

Product data sheet

Specifications



TeSys GV7 Manual Starter and Protector, thermal magnetic circuit protector, rocker lever, 3 P, AC-3, 132...220 A

GV7RE220

❗ Discontinued

❗ Discontinued on: Jan 23, 2021

Product availability: Non-Stock - Not normally stocked in distribution facility

Main

Range	TeSys
Product Name	TeSys GV7
Product Or Component Type	Circuit breaker
Device Short Name	GV7R
Device Application	Motor
Poles Description	3P
Network Type	AC
Utilisation Category	AC-3 IEC 60947-4-1
Network Frequency	50/60 Hz IEC 60947-4-1
Breaking Capacity	35 kA Icu 440 V AC 50/60 Hz IEC 60947-2 85 kA Icu 220/240 V AC 50/60 Hz IEC 60947-2 35 kA Icu 380/415 V AC 50/60 Hz IEC 60947-2 25 kA Icu 500 V AC 50/60 Hz IEC 60947-2 8 kA Icu 660/690 V AC 50/60 Hz IEC 60947-2
[Ics] Rated Service Short-Circuit Breaking Capacity	100 % 440 V AC 50/60 Hz IEC 60947-2 100 % 220/240 V AC 50/60 Hz IEC 60947-2 100 % 380/415 V AC 50/60 Hz IEC 60947-2 50 % 500 V AC 50/60 Hz IEC 60947-2 50 % 660/690 V AC 50/60 Hz IEC 60947-2
Thermal Protection Adjustment Range	132...220 A
Trip Unit Technology	Thermal-magnetic

Complementary

Mounting Mode	By screws By clips
Mounting Support	Panel mounting Rail Kit for fixing the switchgear Flush
Mounting Position	Vertical
Motor Power Kw	110 kW 400...415 V AC 50/60 Hz 110 kW 500 V AC 50/60 Hz 132 kW 500 V AC 50/60 Hz 160 kW 500 V AC 50/60 Hz 160 kW 660...690 V AC 50/60 Hz 200 kW 660...690 V AC 50/60 Hz 90 kW 400...415 V AC 50/60 Hz

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

Disclaimer: This documentation is not intended as a substitute for and is not to be used for determining suitability or reliability of these products for specific user applications

Control Type	Rocker lever
[Ue] Rated Operational Voltage	690 V AC 50/60 Hz IEC 60947-2
[Ui] Rated Insulation Voltage	750 V AC 50/60 Hz IEC 60947-2
[Ith] Conventional Free Air Thermal Current	220 A IEC 60947-4-1
[Uimp] Rated Impulse Withstand Voltage	8 kV IEC 60947-2
Power Dissipation Per Pole	14.5 W
Power Dissipation Per Pole	14.5 W
Mechanical Durability	20000 cycles
Electrical Durability	10000 cycles AC-3 440 V In 20000 cycles AC-3 440 V In/2
Maximum Operating Rate	25 cyc/h
Rated Duty	Continuous IEC 60947-4-1
Connection Pitch	1.38 in (35 mm) without spreaders 1.77 in (45 mm) with spreaders
Connections - Terminals	Bars Cable with lug - external diameter: 0.39 in (10 mm) Screw Bare cable connectors 0.00...0.29 in² (1.5...185 mm²)
Tightening Torque	88.51 lbf.in (10 N.m) screw M6 132.76 lbf.in (15 N.m) bare cable connectors 0.00...0.29 in² (1.5...185 mm²)
Mechanical Robustness	Shocks 15 Gn for 11 ms IEC 60068-2-27 Vibrations 2.5 Gn, 0...25 Hz IEC 60068-2-6
Suitability For Isolation	Yes IEC 60947-1
Phase Failure Sensitivity	Yes IEC 60947-4-1 § 7-2-1-5-2
Height	6.34 in (161 mm)
Width	4.13 in (105 mm)
Depth	4.96 in (126 mm)
Net Weight	5.18 lb(US) (2.35 kg)

Environment

Standards	VDE 0113 EN/IEC 60947-4-1 VDE 0660 EN/IEC 60947-1 NF C 63-120 EN/IEC 60947-2 NF C 79-130 NF C 63-650
Product Certifications	DNV UL
Protective Treatment	TC
Ip Degree Of Protection	IP405 IEC 60529 with terminal shrouds)
Pollution Degree	3
Ambient Air Temperature For Operation	-13...158 °F (-25...70 °C)
Ambient Air Temperature For Storage	-67...203 °F (-55...95 °C)
Fire Resistance	1760 °F (960 °C) IEC 60695-2-1
Operating Altitude	6561.68 ft (2000 m)

Ordering and shipping details

Category	US10I1122366
Discount Schedule	0I11
Gtin	3389110566888
Returnability	No
Country Of Origin	CN

Packing Units

Unit Type Of Package 1	PCE
Number Of Units In Package 1	1
Package 1 Height	4.57 in (11.6 cm)
Package 1 Width	5.51 in (14 cm)
Package 1 Length	6.93 in (17.6 cm)
Package 1 Weight	4.59 lb(US) (2.08 kg)

Contractual warranty

Warranty	18 months
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Sustainability

Green Premium™ label is Schneider Electric's commitment to delivering products with best-in-class environmental performance. Green Premium promises compliance with the latest regulations, transparency on environmental impacts, as well as circular and low-CO₂ products.

Guide to assessing product sustainability is a white paper that clarifies global eco-label standards and how to interpret environmental declarations.

[Learn more about Green Premium >](#)

[Guide to assess a product's sustainability >](#)



Transparency

Eu Rohs Directive

Not applicable, out of EU RoHS legal scope

Environmental Disclosure

[Product Environmental Profile](#)

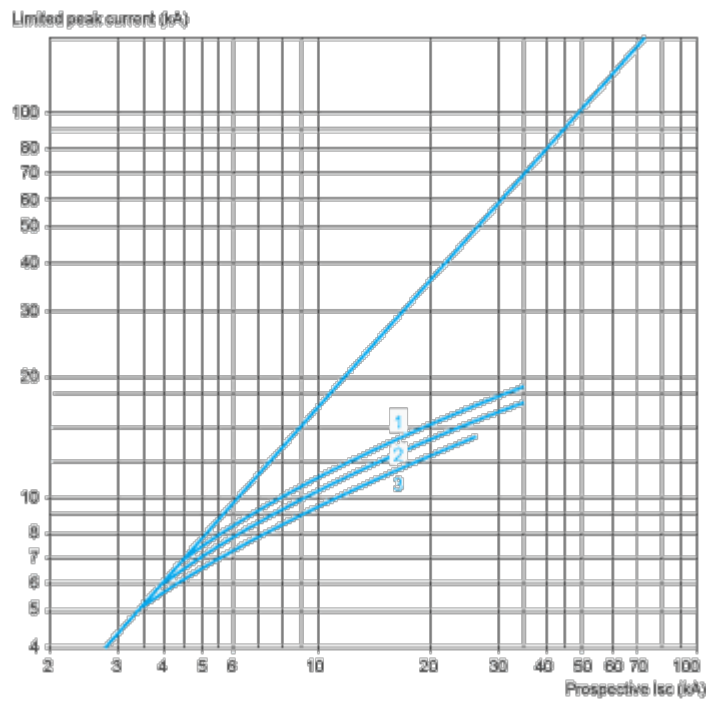
Performance Curves

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

Dynamic Stress

$I_{peak} = f(\text{prospective } I_{sc})$

For GV7RE only



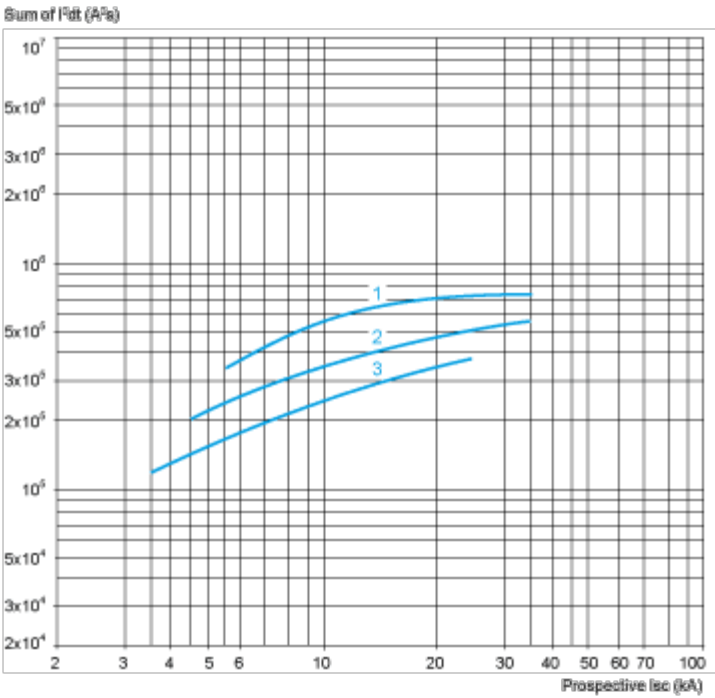
- 1 GV7RE220
- 2 GV7RE150
- 3 GV7RE100

Thermal Limit (3-Phase 400/415 V)

Thermal Limit

$\text{Sum of } I^2 dt = f(\text{prospective } I_{sc})$

For GV7RE only



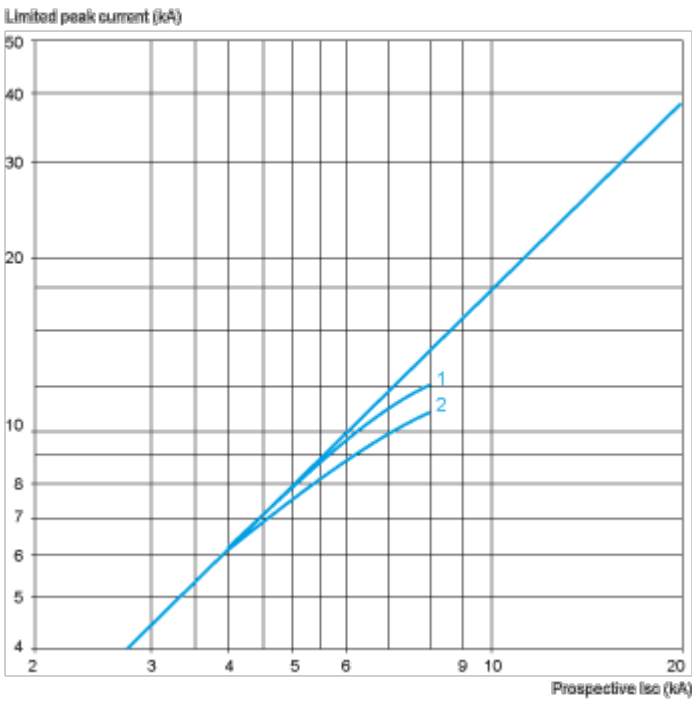
- 1 GV7RE220
- 2 GV7RE150
- 3 GV7RE100

Current Limitation on Short-Circuit (3-Phase 690 V)

Dynamic Stress

I_{peak} = f (prospective I_{sc})

For GV7RE only



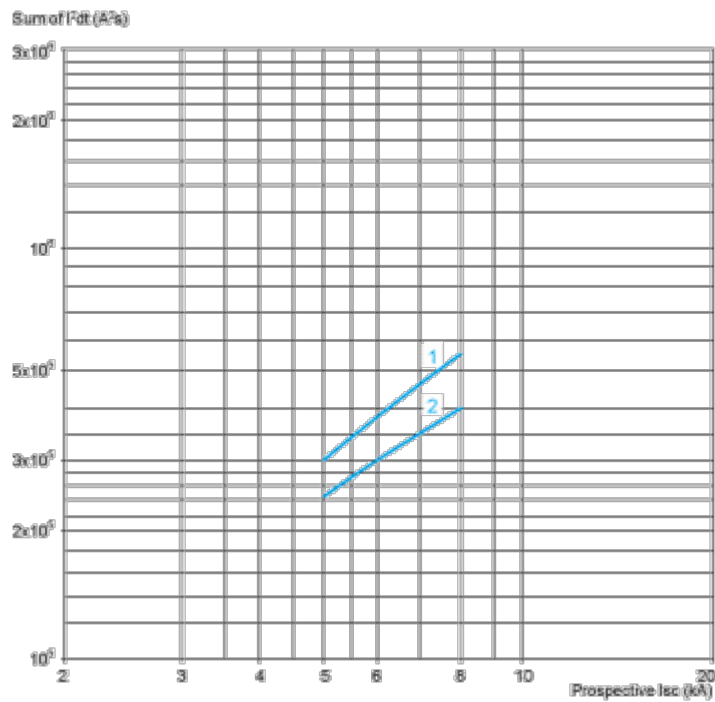
- 1 GV7RE220
- 2 GV7RE150 and GV7RE100

Thermal Limit on Short-Circuit (3-Phase 690 V)

Thermal Limit

Sum of $I^2dt = f$ (prospective Isc)

For GV7RE only

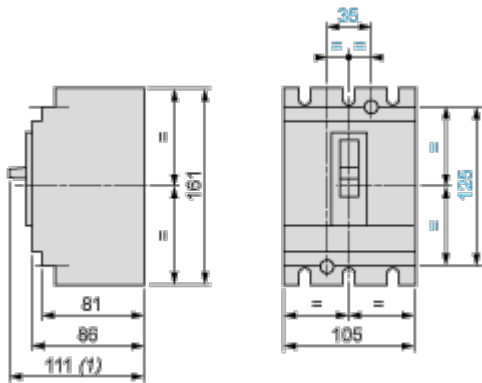


- 1 GV7RE220
- 2 GV7RE150 and GV7RE100

Dimensions Drawings

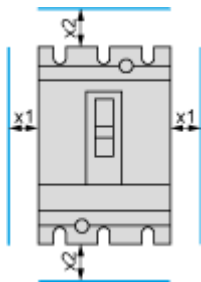
GV7R

Dimensions



(1) 126 for GV7R₂₂₀.

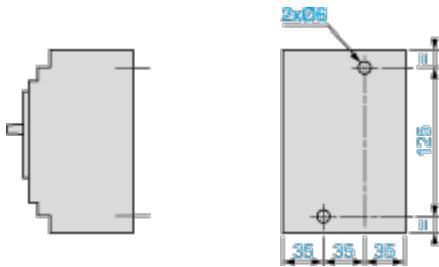
Minimum Electrical Clearance



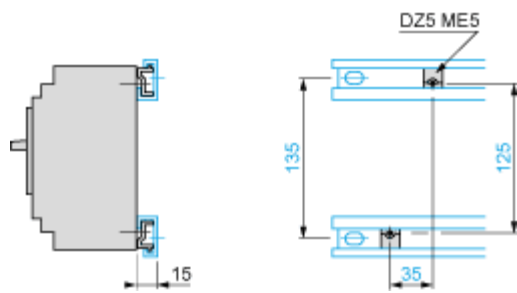
		x1	x2
Painted or insulated metal plate, insulation or insulated bar		0	30
Bare metal plate	$U \leq 440\text{ V}$	5	35
	$440\text{ V} < U < 600\text{ V}$	10	35
	$U \geq 600\text{ V}$	20	35

GV7R

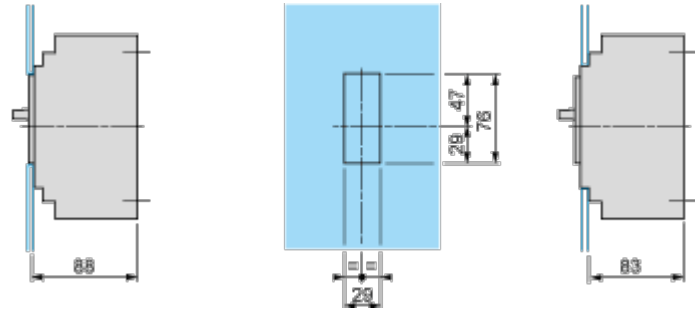
Panel Mounting



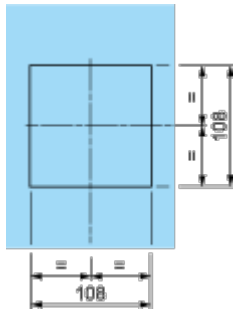
Mounting on 2 Mounting Rails DZ5 MB201



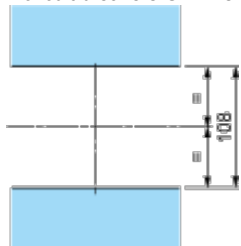
Flush-Mounting



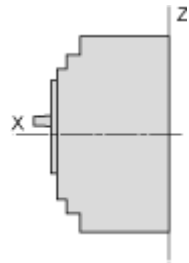
1 circuit breaker GV7R



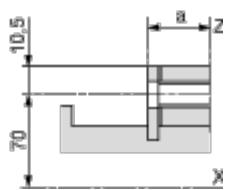
n circuit breakers GV7R side by side



Connection

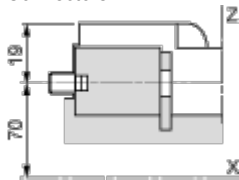


Smooth terminals



	a
GV7R _• 40...R _• 150	19.5
GV7R _• 220	21.5

Connectors



Connections and Schema

Motor Circuit Breakers
GV7 R

