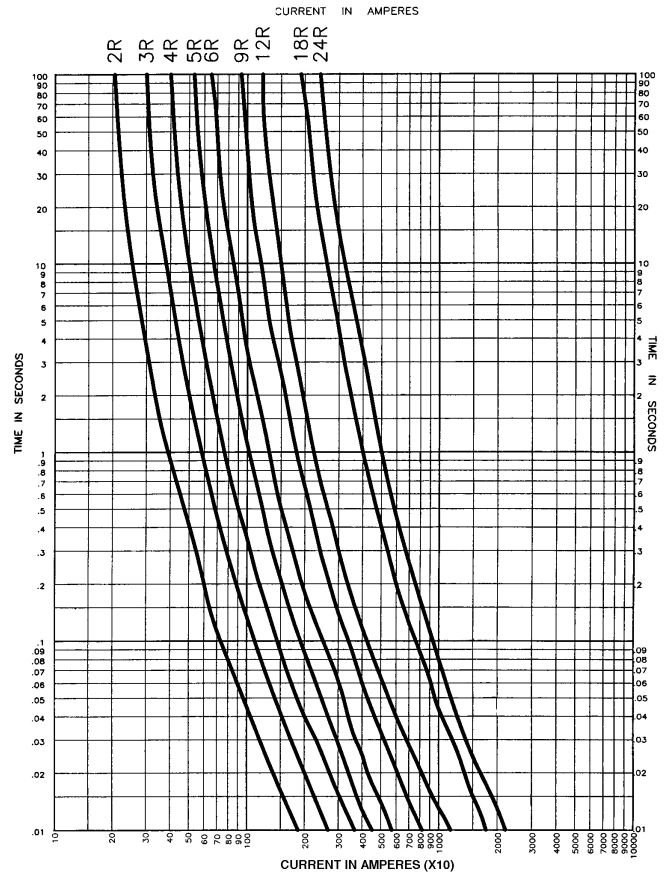
CURVE TC66700202
January 2024

Curves are plotted to maximum test points so all variations should be negative.

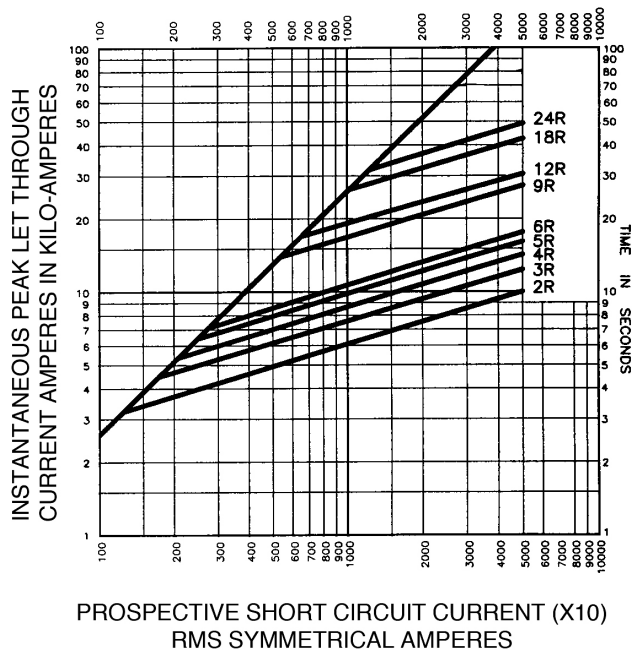
2.4 kV Time-current curves — minimum melting for JCK-R and JCK-A-R (2R-24R @25°C)



2.4 kV Time-current curves — total clearing for JCK-R and JCK-A-R (2R-24R @25°C)



2.4 kV Peak let-through curves for JCK-R and JCK-A-R (2R-24R @25°C)



4.8 kV R-Rated fuses

Catalog symbols:

Code-(amps)R	Construction
5CLS-30 and 5CLS-_R	Standard - short (30 A, 2R-24R)
JCL-_R	Standard - short (2R - 24R)
5LCLS-_R	Standard - long (2R - 24R)
5ACLS-30 and 5ACLS-_R	AMPGARD Hookeye* (30 A, 2R-24R)
JCL-A-_R	AMPGARD Hookeye* (2R - 24R)
5HCLS-30 and 5HCLS-_R	Hermetically sealed AMPGARD Hookeye* (30 A, 2R-24R)
5BCLS-30 and 5BCLS-_R	Bolt-on (30 A, 2R-44R)
JCL-B-_R	Bolt-on (2R-24R)
5MCLS-_R-_A and 5MCLS-_R-_B	Bolt-on GE Limitamp (2R- 24R)

* For use in 400 amp AMPGARD motor starters.

Ratings:

- Volts
 - 4.8 kV (nominal)
 - 5.0 kV (max design)
- Amps 30-800 A
- Interrupting ratings
 - 5HCLS-30, 2R - 12R 63kA Sym
 - 50 kA Sym
 - 80 kA Asym

Agency information:

- UL Recognized, Guide MSSS2
- File E96676: JCL-_R [2R-12R], JCL-A-_R [2R-12R], 5MCLS-_R-A [2R-24R], and 5MCLS-_R-B [2R-24R]
- File E60757: 5CLS-30, 5CLS-_R [2R-18R], 5ACLS-30, and 5ACLS-_R [2R-24R], 5BCLS-30, 2R - 24R

Recommended fuse holders for standard constructions

Amp range	Description	BIL (kV)	Cat. No.
Fuseclips			
30-230A	3" Enclosed fuseclip*		A3354730
30-450A	3" Open fuseclip	—	1A0065
	3" Spring loaded open fuseclip		9078A67G04
Fuse holders for CLS / JCL / 5HCLS			
30-230A Single barrel	Non-disconnect holder, porcelain		5HLE-PNM-D
	Non-disconnect holder, glass polyester		5HLE-GNM-D
	Disconnect holder, porcelain	60	5HLE-PDM-D
	Disconnect holder, glass polyester		5HLE-GDM-D
390-450A Double barrel	Non-disconnect holder, porcelain		5HLE-PNM-E
	Non-disconnect holder, glass polyester		5HLE-GNM-E
	Disconnect holder, porcelain		5HLE-PDM-E
	Disconnect holder, glass polyester		5HLE-GDM-E

Fuse holders for 5LCLS†		
70-230A Single barrel	Non-disconnect holder, porcelain	5CLE-PNM-D
	Non-disconnect holder, glass polyester	5CLE-GNM-D
	Disconnect holder, porcelain	5CLE-PDM-D
	Disconnect holder, glass polyester	5CLE-GDM-D
75	Disconnect holder, porcelain	8CLE-PDM-D
	Disconnect holder, glass polyester	8CLE-GDM-D
390-450A Double Barrel	Disconnect holder, porcelain	5CLE-PDM-E
	Disconnect holder, glass polyester	5CLE-GDM-E

* Single barrel only, not sold in pairs.

** Not available for standard - long constructions

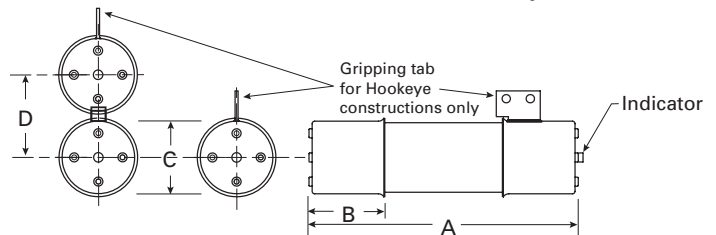
† Not available for 390 to 450 amp ratings.

Dimensions - in [mm]

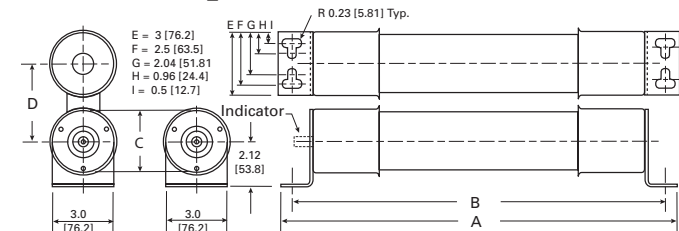
Construction	Amp range	Dimension			
		A	B	C	D
Standard - short	30-230A	15.6 (396)			—
	390-450A				3.3 (84)
Standard - long	70-230A	17.9 (455)	3 (76)	3 (76)	—
	390-450A				3.3 (84)
AMPGARD Hookeye*	30-230A	15.9 (404)			—
	390-450A				3.3 (84)
Bolt-on	30-230A	19.2 (488)	17.9 (455)	3 (76)	—
	390-450A				3.3 (84)
	600-800A				4 (101)
Limitamp (-A)	70-230	18.3 (465)	18.8 (478)	1.4 (36)	4.8 (122)
	390-450				7.4 (188)
Limitamp (-B)	70-230				3.0 (76)
	390-450				2.4 (61)

* Includes hermetically sealed versions.

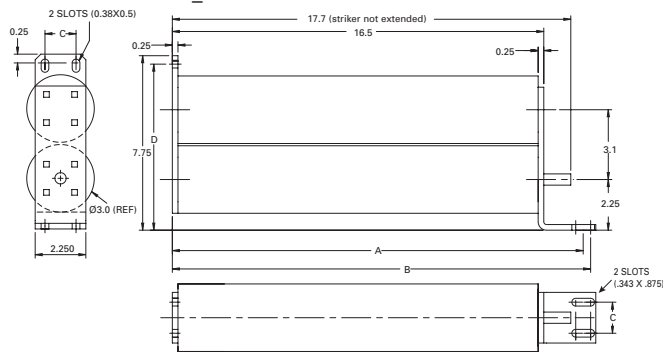
Ferrule JCL, 5LCLS, 5CLS and AMPGARD Hookeye



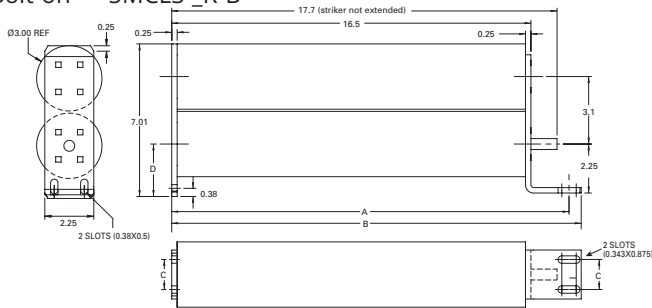
Bolt-on — 5BCLS-



Bolt-on — 5MCLS_R-A



Bolt-on — 5MCLS_R-B



4.8 kV R-Rated fuse catalog numbers

Ferrule constructions (min. interrupting rating in amps)				
Amps	Short	Short	Long	No. of barrels
30	5CLS-30* (100)	—	—	
70	5CLS-2R (180)	JCL-2R (165)	5LCLS-2R (180)†	
100	5CLS-3R (270)	JCL-3R (220)	5LCLS-3R (270)†	
130	5CLS-4R (360)	JCL-4R (320)	5LCLS-4R (360)†	1
150	5CLS-5R (450)	JCL-5R (410)	5LCLS-5R (450)†	
170	5CLS-6R (540)	JCL-6R (480)	5LCLS-6R (540)†	
200	5CLS-9R (740)	JCL-9R (720)	5LCLS-9R (740)†	
230	5CLS-12R (1080)	JCL-12R (970)	5LCLS-12R (1080)†	
390	5CLS-18R (1500)	JCL-18R (1430)	5LCLS-18R (1500)†	
450	5CLS-24R (2200)	JCL-24R (1880)	5LCLS-24R (2200)†	2

* Does not comply with ANSI C37.46 for "R" rating.

† Not UL Recognized.

AMPGARD Hookeye (min. interrupting rating in amps)				
Amps	Hookeye	Hookeye	Hermetic seal	No. of barrels
30	5ACLS-30* (100)	—	5HCLS-30* (100)†	
70	5ACLS-2R (180)	JCL-A-2R (165)	5HCLS-2R (180)†	
100	5ACLS-3R (270)	JCL-A-3R (220)	5HCLS-3R (270)†	
130	5ACLS-4R (360)	JCL-A-4R (320)	5HCLS-4R (360)†	1
150	5ACLS-5R (450)	JCL-A-5R (410)	5HCLS-5R (450)†	
170	5ACLS-6R (540)	JCL-A-6R (480)	5HCLS-6R (540)†	
200	5ACLS-9R (740)	JCL-A-9R (720)	5HCLS-9R (740)†	
230	5ACLS-12R (1080)	JCL-A-12R (970)	5HCLS-12R (1080)†	
390	5ACLS-18R (1500)	JCL-A-18R (1430)†	5HCLS-18R (1500)†	
450	5ACLS-24R (2200)	JCL-A-24R (1880)†	5HCLS-24R (2200)†	2

* Does not comply with ANSI C37.46 for "R" rating.

† Not UL Recognized.

Bolt-on (min. interrupting rating in amps)				
Amps	Regular	Regular		No. of barrels
30	5BCLS-30* (100)	—		
70	5BCLS-2R (180)	JCL-B-2R (165)†		
100	5BCLS-3R (270)	JCL-B-3R (220)†		
130	5BCLS-4R (360)	JCL-B-4R (320)†		1
150	5BCLS-5R (450)	JCL-B-5R (410)†		
170	5BCLS-6R (540)	JCL-B-6R (480)†		
200	5BCLS-9R (740)	JCL-B-9R (720)†		
230	5BCLS-12R (1080)	JCL-B-12R (970)†		
390	5BCLS-18R (1500)	JCL-B-18R (1430)†		
450	5BCLS-24R (2200)	JCL-B-24R (1880)†		
600	5BCLS-32R (3000)†	—		2
650	5BCLS-36R (3200)†	—		
800	5BCLS-44R (3600)†	—		

* Does not comply with ANSI C37.46 for "R" rating.

† Not UL Recognized.

GE Limitamp (min. interrupting rating in amps)			
Amps	Bolt-on	Bolt-on	No. of barrels
30	—	—	
70	5MCLS-2R-A (180)	5MCLS-2R-B (180)	
100	5MCLS-3R-A (270)	5MCLS-3R-B (270)	
130	5MCLS-4R-A (360)	5MCLS-4R-B (360)	
150	5MCLS-5R-A (450)	5MCLS-5R-B (450)	1
170	5MCLS-6R-A (540)	5MCLS-6R-B (540)	
200	5MCLS-9R-A (850)	5MCLS-9R-B (850)	
230	5MCLS-12R-A (1150)	5MCLS-12R-B (1150)	
390	5MCLS-18R-A (1725)	5MCLS-18R-B (1725)	
450	5MCLS-24R-A (2350)	5MCLS-24R-B (2350)	2

* Does not comply with ANSI C37.46 for "R" rating.

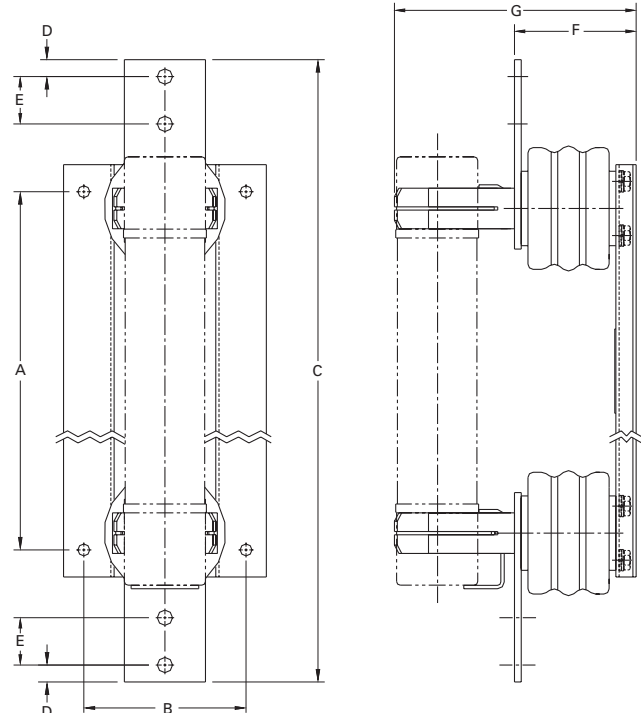
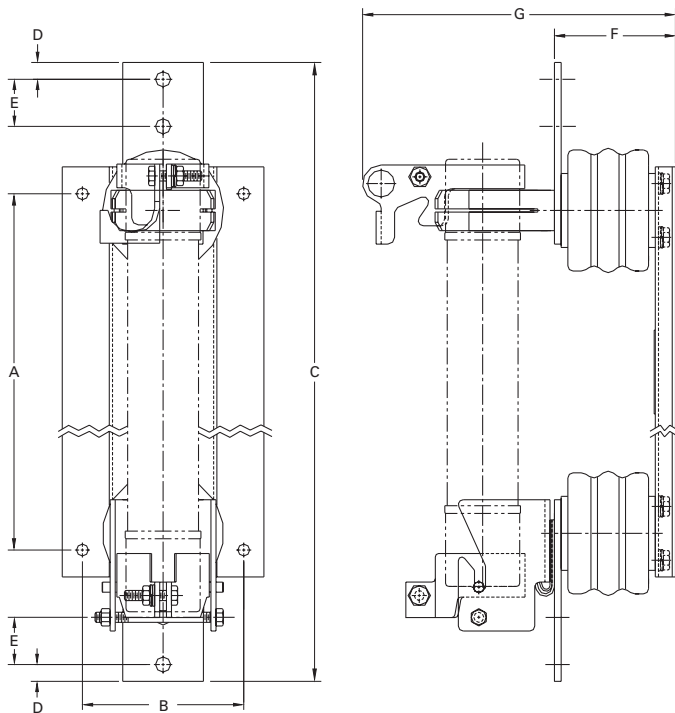
† Not UL Recognized.

5CLS, JCL, JCL-A, 5ACLS and 5HCLS Type mountings — in (mm)

Catalog number	Hole centers		Overall length C	Hole Inset D	Hole centers E	Contact height F	Overall height G	BIL rating (kV)
	A	B						
Disconnect single barrel†								
5CLE-GDM-D	15.24 (387.1)		25 (647.7)					
5CLE-PDM-D		6 (152.4)		0.62 (15.7)	1.75 (44.4)	4.5 (114.3)	11.72 (297.7)	60
5HLE-PDM-D	16.25 (412.8)		23 (584.2)					
5HLE-GDM-D								
Disconnect double barrel†								
5CLE-GDM-E	15.24 (387.1)		25 (647.7)					
5CLE-PDM-E		6 (152.4)		0.62 (15.7)	1.75 (44.4)	4.5 (114.3)	15.28 (388.1)	60
5HLE-GDM-E	16.25 (412.8)		23 (584.2)					
5HLE-PDM-E								
Non-disconnect single barrel								
5CLE-GNM-D	15.24 (387.1)		25 (635.0)					
5CLE-PNM-D		6 (152.4)		0.62 (15.7)	1.75 (44.4)	4.5 (114.3)	8.79 (223.3)	60
5HLE-GNM-D	16.25 (412.7)		23 (584.2)					
5HLE-PNM-D								
Non-disconnect double barrel								
5HLE-PNM-E	16.25 (412.7)	6 (152.4)	25 (635.0)	0.62 (15.7)	1.75 (44.4)	4.5 (114.3)	12.48 (317.0)	60
5HLE-GNM-E								

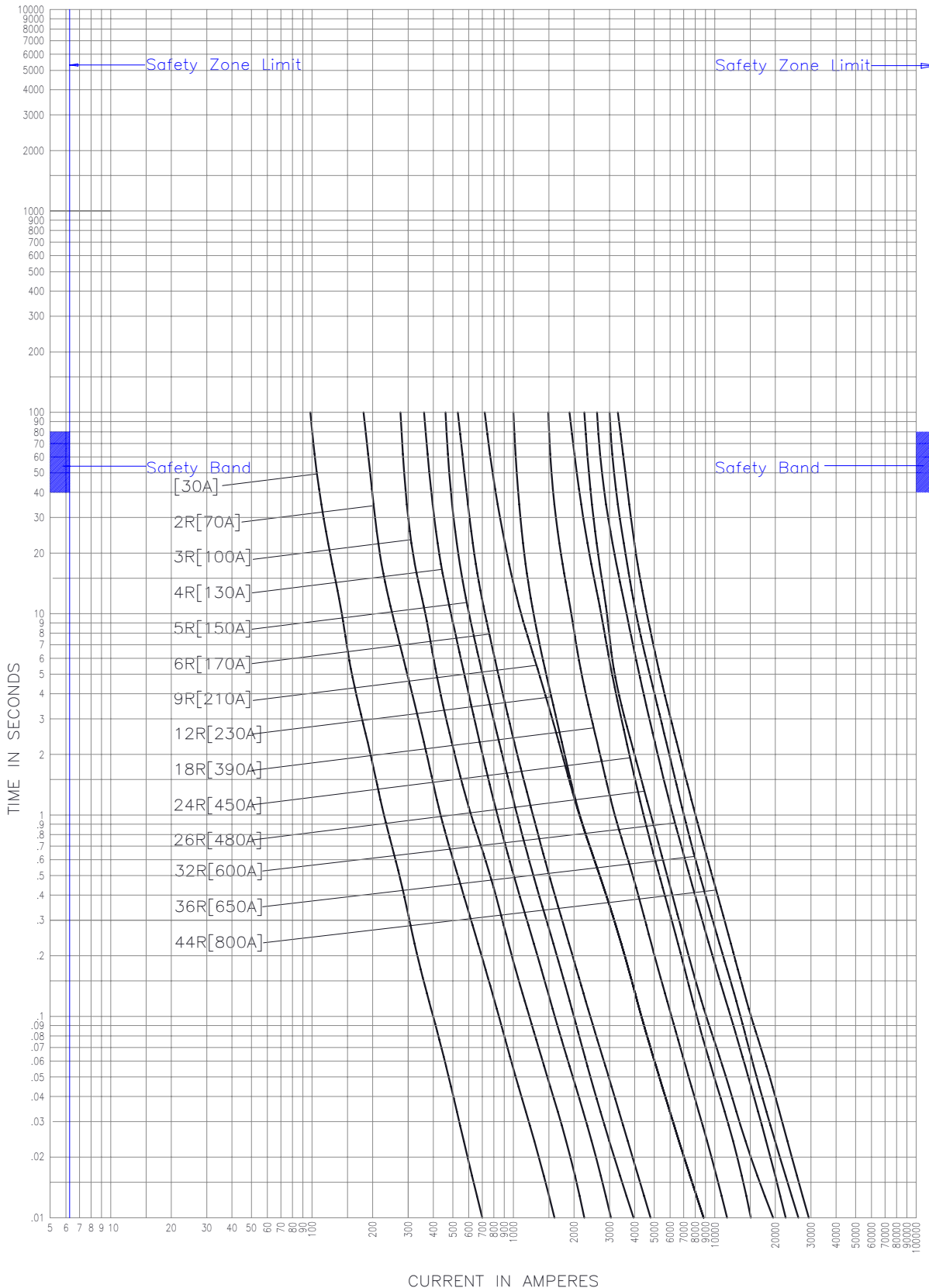
4.8 kV disconnect mounting†

4.8 kV non-disconnect mounting



† Disconnect mountings provide a means for fuse extraction only. Do not use a disconnect mounting for load switching or fuse removal while energized.

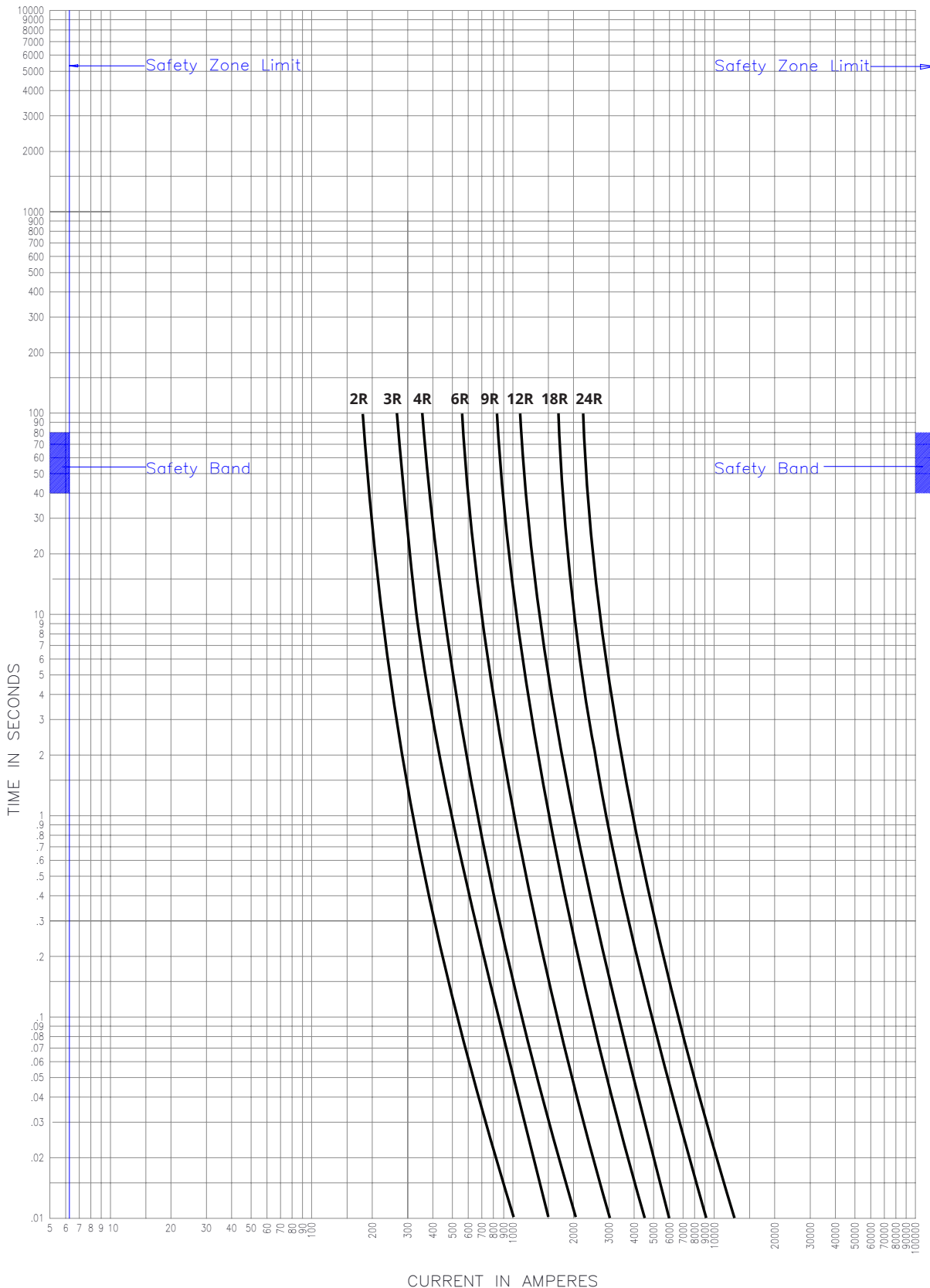
4.8 kV Time-current curves — minimum melting for 5ACLS-30, 5CLS-30, 5HCLS_R, 5BCLS-30, 5BCLS_R, (30A, 2R-24R @ 25°C)



Type 5[4]CLS, 5ACLS, 5BCLS, 5HCLS-30A, JCL-B, JCG,
2R - 44R Motor Start Current Limiting Fuses Minimum Melting
Time-Current Characteristics

CURVE TC66690602a
January 2024

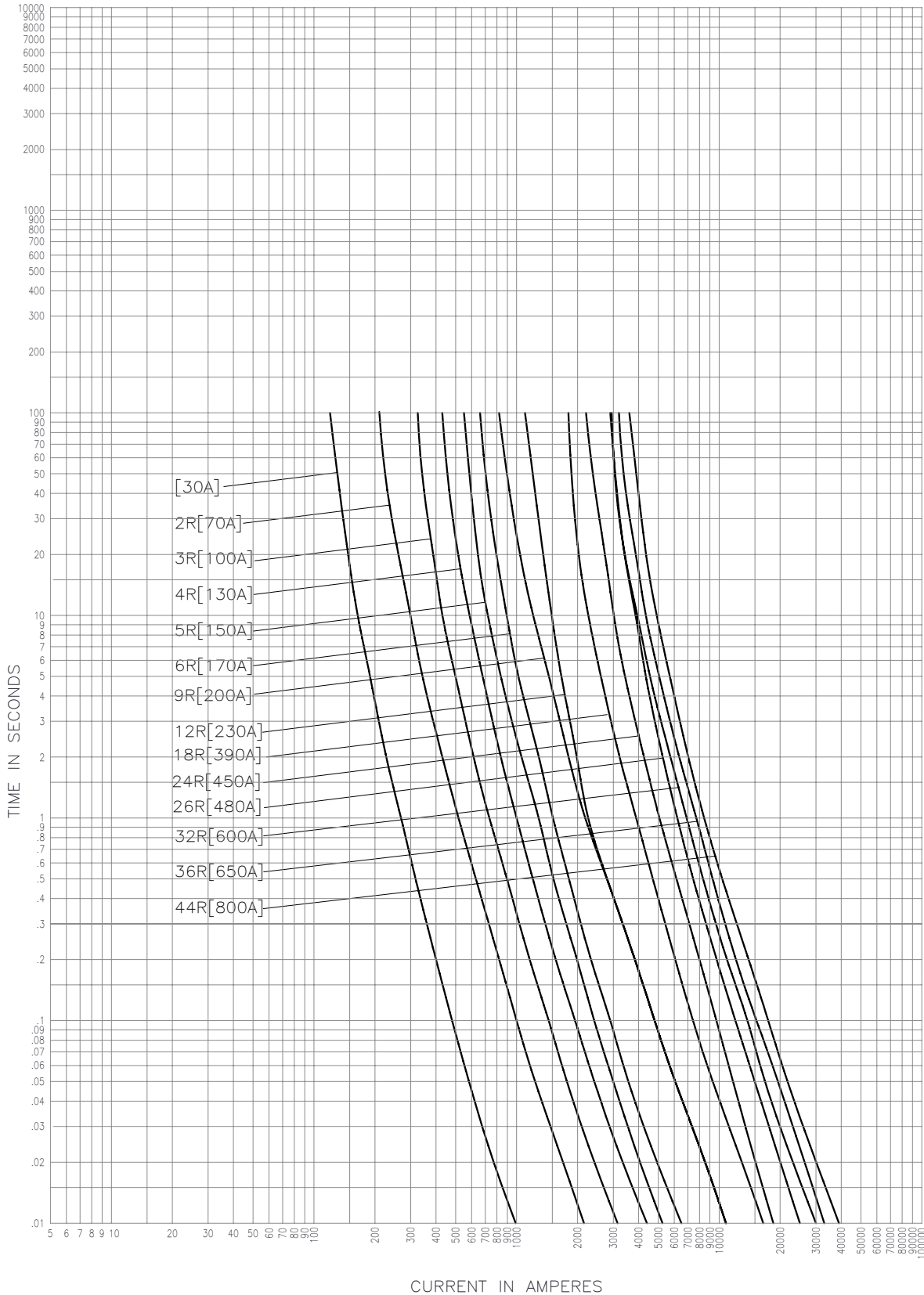
4.8 kV Time-current curves — minimum melting for 5MCLS_R-A and 5MCLS_R-B (2R-24R @ 25°C)



Type 5MCLS 2R thru' 24R Motor Start Current Limiting Fuses
Minimum Melting Time-Current Characteristics

CURVE TC66690602b
January 2024

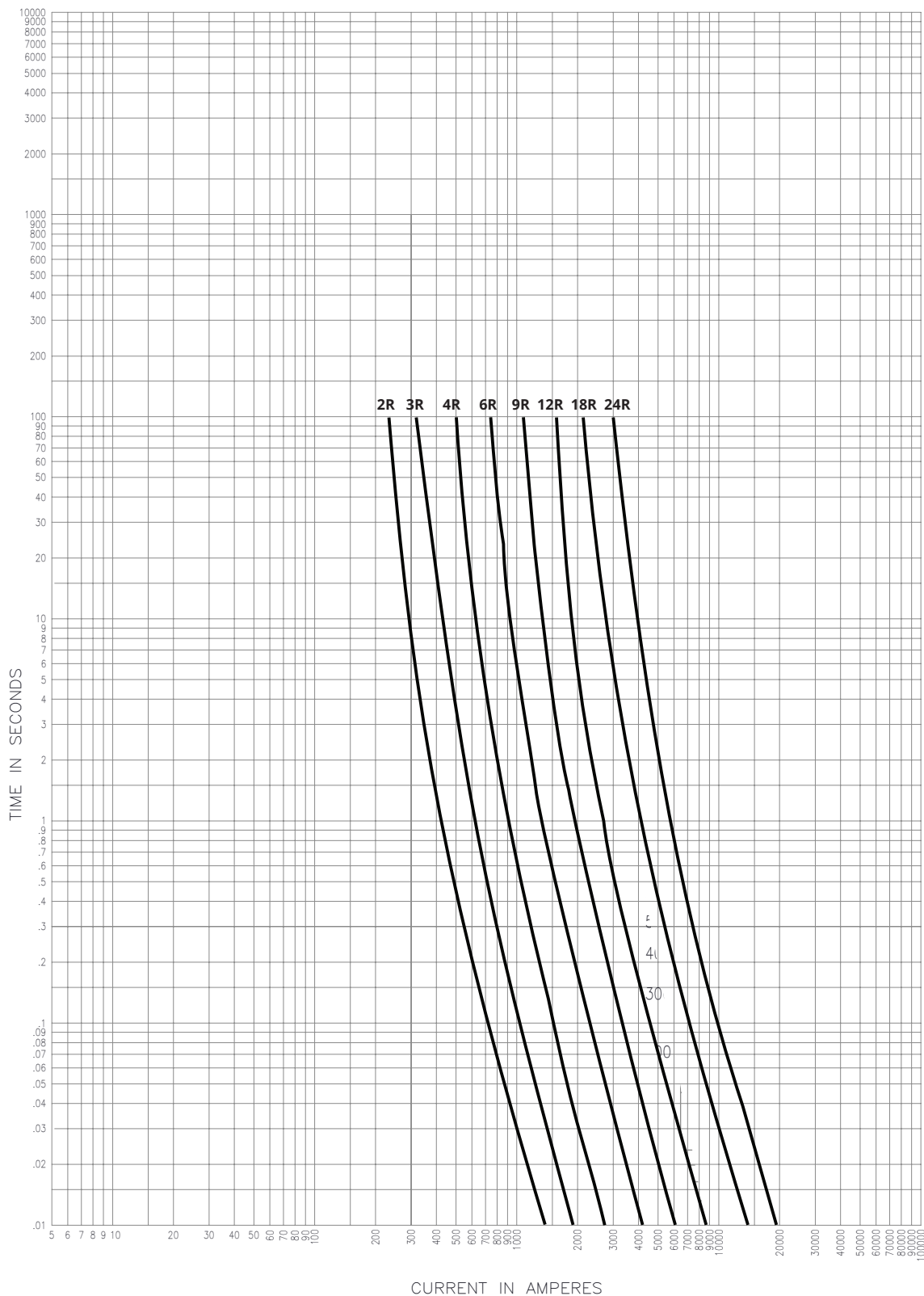
4.8 kV Time-current curves — total clearing for 5ACLS-30, 5CLS-30, 5HCLS_R, 5BCLS-30, 5BCLS_R (30A, 2R-24R @ 25°C)



Type 5[4]CLS, 5ACLS, 5BCLS, 5HCLS-30A, JCL-B, JCG,
2R - 44R Motor Start Current Limiting Total Clearing
Time-Current Characteristics

CURVE TC66690702a
January 2024

4.8 kV Time-current curves — total clearing for 5MCLS_R-A and 5MCLS_R-B (2R-24R @ 25°C)

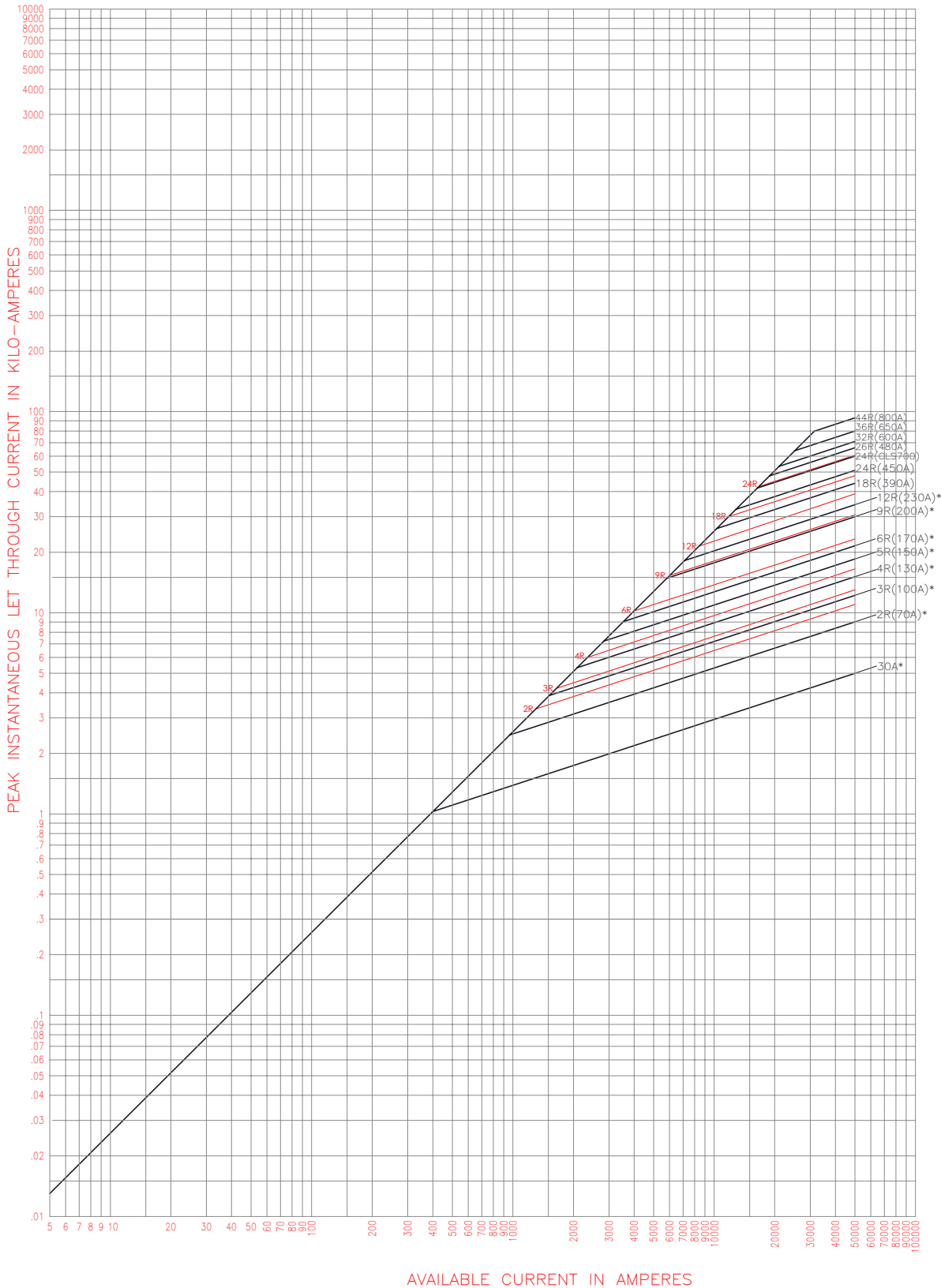


Type 5MCLS 2R thru' 24R Motor Start Current Limiting Total Clearing Time-Current Characteristics

CURVE TC66690702b
 January 2024

Curves are based on tests starting with fuse unit at ambient temperature of 25 C and without initial load. Curves are plotted to maximum test points so all variations should be negative.

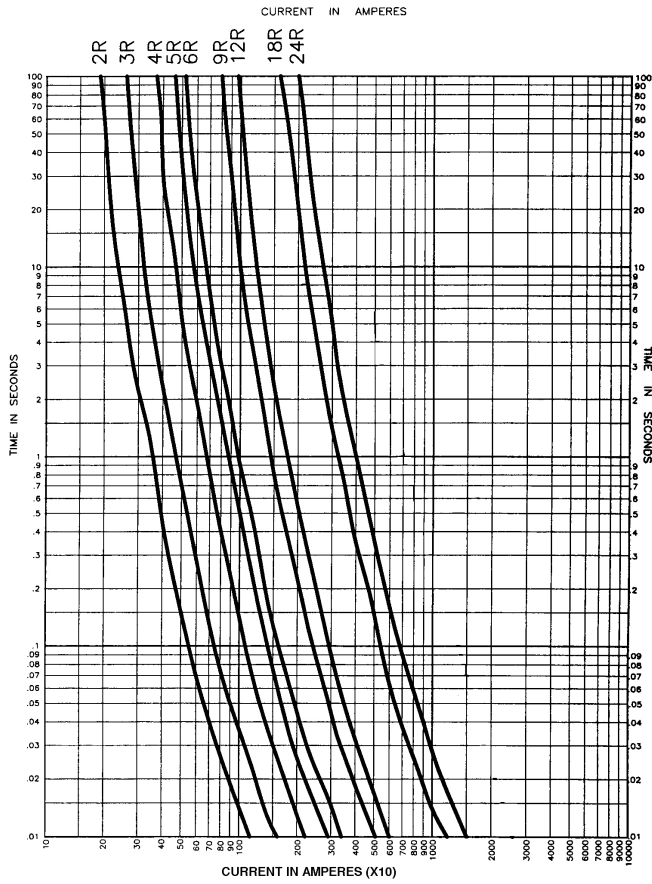
4.8 kV Peak let-through curves for 5ACLS-30, 5CLS-30, 5HCLS-R, 5BCLS-30, 5BCLS-R, 5MCLS-R-A and 5MCLS-R-B (30A, 2R-24R @ 25°C)



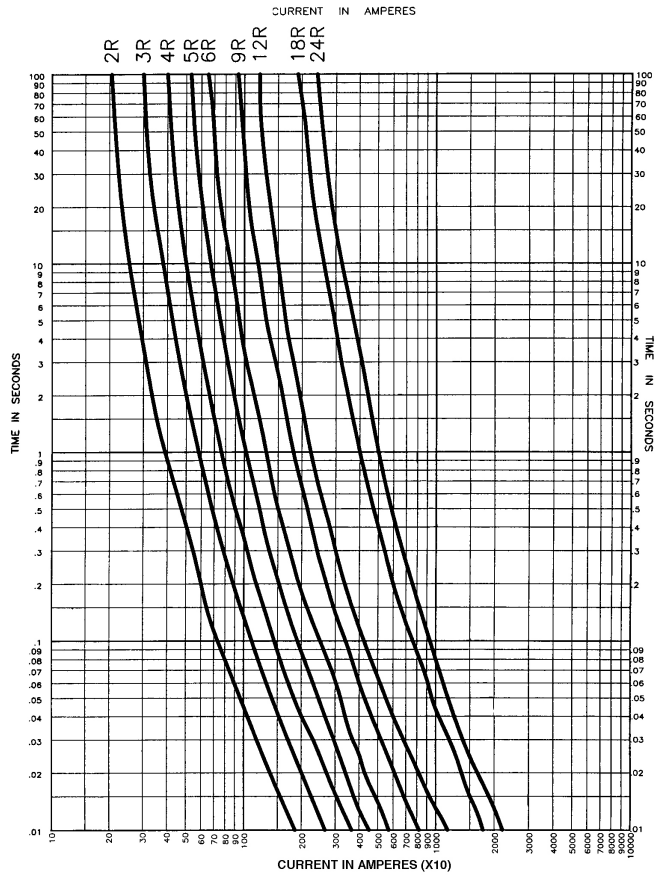
Type 5[4]CLS, 5ACLS, 5BCLS, 5HCLS-30A, JCL-B, JCG, 5MCLS,
2R - 44R Motor Start Current Limiting Fuses Peak Let Through
Current Characteristics

CURVE TC66700203
January 2024

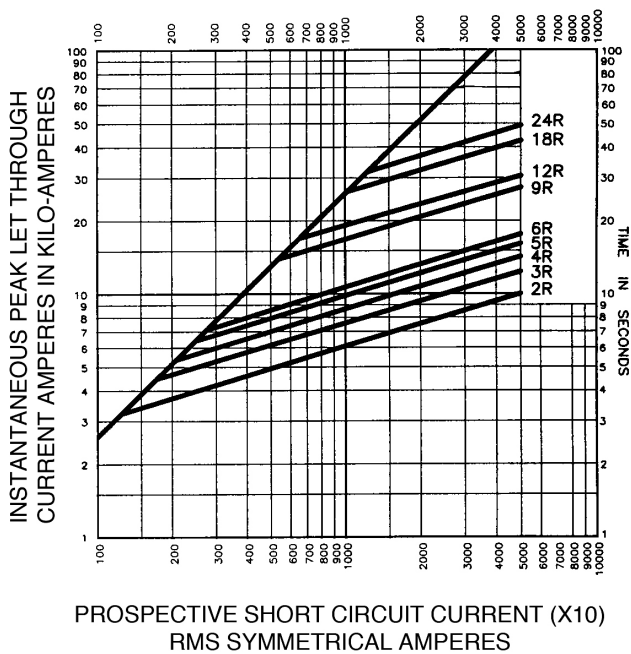
4.8 kV Time-current curves — minimum melting for JCL-R and JCL-A-R (2R-24R @25°C)



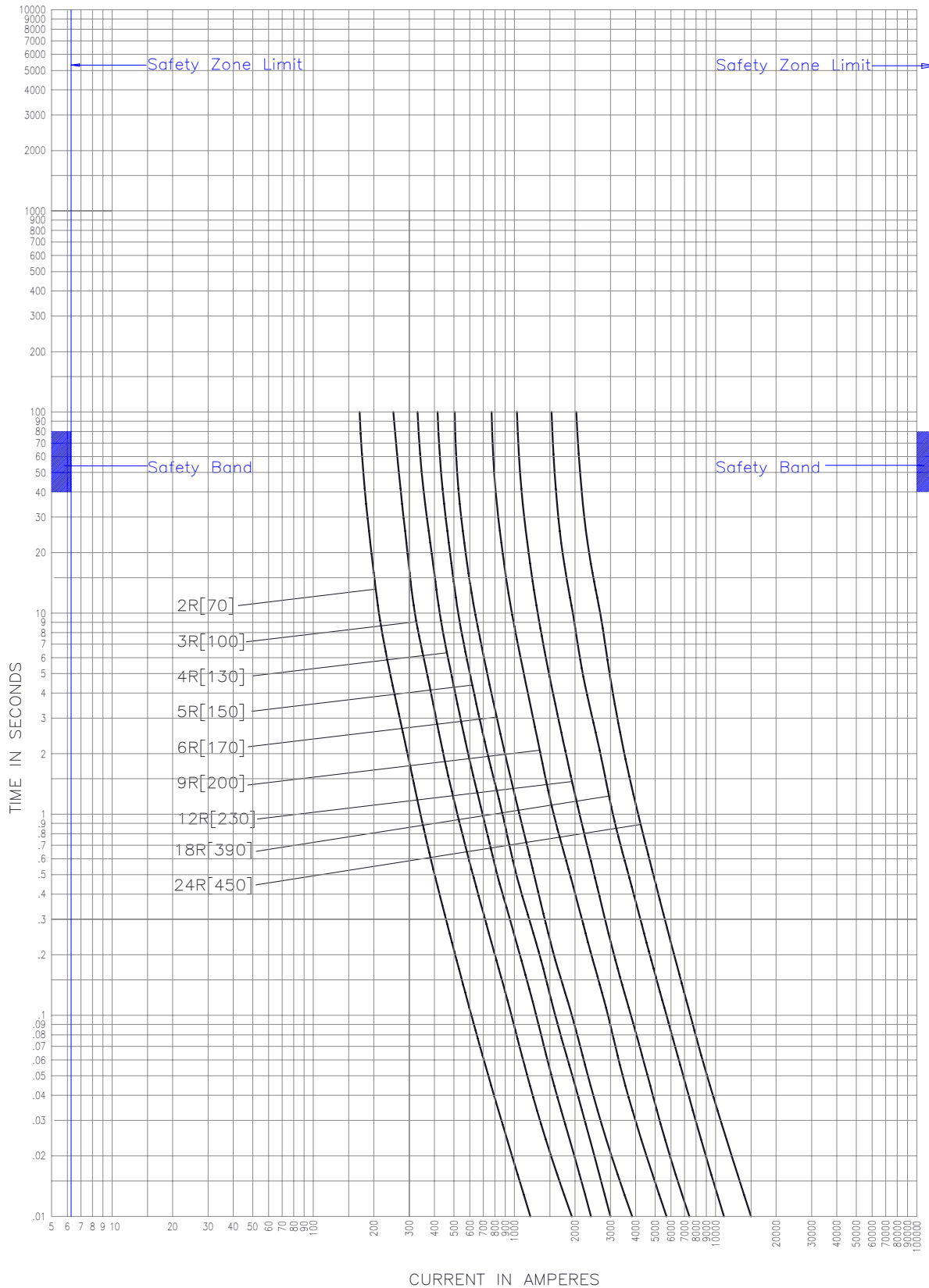
4.8 kV Time-current curves — total clearing for JCL-R and JCL-A-R (2R-24R @25°C)



4.8 kV Peak let-through curves for JCL-R and JCL-A-R (2R-24R @25°C)



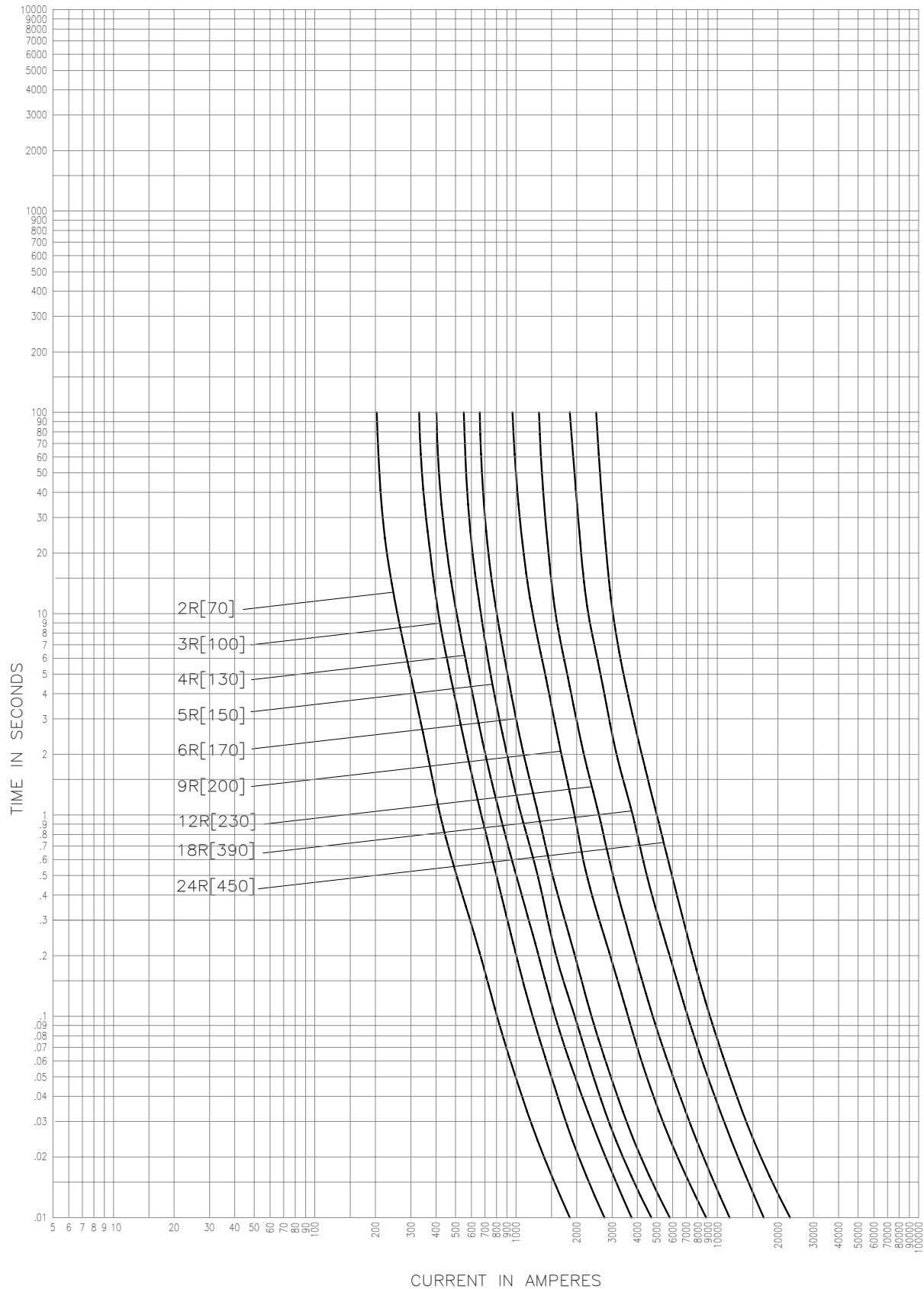
4.8 kV Time-current curves — minimum melting for 5LCLS_R (2R-24R @ 25°C)



Type 5LCLS—2R thru' 24R Motor Start Current Limiting Fuses.
Minimum Melting Time—Current Characteristics

CURVE TC51285302
February 2024

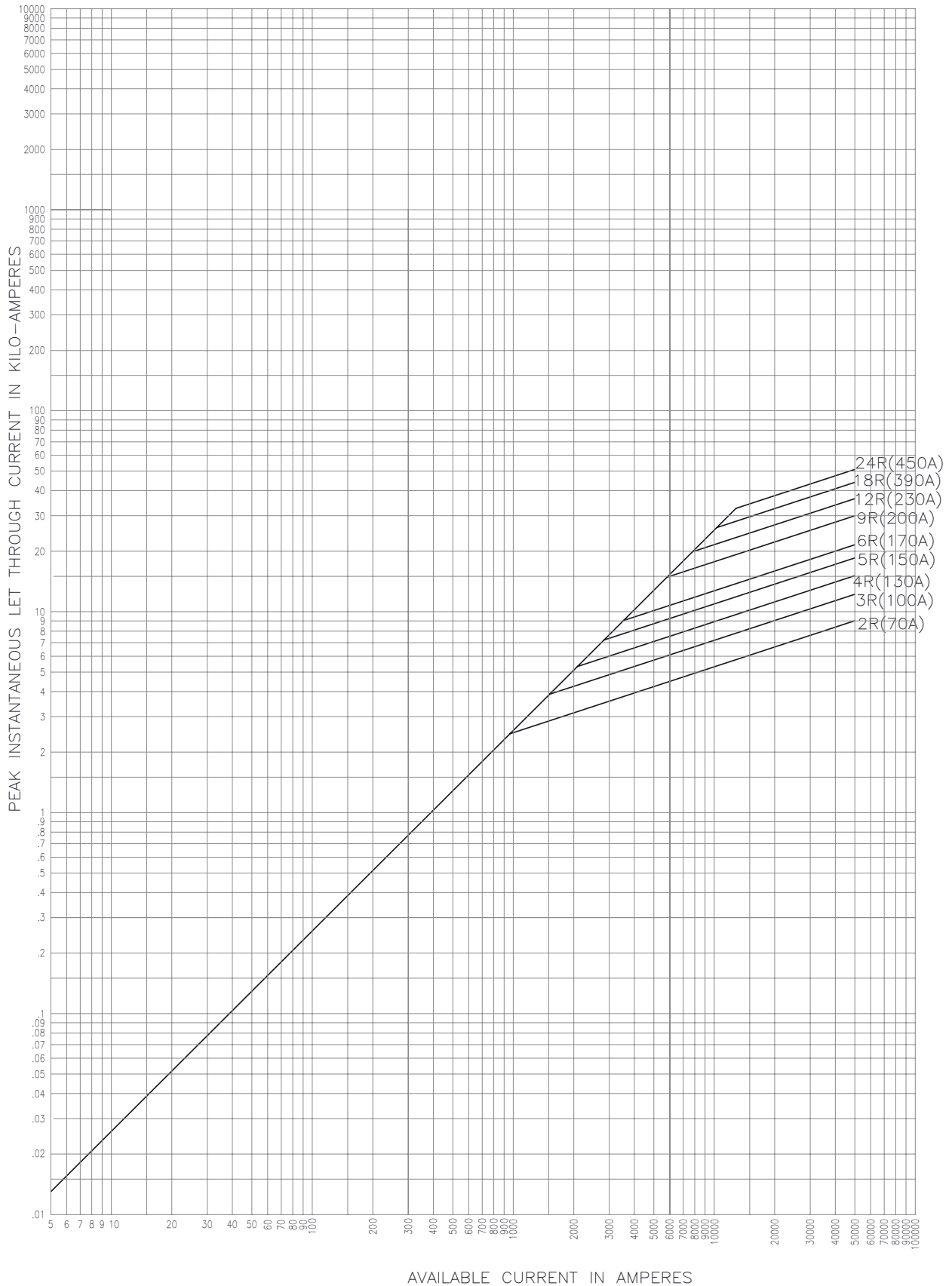
4.8 kV Time-current curves — total clearing for 5LCLS_R (2R-24R @ 25°C)



Type 5LCLS 2R thru' 24R Motor Start Current Limiting Fuses.
 Total Clearing Time-Current Characteristics

CURVE TC51285402
 February 2024

4.8 kV Peak let-through curves for 5LCLS_R (2R-24R @ 25°C)



Type 5LCLS-2R thru' 24R Motor Start Current Limiting Fuses.
Peak let Through Current Characteristics

CURVE TC66700204
February 2024

7.2 kV R-Rated fuses

Catalog symbols:

Code-(amps)R	Construction
8CLS_R	Standard (2R - 6R)
8ACLS_R	AMPGARD Hookeye* (2R - 6R)
7BCLS_R	Bolt-on (2R - 6R)

* For use in 400 amp AMPGARD motor starters.

Ratings:

- Volts
 - 7.2 kV (nominal)
 - 8.3 kV (max design 70-170A standard and AMPGARD Hookeye)
 - 7.2 kV (max design 70-170A bolt-on)
- Amps 70-170 A
- Interrupting ratings
 - 50 kA Sym
 - 80 kA Asym

Recommended fuse holders for standard constructions:

Amp range	Description	BIL (kV)	Cat. No.
Fuseclips			
	3" Enclosed fuseclip*		A3354730
70-170	3" Open fuseclip	—	1A0065
	3" Spring loaded open fuseclip		9078A67G04
Fuse holders for 7CLS and 8CLS			
	Non-disconnect holder, porcelain		8HLE-PNM-D
70-170	Non-disconnect holder, glass polyester	75	8HLE-GNM-D
	Disconnect holder, porcelain		8HLE-PDM-D
	Disconnect holder, glass polyester		8HLE-GDM-D

* Single barrel only, not sold in pairs.

7.2 kV R-Rated fuse catalog numbers

Amp rating	"R" Designation	Mounting style (minimum interrupting rating in amps)			Number of barrels
		Standard	AMPGARD Hookeye	Bolt-on	
70	2R	8CLS-2R (160)	8ACLS-2R (160)	7BCLS-2R (160)	1
100	3R	8CLS-3R (250)	8ACLS-3R (250)	7BCLS-3R (250)	
130	4R	8CLS-4R (325)	8ACLS-4R (325)	7BCLS-4R (325)	
150	5R	8CLS-5R (390)	8ACLS-5R (390)	7BCLS-5R (390)	
170	6R	8CLS-6R (500)	8ACLS-6R (500)	7BCLS-6R (500)	

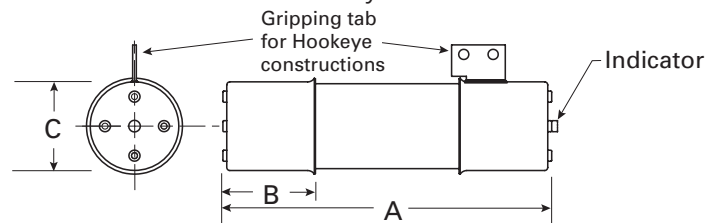
8CLS, 8ACLS Type mountings — in (mm)

Catalog number	Hole centers		Overall length	Hole inset	Hole centers	Contact height	Overall height	BIL (kV)
	A	B						
Disconnect single barrel¹								
8HLE-GDM-D	16.25 (412.8)	6 (152.4)	23 (584.2)	0.62 (15.7)	1.75 (44.4)	7 (177.8)	11.72 (297.7)	75
8HLE-PDM-D								
Non-disconnect single barrel								
8HLE-GNM-D	16.25 (412.7)	6 (152.4)	23 (584.2)	0.62 (15.7)	1.75 (44.4)	7 (177.8)	11.29 (286.7)	75
8HLE-PNM-D								

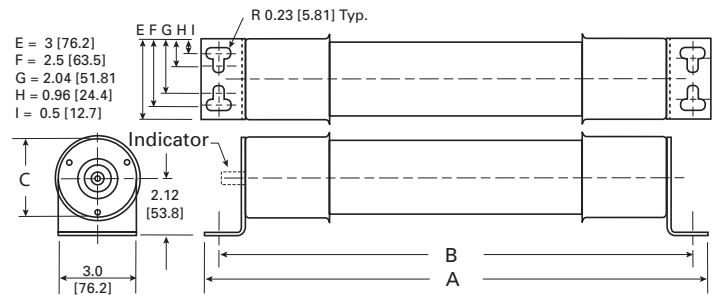
Dimensions — in [mm]

Construction	Amp range	Dimension		
		A	B	C
Standard	70-170	15.8 (401)	3 (76)	3 (76)
AMPGARD Hookeye				
Bolt-on		19.2 (488)	17.9 (455)	3 (76)

Standard and AMPGARD Hookeye



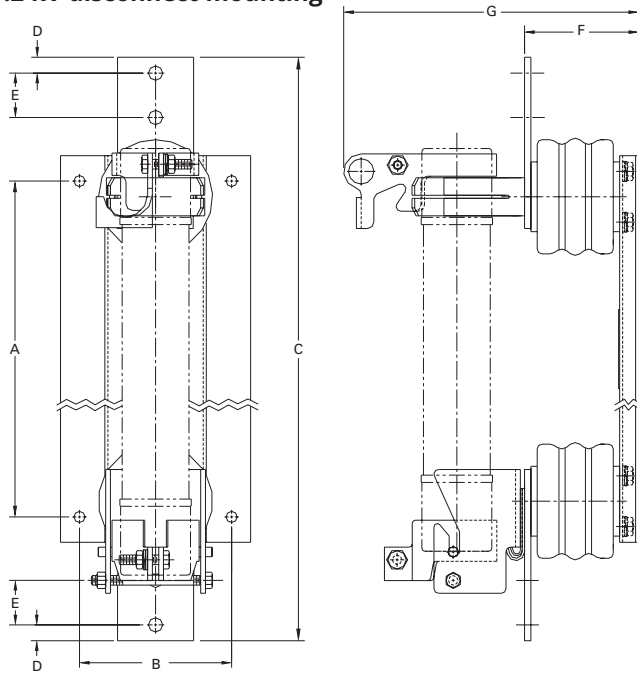
Bolt-on



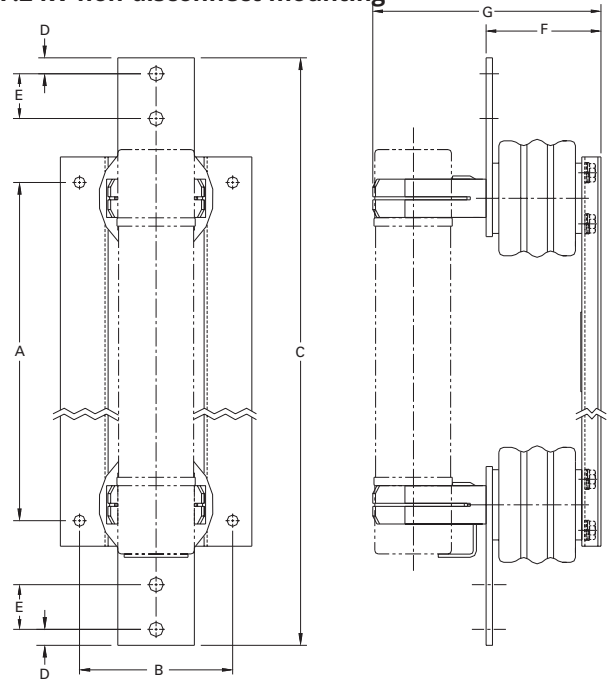
8CLS, 8ACLS, 7BCLS Type mountings — in (mm)

Catalog number	Hole centers		Overall length	Hole inset	Hole centers	Contact height	Overall height	BIL (kV)
	A	B	C	D	E	F	G	
Disconnect†								
8HLE-GDM-D	16.25 (412.8)	6 (152.4)	23 (584.2)	0.62 (15.7)	1.75 (44.4)	7 (177.8)	11.72 (297.7)	75
8HLE-PDM-D								
Non-disconnect								
8HLE-GNM-D	16.25 (412.7)	6 (152.4)	23 (584.2)	0.62 (15.7)	1.75 (44.4)	7 (177.8)	11.29 (286.7)	75
8HLE-PNM-D								

7.2 kV disconnect mounting†

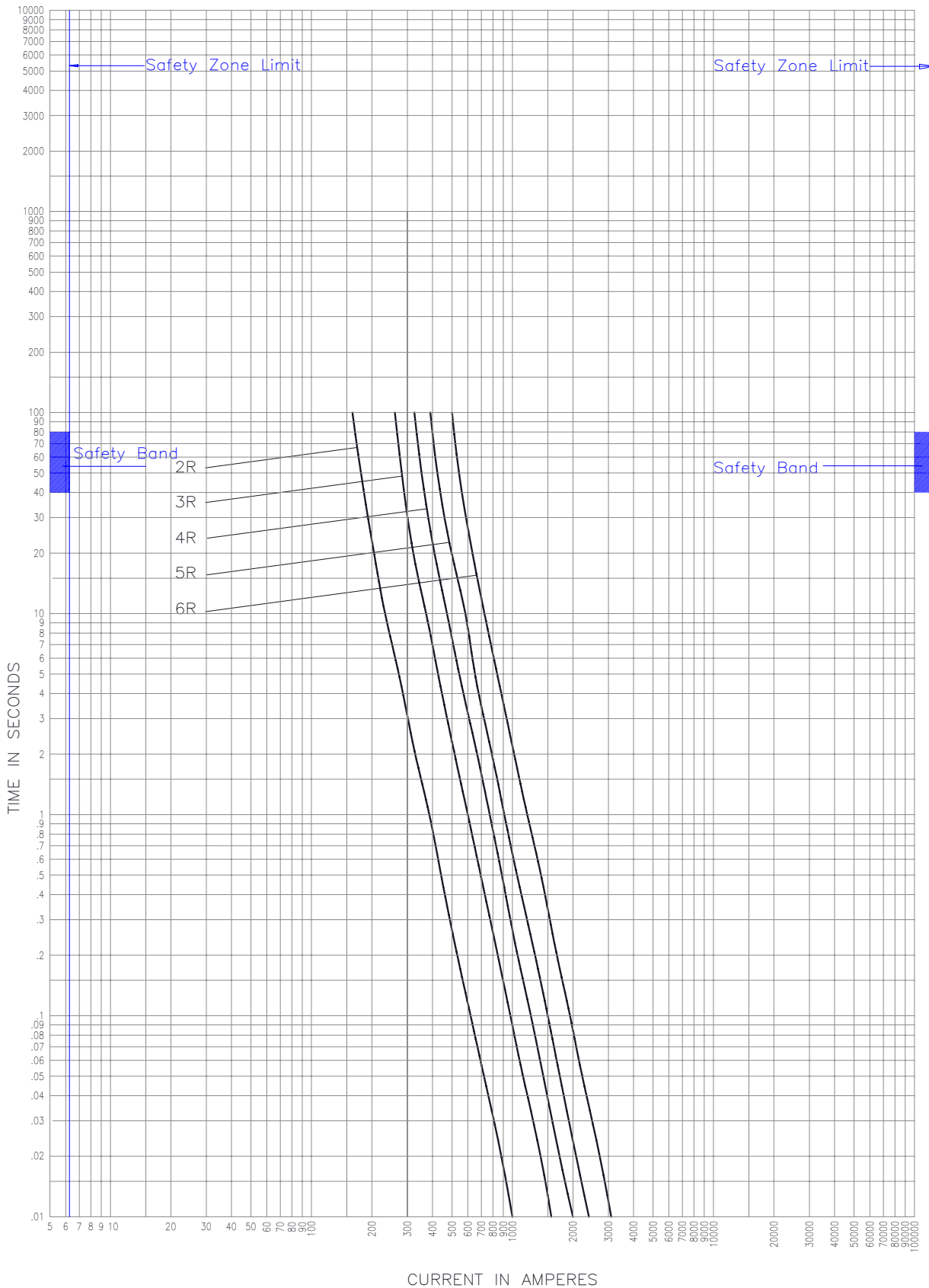


7.2 kV non-disconnect mounting



† Disconnect mountings provide a means for fuse extraction only. Do not use a disconnect mounting for load switching or fuse removal while energized.

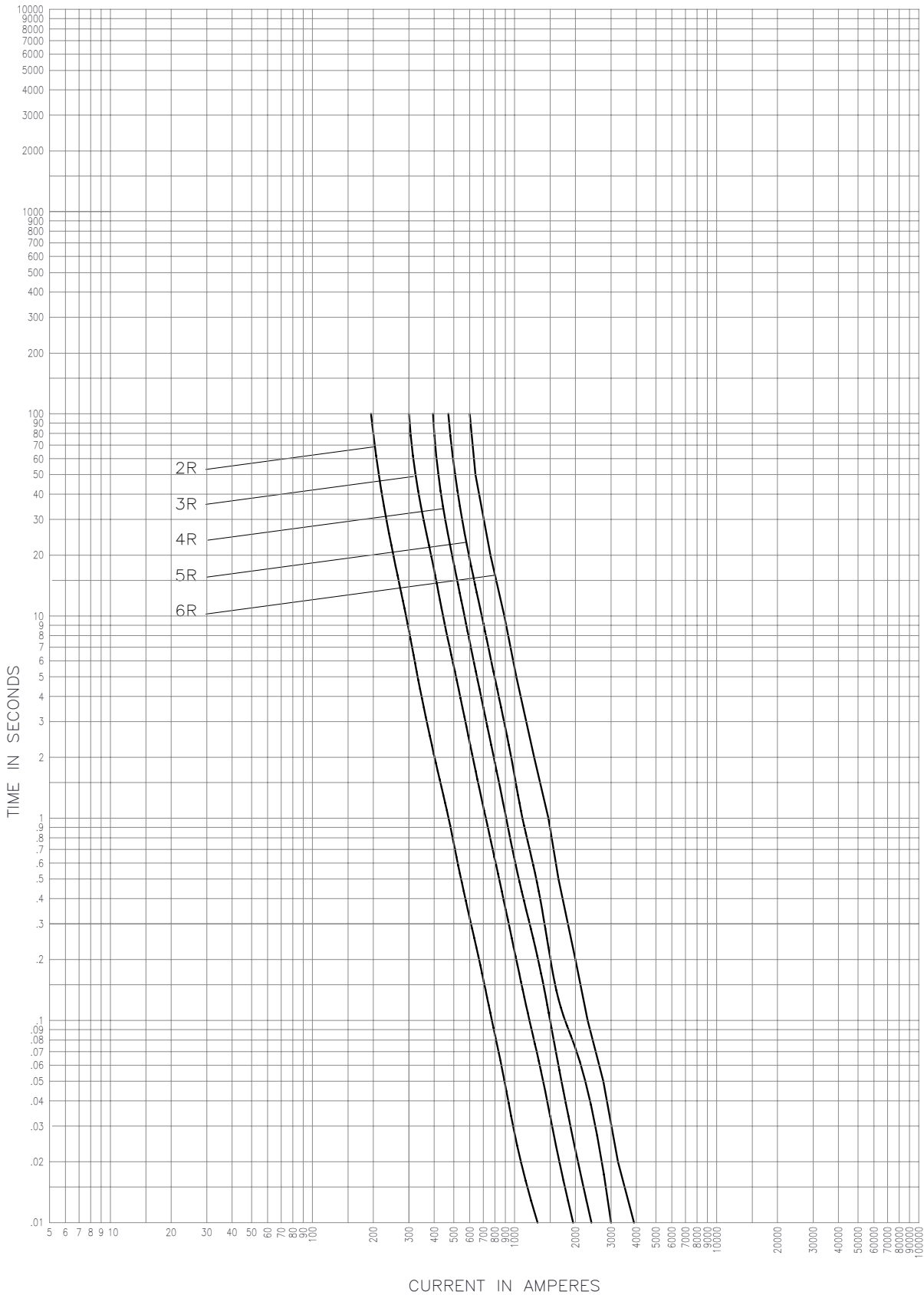
7.2 kV Time-current curves — minimum melting for 8CLS_R, 8ACLS_R, and 7BCLS_R (2R-44R @ 25C)



Type 8CLS, 8ACLS, 7BCLS 2R thru' 6R Motor Start Current Limiting Fuses
Minimum Melting Time-Current Characteristics

CURVE TC66700602
January 2024

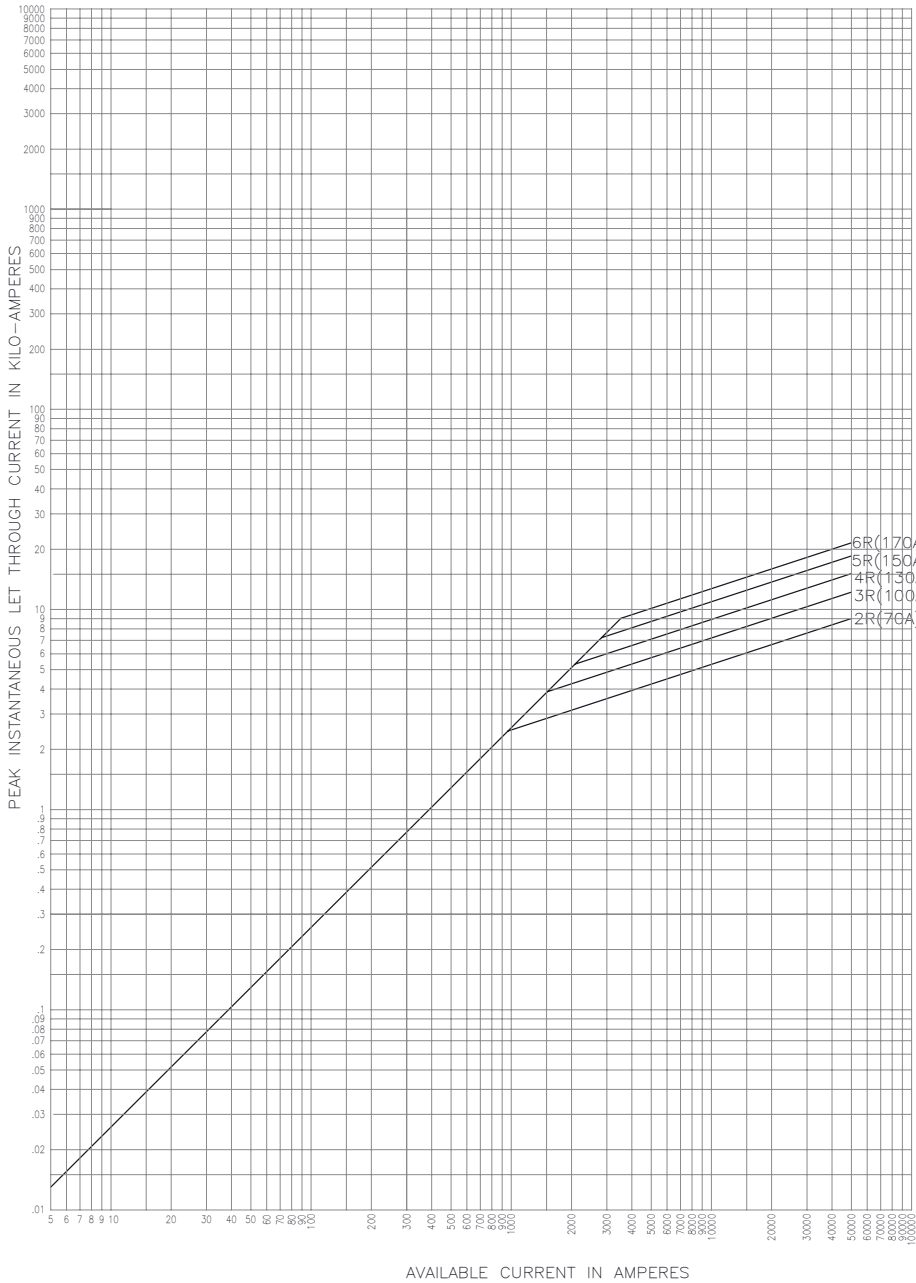
7.2 kV Time-current curves — total clearing for 8CLS_R, 8ACLS_R, and 7BCLS_R (2R-44R @ 25C)



Type 8CLS, 8ACLS, 7BCLS 2R thru' 6R Motor Start Current Limiting Fuses
Total Clearing Time-Current Characteristics

CURVE TC66700702
January 2024

7.2 kV Peak let-through curves for 8CLS_R, 8ACLS_R, and 7BCLS_R (2R-44R @ 25C)



Type 8CLS, 8ACLS, 7BCLS 2R thru' 6R Motor Start Current Limiting Fuses. CURVE TC66700205
Peak let Through Current Characteristics January 2024

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