

TeSys Deca Manual Starter and Protector, magnetic circuit protector, rotary handle, 40 A, EverLink BTR connectors

GV3L40

Product availability: Stock - Normally stocked in distribution facility

## Main

Range	TeSys Deca
Product name	TeSys GV3
Product or Component Type	Motor circuit breaker
Device short name	GV3L
Device Application	Motor protection
Trip unit technology	Magnetic

# Complementary

Poles description	3P
Network type	AC
Utilisation category	Category A IEC 60947-2 AC-3 IEC 60947-4-1
	AC-3 IEC 00347-4-1
Network frequency	50/60 Hz IEC 60947-2
Motor power kW	18.5 kW 400/415 V AC 50/60 Hz
	22 kW 500 V AC 50/60 Hz
	37 kW 690 V AC 50/60 Hz
Breaking capacity	100 kA lcu 230/240 V AC 50/60 Hz
	50 kA Icu 400/415 V AC 50/60 Hz
	50 kA Icu 440 V AC 50/60 Hz
	12 kA Icu 500 V AC 50/60 Hz
	6 kA Icu 690 V AC 50/60 Hz
[lcs] rated service short-circuit	100 % 230/240 V AC 50/60 Hz
breaking capacity	100 % 400/415 V AC 50/60 Hz
	100 % 440 V AC 50/60 Hz
	50 % 500 V AC 50/60 Hz
	50 % 690 V AC 50/60 Hz
Control Type	Rotary handle
Line Rated Current	40 A
Magnetic tripping current	560 A
[Ith] conventional free air thermal current	40 A IEC 60947-2
[Ue] rated operational voltage	690 V AC 50/60 Hz IEC 60947-2
[Ui] rated insulation voltage	690 V AC 50/60 Hz IEC 60947-2
[Uimp] rated impulse withstand voltage	6 kV IEC 60947-2
Suitability for isolation	Yes IEC 60947-1
Power dissipation per pole	8 W

Price is "List Price" and may be subject to a trade discount – check with your local distributor or retailer for actual price.

Mechanical durability	50000 cycles
Electrical durability	50000 cycles AC-3 415 V In
Tightening torque	44.3 lbf.in (5 N.m) screw clamp terminal
Fixing mode	35 mm symmetrical DIN rail clipped Panel screwed with 3 x M4 screws)
Mounting position	Horizontal Vertical
Width	2.2 in (55 mm)
Height	5.2 in (132 mm)
Depth	5.4 in (136 mm)
Product Weight	2.12 lb(US) (0.96 kg)
color	Dark grey

# **Environment**

Standards	EN/IEC 60947-2 EN/IEC 60947-4-1 UL 60947-4-1 CSA C22.2 No 60947-4-1 IEC/EN 60335-1:Clause 30.2 IEC/EN 60335-2-40:Annex JJ
Product Certifications	CCC UL CSA EAC LROS (Lloyds register of shipping) BV ABS DNV-GL UKCA
IP degree of protection	IP20 IEC 60529
Climatic withstand	IACS E10
Ambient Air Temperature for Storage	-40176 °F (-4080 °C)
Fire resistance	1760 °F (960 °C) IEC 60695-2-11
Ambient air temperature for operation	-4140 °F (-2060 °C)
Mechanical robustness	Shocks 15 Gn for 11 ms contactor open Shocks 30 Gn for 11 ms contactor closed Vibrations 4 Gn, 5300 Hz
Operating altitude	9842.52 ft (3000 m)

# Ordering and shipping details

Category	US10I1122366
Discount Schedule	0111
GTIN	3389119405447
Returnability	Yes
Country of origin	FR

# **Packing Units**

Unit Type of Package 1	PCE
Nbr. of units in pkg.	1
Package 1 Height	6.30 in (16.000 cm)

Package 1 Width	2.56 in (6.500 cm)
Package 1 Length	5.71 in (14.500 cm)
Package weight(Lbs)	34.392 oz (975.000 g)
Unit Type of Package 2	P06
Number of Units in Package 2	120
Package 2 Height	29.53 in (75.000 cm)
Package 2 Width	23.62 in (60.000 cm)
Package 2 Length	31.50 in (80.000 cm)
Package 2 Weight	286.601 lb(US) (130.000 kg)

# **Contractual warranty**

Warranty 18 months



Schneider Electric aims to achieve Net Zero status by 2050 through supply chain partnerships, lower impact materials, and circularity via our ongoing "Use Better, Use Longer, Use Again" campaign to extend product lifetimes and recyclability.

#### Environmental Data explained >

How we assess product sustainability >

☑ Environmental footprint	
Carbon footprint (kg CO2 eq, Total Life cycle)	30
Environmental Disclosure	Product Environmental Profile

## **Use Better**

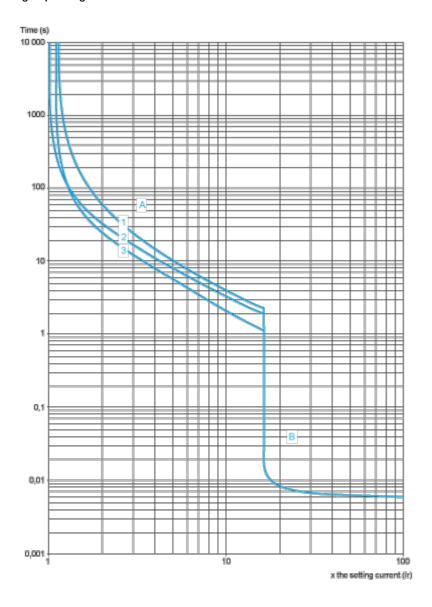
<b>⊗</b> Materials and Substances	
Packaging made with recycled cardboard	Yes
Packaging without single use plastic	No
EU RoHS Directive	Compliant with Exemptions
SCIP Number	2057c252-f956-4ac1-a3d9-75119bc8a000
REACh Regulation	REACh Declaration
California proposition 65	WARNING: This product can expose you to chemicals including: Antimony oxide & Antimony trioxide, which is known to the State of California to cause cancer. For more information go to www.P65Warnings.ca.gov

#### **Use Again**

○ Repack and remanufacture	
Circularity Profile	End of Life Information
Take-back	No
WEEE Label	The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins.

## Performance Curves

# Tripping Curves for GV3L Combined with Thermal Overload Relay LRD33 Average Operating time at 20 °C without Prior Current Flow

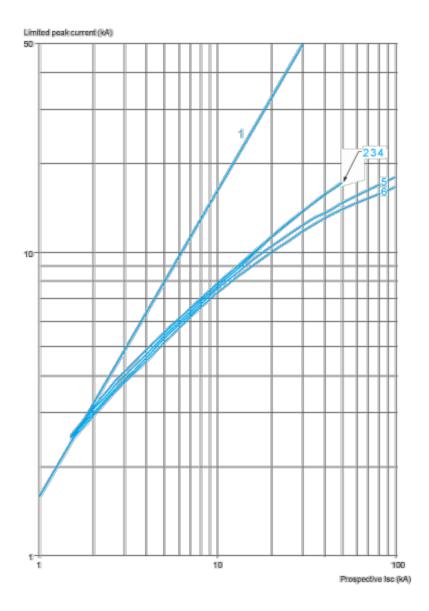


- 1 3 poles from cold state
- 2 2 poles from cold state
- 3 3 poles from hot state
- A Thermal overload relay protection zone
- B GV3L protection zone

# Current Limitation on Short-Circuit for GV3L (3-Phase 400/415 V)

#### **Dynamic Stress**

I peak = f (prospective lsc) at 1.05 Ue = 435 V

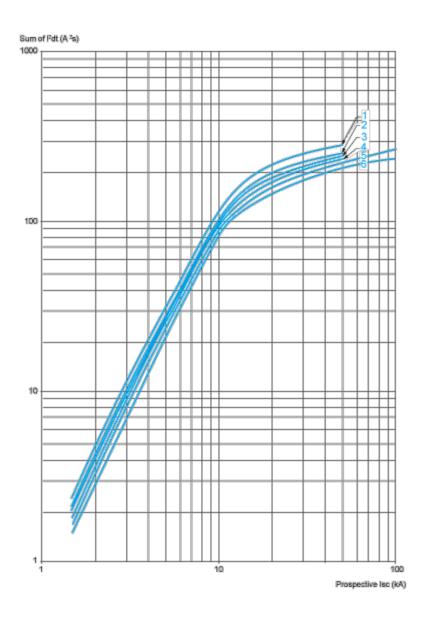


- 1 Maximum peak current
- 2 GV3L80 GV3L73 GV3L65
- 3 GV3L50
- 4 GV3L40
- 5 GV3L32
- 6 GV3L25

## Thermal Limit on Short-Circuit for GV3L

# Thermal Limit in A<sup>2</sup>s

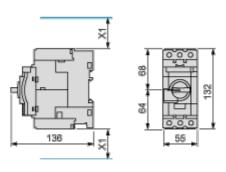
Sum of  $I^2$ dt = f (prospective Isc) at 1.05 Ue = 435 V

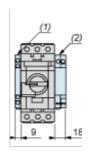


- 1 GV3L73 GV3L80
- 2 GV3L65
- 3 GV3L50
- 4 GV3L40
- 5 GV3L32
- 6 GV3L25

#### **Dimensions Drawings**

## GV3L, GV3P Dimensions



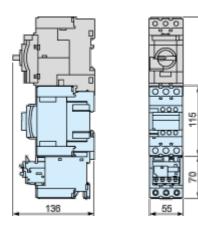


- (1) Blocks  $\text{GVAN}_{\bullet \bullet}$ ,  $\text{GVAD}_{\bullet \bullet}$  and GVAM11.
- (2) Blocks GV3AU and GV3AS and GV3AS.

X1 = Electrical clearance (ISC max) 40 mm for Ue ≤ 500 V, 50 mm for Ue ≤ 690 V

**NOTE:** Leave a space of 9 mm between 2 circuit breakers: either an empty space or side-mounting add-on contact blocks. Side by side mounting is possible up to 40 °C.

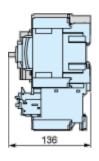
Mounting with Tesys contactor LC1D40A...D80A and relay LR3D313...380 (1)(2)(3)

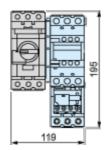


- (1) Mountings with c.b. up to GV3L73, GV3P73.
- (2) For GV3L80, GV3P80 use cable between components for dissipating heat. Consult online datasheets for values.
- (3) S-shape busbar system suitable up to 73 A.

Side by side mounting with Tesys contactor LC1D40A...D73A (S-shape busbar system GV3S<sup>(1)</sup>)

# **GV3L40**



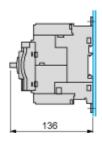


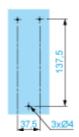
(1) Mountings with c.b. up to GV3L73, GV3P73.

#### Mounting on Rail AM1 DE200 or AM1 ED201

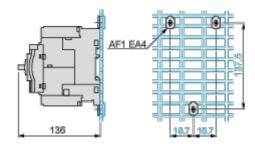


#### Panel Mounting, using M4 Screws

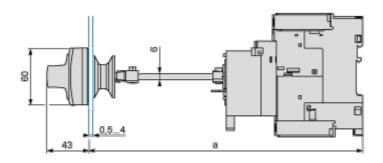




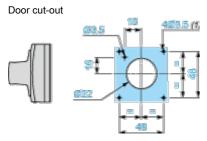
#### Mounting on Pre-Slotted Plate AM1 PA



# Mounting of External Operator GV3APN01, GV3APN02 or GV3APN04 for Motor Circuit Breakers GV3L

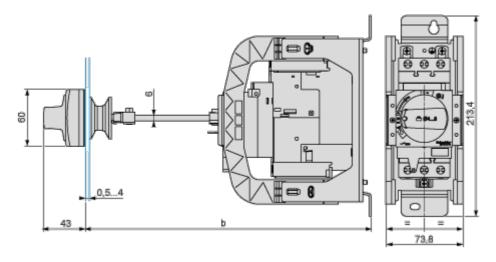




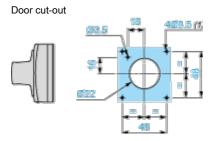


(1) For IP65 only.

# Mounting of External Operator GVAPH03 for Motor Circuit Breakers GV3L



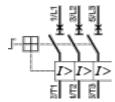
	b	
	Minimum	Maximum
GV3APN•• + GVAPH03	200	300
GV3APN•• + GVAPH03 + GVAPK12	300	492



(1) For IP65 only.

# Connections and Schema

GV3L••



# Offer Marketing Illustration

#### **Product benefits / Features**



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#### **Product benefits / Features**



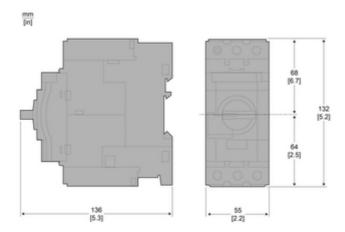
# Offer Marketing Illustration

#### Product benefits / Features



# **Technical Illustration**

# Assembly's dimensions



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