Remote Operated Circuit Breaker

Catalog/Selection Guide





Remote Operated Circuit Breaker

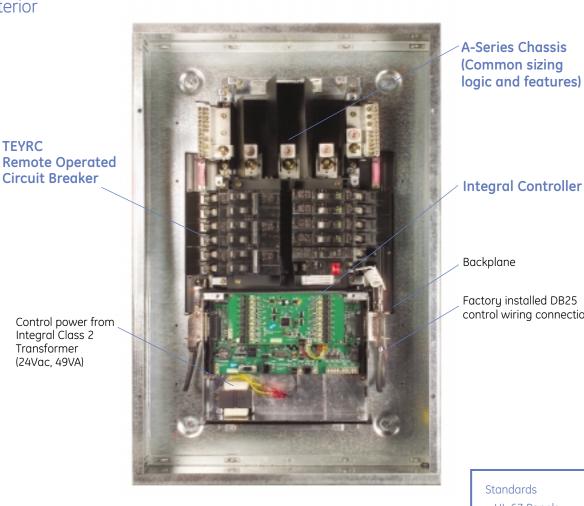
TEYRC

Circuit Breaker

Integral Class 2 Transformer (24Vac, 49VA)

A-Series Lighting Control Panels reduce energy costs by providing programmable control of the breaker. The integration of the controller in the panel lowers installation costs and provides valuable space savings over traditional external relay panels. The A-Series Lighting Control Panel can be stand-alone or networked into a building automation system.

Panel Interior



A-Series Lighting Control Panel

Bolt-On Factory Assembled Service Information:

3-ph, 4-w, 480Y/277Vac, 208Y/120Vac 1-ph, 3-w, 120/240Vac

Main Breaker:

Main Lugs:

100A-TEY, SE

125-400A

225A-TFJ, SF

400A-TJJ, SG

Bolt On Branch Breakers:

Type TEYRC, TEY

Standards

A-Series Chassis

Integral Controller

Factory installed DB25 control wiring connection

Backplane

- UL 67 Panels
- UL 50 Enclosures
- UL 489 Molded Case Circuit Breakers
- UL 916 Energu Management Equipment

Remote Operated Circuit Breakers

Breaker Selection

Poles	Amperage	Catalog Number
	15A	TEYRC115
1	20A	TEYRC120
	30A	TEYRC130
	15A	TEYRC215
2	20A	TEYRC220
	30A	TEYRC230

Interrupting Ratings (Amps RMS)

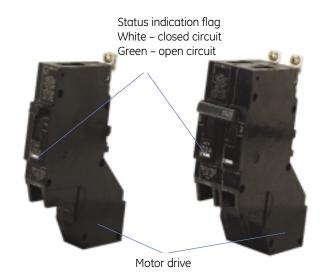
System Voltage	120 Vac	240 Vac	480Y/277 Vac
1-Pole	65,000	14,000	14,000
2-Pole	_	65,000	14,000

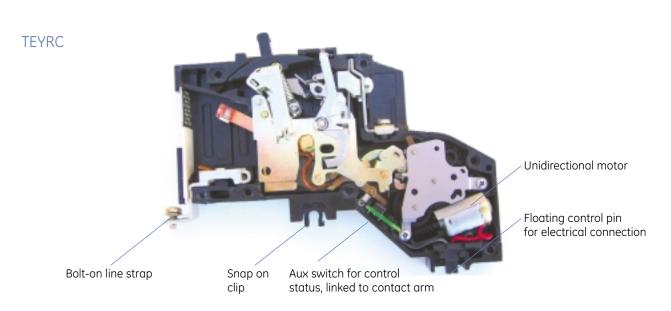
Breakers suitable for 120/240V, 120/208Y, 277/480V applications.

Main Breaker Series Ratings with TEYRC®

	125A	225A	400A
120/240 Vac	SEL – 100kA	SFL - 100kA J or T Fuse - 100kA	J or T Fuse – 100kA
240 Vac	SEL – 100kA SEP – 200kA	SFH – 65kA J or T Fuse – 100kA	J or T Fuse – 100kA
277Vac	SEH – 25kA SEL – 25kA	SFL - 65kA J or T Fuse - 100kA	J or T Fuse – 100kA
480Y/277 Vac	SEH – 25kA SEL – 25kA	SFH – 35kA SFL – 65kA J or T Fuse – 100kA	J or T Fuse – 100kA

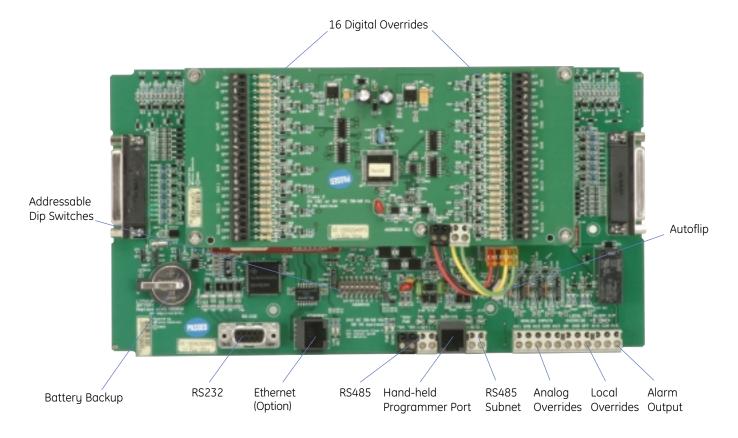
 $[\]odot$ Please refer to UL Component Recognized Series Connected Ratings publication DET-008 for latest testing results.





Remote Operated Circuit Breaker

Controller



Features

- Open Protocol; Native BACnet & Modbus
- 16 Lighting Groups of Control
- Real-time Clock, Astronomical Clock
- Programmable Off Warning Flick
- Self Diagnostics
- Breaker Contact Status
- Event Alarm and Recovery

Overrides

- 16 Digital Inputs, 2- or 3-Wire, Momentary or Maintained, Dry Contact Input
- 3 Analog Inputs, 4-20mA, 10K, 5V, 10V

Scheduling

- 16 Time-of-Day On / Off Scheduling
- Day-of-Week Repeating Schedule
- Holidays Control Override
- Leap Year & Daylight Savings Time

Autoflip

 Allows user to easily rotate breaker mapping by 180° without reprogramming or rewiring

Burnhour Tracking

• Totals the run time of breaker loads

Load Priority Management

• Enables setting of load shed levels on each breaker

How To Select and Price A-Series Lighting Control Panels

- 1. Choose main device and number of branch circuits
- **2.** Choose branch breakers
- **3.** Choose controller
- 4. Add panel options and accessories
- **5.** Add external accessories

1. Choose Main Device and Number of Branch Circuits

Main Lug Interiors

Panel Amps Max.	Branch Space Required	Catalog Number	List Price, GO-101	Sizing Dim. (In.)
·	0-12	AEF3121MB	\$605.00	22.5
	13-18	AEF3181MB	\$658.00	25.5
125	19-24	AEF3241MB	\$750.00	28.5
125	25-30	AEF3301MB	\$841.00	31.5
	31-36	AEF3361MB	\$933.00	34.5
	37-42	AEF3421MB	\$1,024.00	37.5
	0-12	AEF3122MB	\$672.00	28.5
	13-18	AEF3182MB	\$726.00	31.5
225	19-24	AEF3242MB	\$817.00	34.5
225	25-30	AEF3302MB	\$908.00	37.5
	31-36	AEF3362MB	\$1,000.00	40.5
	37-42	AEF3422MB	\$1,091.00	43.5
	0-12	AEF3124MB	\$832.00	37.5
	13-18	AEF3184MB	\$908.00	40.5
400	19-24	AEF3244MB	\$992.00	43.5
400	25-30	AEF3304MB	\$1,084.00	46.5
	31-36	AEF3364MB	\$1,175.00	49.5
	37-42	AEF3424MB	\$1,265.00	52.5

Main Breaker Interiors®

Panel Amps	Branch Space			25kA 480Y/277Vac			65kA 480Y/277 Vac 85kA 240 Vac Max.			
Max.	Required	Catalog Number②	List Price, GO-101	Sizing Dim. (In.)	Catalog Number②	List Price, GO-101	Sizing Dim. (In.)	Catalog Number②	List Price, GO-101	Sizing Dim. (In.)
	0-12	AEF3121BB	\$990.00	22.5	AEF3121KB	\$1,285.00	25.5	AEF3121DB	\$1,606.00	25.5
	13-18	AEF3181BB	\$1,043.00	25.5	AEF3181KB	\$1,338.00	28.5	AEF3181DB	\$1,659.00	28.5
100	19-24	AEF3241BB	\$1,134.00	28.5	AEF3241KB	\$1,429.00	31.5	AEF3241DB	\$1,750.00	31.5
100	25-30	AEF3301BB	\$1,225.00	31.5	AEF3301KB	\$1,520.00	34.5	AEF3301DB	\$1,842.00	34.5
	31-36	AEF3361BB	\$1,317.00	34.5	AEF3361KB	\$1,612.00	37.5	AEF3361DB	\$1,933.00	37.5
	37-42	AEF3421BB	\$1,406.00	37.5	AEF3421KB	\$1,701.00	40.5	AEF3421DB	\$2,025.00	40.5
	0-12	AEF3122BB	\$1,711.00	40.5	AEF3122KB	\$2,006.00	40.5	AEF3122DB	\$3,224.00	40.5
	13-18	AEF3182BB	\$1,764.00	43.5	AEF3182KB	\$2,059.00	43.5	AEF3182DB	\$3,276.00	43.5
225	19-24	AEF3242BB	\$1,854.00	46.5	AEF3242KB	\$2,149.00	46.5	AEF3242DB	\$3,367.00	46.5
223	25-30	AEF3302BB	\$1,946.00	49.5	AEF3302KB	\$2,241.00	49.5	AEF3302DB	\$3,459.00	49.5
	31-36	AEF3362BB	\$2,037.00	52.5	AEF3362KB	\$2,332.00	52.5	AEF3362DB	\$3,550.00	52.5
	37-42	AEF3422BB	\$2,128.00	55.5	AEF3422KB	\$2,423.00	55.5	AEF3422DB	\$3,642.00	55.5
	0-12	AEF3124BB	\$2,556.00	46.5	-	_	-	-	-	-
	13-18	AEF3184BB	\$2,642.00	49.5	-	_	-	-	_	-
400	19-24	AEF3244BB	\$2,731.00	52.5	-	_	-	-	-	-
400	25-30	AEF3304BB	\$2,823.00	55.5	-	ı	-	-	-	-
	31-36	AEF3364BB	\$2,914.00	58.5	-	ı	-	-	-	-
	37-42	AEF3424BB	\$3,004.00	61.5	-	_	-	_	_	_

 $[\]odot$ Bottom feed supplied as standard - change last character in Catalog Number from B to T for top feed.

② Includes standard panelboard interior, box and front. Add price for options when required.

③ Ratings at 120/240Vac: 100A-65kA, 225A-25kA, 400A-42kA.

2. Choose Branch Breakers

Branch Breakers, Bolt-on

Branch Breaker	Tuno	Bolt-on	Trip Range		List Price, GO-101	
Mounting	runting Type frame (amps) 1-Pol		1-Pole 277Vac	2-Pole 480Y/277Vac	3-Pole 480Y/277Vac	
	TEYRC (14kAIC)	TEYRC	15-30③	\$248.00	\$550.00	_
	TEV (1/4LAIC)	TEY	15-60④	\$53.00	\$130.00	\$230.00
Double Branch	TEY (14kAIC)	IEY	70-100®	\$116.00	\$274.00	\$326.00
	THQB (10kAIC)	THQBGF	15-30⑥	\$122.00	\$203.00	_
		THQBGFEP	15-30⑥	\$232.00	\$533.00	_
	TED4 (14kAIC)	TED4	125-150	=	-	\$1002.00
Culefo	SEH (25kAIC)	SEH	125-150	_	_	\$1930.00
Subfeed Breakers①②	SELL (65kAIC)	SEL	125-150	_	_	\$2280.00
	SFH (25kAIC)	SFH	125-225	=	\$1256.00	\$1571.00
	SFL (65kAIC)	SFL	125-225	_	\$2297.00	\$2761.00

- ① Create appropriate option product number and determine size requirements from options table in section 4 below. Specify breaker type, poles and ampacity in addition to option product number when ordering.
- ② Subfeed horizontally mounted. Subfeed breaker types cannot be combined in the same panel.
- 3 HID, HACR, & SWD rated.
- ¶ 15 and 20 ampere breakers are SWD rated for fluorescent lighting applications.
- © The sum of double branch breakers mounted opposite each other cannot exceed 150 amperes.
- © 120/240Vac, factory installed only.

3. Choose Controller

Remote Controller, Options and Accessories

Description	Product Number Option Suffix	Panel Sizing Adder	List Price Adder, GO-101
Internal Controller	MR	9	\$4751.00
Internal Controller with Ethernet Option	MR	9	\$5418.00
External Controller	MX①		\$4751.00
External Controller with Ethernet Option	MX①	_	\$5418.00
External Controller Connection Cable - 5 Feet	_	_	\$139.00
External Controller Connection Cable - 10 Feet	_	_	\$209.00
External Controller Connection Cable - 15 Feet	_	_	\$290.00
External Controller Connection Cable - 20 Feet	_	_	\$342.00
External Controller Connection Cable - 25 Feet	_	_	\$402.00

① External controller requires external controller connection cable.

4. Add Panel Options

Interior Options

Option	Description	Catalog Number Option Suffix①	Panel Sizing Adder	List Price Adder, GO-101	Panel Sizing Adder	List Price Adder, GO-101	Panel Sizing Adder	List Price Adder, GO-101
	Compression Alum.	L1	N/A	\$30.00	_	\$50.00	_	\$130.00
Optional Lugs@	Pressure Copper	L2	N/A	\$49.00	_	\$49.00	_	\$92.00
Optional Lugs®	Comp. Alum. Oversize	L3	N/A	\$152.00	_	\$152.00	_	\$461.00
	Pressure Alum. Oversize	L4	N/A	\$54.00	-	\$54.00	_	\$330.00
Subfeed Breakers	3 Poles TED, SE	E3	N/A	Price From Panel	6	Price From Panel	6	Price From
(Select Only One)	2 or 3 Poles SF	F1	N/A	Section	12	Section	18	Panel Section
Feed Thru	Feed Thru Lugs®	T1	3	\$164.00	3	\$164.00	3	\$286.00
	600 APSI Alum	B1	-	\$595.00	-	\$595.00	_	\$759.00
Busbar	750 APSI Alum.	B2	_	\$135.00	_	\$135.00	_	Std.
	1000 APS Copper®	B4	-	\$210.00	-	\$210.00	_	\$323.00
200% Rated Neutrals	2 Standard Lugs	N2	_	\$60.00	_	\$100.00	_	\$140.00

① Option Catalog Number prefix is "AX."

② Oversize lugs available on single main lug panels only.

 $[\]ensuremath{\mathfrak{D}}$ Feed thru lugs not available on subfeed or oversized main lug panels.

 $[\]ensuremath{\textcircled{4}}$ For silver or tin plating 1000 APSI Cu only add \$100 List, GO-101.

TVSS Transient Voltage Surge Suppression®

Maximum Surge Current per Mode	Maximum Surge Current per Phase	Description	List Price GO-101
65kA	130kA	TVSS UL1449,UL1283	\$6350.00
80kA	160kA	TVSS UL1449,UL1283	\$7000.00
100kA	200kA	TVSS UL1449,UL1283	\$8500.00
100kA	200kA	TVSS UL1449, no counter	\$2875.00
100kA	200kA	TVSS UL1449	\$3575.00

 $[\]odot$ For factory installed transient voltage surge suppression (TVSS) units in 10" module, add T6 suffix to interior catalog number and 10" to box height.

Enclosures

Sizing Dimensions	Box Catalog	Inside	Front Catalog		
(Inches)	Number	Length	Width	Depth	Number
28.5-31.5	AB31	31.5	20	5.81	AF31F,S
34.5-37.5	AB37	37.5	20	5.81	AF37F,S
40.5-43.5	AB43	43.5	20	5.81	AF43F,S
46.5-49.5	AB49	49.5	20	5.81	AF49F,S
52.5-55.5	AB55	55.5	20	5.81	AF55F,S
57.5-64.5	AB64	64.5	20	5.81	AF64F,S
67.5-76.5	AB76	76.5	20	5.81	AF76F,S

Flush fronts are 1.5 inches larger than box. Surface fronts are .25 inches larger than box.

Front Options

Description	Catalog Number ①	List Price, GO-101
Screw cover	С	\$61.00
Front hinged to box	D	\$110.00
Optional Lock: Yale 511S w/ Rosette	Y	\$300.00
Optional Lock: Corbin 15767	L	\$146.00
Door within a door@	Р	\$238.00
Stainless steel®	S	\$1467.00
30" wide	W	\$82.00
Screw on nameplate	U	\$74.00
Metal directory	М	\$50.00

- ① Add to base box catalog number.
- ② Consists of two lockable doors one over panel interior and one over box wiring gutters. Yale locks not available.
- ③ Flush only. Available with C and N options.

Box Options

The second second		
Description	Catalog Number Suffix ①	List Price, GO-101
Blank Endwalls	В	2
Painted Box	Р	\$200.00
30" Wide 3	W	\$250.00
NEMA 3R/12	3	\$950.00
NEMA 4X (Stainless Steel)	4S	\$4950.00
Endwall with Knockouts	К	2

- ① Add to base box product number.
- ② No charge if included on original order.
- ③ Includes field installable gutter barrier.

5. Add External Accessories

A-Series Lighting Control Panel Accessories

Item	Description	Catalog Number	List Price GO-134B
Handheld Programmer	Customer interface with LCD screen	ASRGLCHPK	\$1680.00
Daylight Optimization Module	Performs sunlight harvesting by measuring the amount of light and providing a control signal to a dimming mechanism to maintain a preset lighting level.	ASRGLCDOK	\$2000.00
Remote Switch Expansion Module	Provides additional 16 digital input signals to the controller for each module.	ASRGLCDSK	\$1238.00
Control Wiring Insulation Tubing	Requirement, per UL 67 and NEC 725.55, that low voltage Class 2 & 3 control wiring be separated with tubing having an insulation rating equal to branch load wiring.	ASRGLCCWT	\$25.00



Hand-Held Programmer



Daylight Optimization Module



Remote Switch Module

Remote Operated Circuit Breaker



It's just one part of a more productive solution – only from GE

As part of a GE integrated switchboard, the A-Series Lighting Control Panel gives you even more of what you need.

The integrated switchboard packs all your power requirements into a single integrated system that turns non-productive mechanical space into revenue-generating sales or storage areas. And it arrives fully pre-wired to your specifications. All you have to do is set it in place, run the incoming power and wire out the branches. Installation takes less than half the time.

Still, you sacrifice nothing in terms of safety, performance or flexibility. Units expand or contract to meet specific needs. They reflect GE's rigorous quality standards, and they are built and tested in accordance with NEMA PB-2, UL 891 and the NEC. All sections and devices are UL Listed and UL Labeled.

The service is part of the solution

1-888-GE RESOLve

1-888-437-3765
This post-sales service call center gives you fast, reliable responses to warranty issues, field service requests, troubleshooting, installation/start-up questions and product returns.

1-888-GE-4SERV

1-888-434-7378
The GE Installations and Field Service network responds to all your system design, project and site management, installation, start-up and training needs.

1-877-LTG-CNTL

1-877-584-2685
For best-in-class design assistance, call this number and press option 2. That will connect you to the most experienced lighting control application group in the industry.

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