## DATASHEET - FAZ-Z6/2

Miniature circuit breaker (MCB), 6 A, 2p, characteristic: Z





Part no. FAZ-Z6/2 Catalog No. 278822 Alternate Catalog FAZ-Z6/2 No. EL-Nummer 1695267 (Norway)

Similar to illustration

#### **Delivery program**

Basic function			Miniature circuit-breakers
Number of poles			2 pole
Tripping characteristic			Z
Application			Switchgear for industrial and advanced commercial applications
Rated current	In	А	6
Rated switching capacity acc. to IEC/EN 60947-2	l <sub>cu</sub>	kA	10
Product range			FAZ

# Technical data

Rad operational voltage   Ue   Ve   Ve/CPR 000000000000000000000000000000000000	Electrical			
Image: state	Standards			
Number of the sector of the	Rated operational voltage	Ue	V	
Ated switching capacity act. to EC/EN 60947-2Fund		Ue	V AC	240/415
Operational switching capacity   KA   5     Operational switching capacity   S, D, K, S, Z     Max. back-up fuse   5     Selectivity Class   S     Lifespan   Verations   S     Direction of incoming supply   Verations   sequired     Mechanical   Verations   sequired     Modername   sequired   sequired     Mounting supply   Verations   S     Mounting width per pole   Image: Sequence of Protection   S     Terminal protection   Image: Sequence of Protection   S     Terminal protection   Image: Sequence of Sequen			V DC	60 (per pole)
Characteristic   6,0, K, S, Z     Max, back-up fuse   8,0, K, S, Z     Max, back-up fuse   5     Selectivity Class   3     Lifespan   Operations     Direction of incoming supply   Operations     Machard ford idmension   Operations     Enclosure height   mm     Mounting width per pole   mm     Data of Protection   mm     Terminal capacities   mm </td <td>Rated switching capacity acc. to IEC/EN 60947-2</td> <td>l<sub>cu</sub></td> <td>kA</td> <td>10</td>	Rated switching capacity acc. to IEC/EN 60947-2	l <sub>cu</sub>	kA	10
Max.back-up fuse   A gL/g6   25     Selectivity Class   A gL/g6   26     Lifespan   Operations   30000     Lifespan   Selectivity Class   as required     Bornetion of incoming supply   as required   30000     Mothanical   max   50     Exclosure height   max   50   3000     Mounting width per pole   max   50   3000     Mounting width per pole   max   50   3000     Digree of Protection   max   15.0   3000     Terminal stop and bottom   max   16.2	Operational switching capacity		kA	7.5
Selectivity Class     Parations     Paratical	Characteristic			B, C, D, K, S, Z
Idepan Yerations Idepantions > 0000   Direction of incoming supply as required   Mechanical sequired   Standard front dimension mm \$ 4000   Bounting width perpole mm \$ 0   Mounting mm \$ 15   Borger of Protection mm \$ 1000/   Terminal stop and bottom mm \$ 1000/   Terminal capacities mm \$ 1000/   Terminal capacities mm \$ 1000/   It component stop	Max. back-up fuse		A gL/gG	125
Lifespan Operations > 1000   Direction of incoming supply a required   Mechanical  sequired   Standard front dimension Image: Marcel Standard front dimension Mounting   Mounting width per pole Image: Marcel Standard front dimension Mounting   Degree of Protection Image: Marcel Standard front dimension Image: Marcel Standard front dimension   Terminals top and bottom Image: Marcel Standard front dimension Image: Marcel Standard front dimension   Terminal capacities Image: Marcel Standard front dimension Image: Marcel Standard front dimension   Terminal capacities Image: Marcel Standard front dimension Image: Marcel Standard front dimension   Terminal capacities Image: Marcel Standard front dimension Image: Marcel Standard front dimension   Terminal capacities Image: Marcel Standard front dimension Image: Marcel Standard front dimension   Terminal capacities Image: Marcel Standard front dimension Image: Marcel Standard front dimension   Terminal capacities Image: Marcel Standard front dimension Image: Marcel Standard front dimension   Terminal capacities Image: Marcel Standard front dimension Image: Marcel Standard front dimension   Terminal capacities Image: Marcel Standard front dimension Image: Marcel Standard front dimension   Terminal capa	Selectivity Class			3
Direction of incoming supply     Image     Image <th< td=""><td>lifespan</td><td></td><td></td><td></td></th<>	lifespan			
Mechanical     mm     45       Standar front dimension     mm     6     mm     6     mm     6     mm     6     6     mm     7.5     6	Lifespan	Operations		> 10000
Standard front dimension   mm   45     Enclosure height   mm   80     Mounting width per pole   mm   17.5     Mounting   EC/FN 60715 top-hat rail   120.1P40 (when fitted)     Degree of Protection   Freminals top and bottom   Freminals top and bottom   Freminal capacities     Terminal capacities   mm   120.1P40 (when fitted)   Finger and back-of-hand proof to BGV A2     Terminal capacities   mm <sup>2</sup> 125   Finger and back-of-hand proof to BGV A2     Terminal capacities   mm <sup>2</sup> 125   Finger and back-of-hand proof to BGV A2     Terminal capacities   mm <sup>2</sup> 120.1P40   Finger and back-of-hand proof to BGV A2     Terminal capacities   mm <sup>2</sup> 125   Finger and back-of-hand proof to BGV A2     Terminal capacities   mm <sup>2</sup> 120.1P40   Finger and back-of-hand proof to BGV A2     Terminal capacities   mm <sup>2</sup> 120.1P40   Finger and back-of-hand proof to BGV A2     Terminal capacities   mm <sup>2</sup> 120.1P40   Finger and back-of-hand proof to BGV A2     Terminal capacities   mm <sup>2</sup> 120.1P40   Finger and back-of-hand proof to BGV A2     Terminal capacities   mm <sup>2</sup> 120.1P40	Direction of incoming supply			as required
Enclosure height   mm   80     Mounting width per pole   mm   1.5     Mounting   IEC/EN 60715 top-hat rail   IEC/EN 60715 top-hat rail     Degree of Protection   Freminals top and bottom   Freminal capacities   Freminal capacities     Terminal capacities   mm <sup>2</sup> Imm <sup>2</sup> Imm <sup>2</sup> Thickness of busbar material   mm <sup>2</sup> Imm <sup>2</sup> Imm <sup>2</sup> Thickness of busbar material   Mm <sup>2</sup> Imm <sup>2</sup> Imm <sup>2</sup> Thickness of busbar material   Mm   Bath   Imm <sup>2</sup>	Mechanical			
Mounting width per pole   mm   1.5     Mounting   EC/EN 60715 top-hat rail     Degree of Protection   FP0, IP40 (when fitted)     Terminals top and bottom   FMM   Twin-purpose terminals     Terminal capacities   mm <sup>2</sup> Finger and back-of-hand proof to BGV A2     Terminal capacities   mm <sup>2</sup> 1×25     Terminal capacities   mm <sup>2</sup> 1×20     Terminal capacities   mm <sup>2</sup> 1×20     Terminal capacities   mm <sup>2</sup> 1×20     Terminal capacities   mm <sup>2</sup> 1×20 </td <td>Standard front dimension</td> <td></td> <td>mm</td> <td>45</td>	Standard front dimension		mm	45
Mounting   IC/EN 60715 top-hat rail     Degree of Protection   I20, IP40 (when fitted)     Terminals top and bottom   ICH     Terminal protection   ICH     Terminal capacities   Ima <sup>2</sup> Image: I	Enclosure height		mm	80
Degree of Protection   Feed   P20, IP40 (when fitted)     Terminals top and bottom   Fied   Fwin-purpose terminals     Terminal protection   Fied   Finger and back-of-hand proof to BGV A2     Terminal capacities   mm <sup>2</sup> 1×25     Immediate   mm <sup>2</sup> 1×25     Terminal capacities   mm <sup>2</sup> 1×25     Terminal capacities   mm <sup>2</sup> 1×10     Terminal capacities   mm <sup>2</sup> 1×25     Terminal capacities   mm <sup>2</sup> 1×10     Terminal capacities   mm <sup>2</sup>	Mounting width per pole		mm	17.5
Terminals top and bottom   Image: Sector S	Mounting			IEC/EN 60715 top-hat rail
Terminal protection Image: market of the second s	Degree of Protection			IP20, IP40 (when fitted)
Terminal capacities ma <sup>2</sup> Imm <sup>2</sup>	Terminals top and bottom			Twin-purpose terminals
Image: series of busbar material Image: series of busbar material	Terminal protection			Finger and back-of-hand proof to BGV A2
Image: Angle of the second se	Terminal capacities		mm <sup>2</sup>	
Thickness of busbar material mm 0.8 2			mm <sup>2</sup>	1 x 25
			mm <sup>2</sup>	2 x 10
Mounting position As required	Thickness of busbar material		mm	0.8 2
	Mounting position			As required

## Design verification as per IEC/EN 61439

Technical data for design verification			
Rated operational current for specified heat dissipation	In	А	6
Heat dissipation per pole, current-dependent	P <sub>vid</sub>	W	0
Equipment heat dissipation, current-dependent	P <sub>vid</sub>	W	5.6

Static heat dissipation, non-current-dependent	$P_{vs}$	W	0
Heat dissipation capacity	$P_{diss}$	W	0
Operating ambient temperature min.		°C	-40
Operating ambient temperature max.		°C	75
			linear, per +1 °C, results in a 0.5% reduction of current carrying capacity
IEC/EN 61439 design verification			
10.2 Strength of materials and parts			
10.2.2 Corrosion resistance			Meets the product standard's requirements.
10.2.3.1 Verification of thermal stability of enclosures			Meets the product standard's requirements.
10.2.3.2 Verification of resistance of insulating materials to normal heat			Meets the product standard's requirements.
10.2.3.3 Verification of resistance of insulating materials to abnormal heat and fire due to internal electric effects			Meets the product standard's requirements.
10.2.4 Resistance to ultra-violet (UV) radiation			Meets the product standard's requirements.
10.2.5 Lifting			Does not apply, since the entire switchgear needs to be evaluated.
10.2.6 Mechanical impact			Does not apply, since the entire switchgear needs to be evaluated.
10.2.7 Inscriptions			Meets the product standard's requirements.
10.3 Degree of protection of ASSEMBLIES			Does not apply, since the entire switchgear needs to be evaluated.
10.4 Clearances and creepage distances			Meets the product standard's requirements.
10.5 Protection against electric shock			Does not apply, since the entire switchgear needs to be evaluated.
10.6 Incorporation of switching devices and components			Does not apply, since the entire switchgear needs to be evaluated.
10.7 Internal electrical circuits and connections			Is the panel builder's responsibility.
10.8 Connections for external conductors			Is the panel builder's responsibility.
10.9 Insulation properties			
10.9.2 Power-frequency electric strength			Is the panel builder's responsibility.
10.9.3 Impulse withstand voltage			Is the panel builder's responsibility.
10.9.4 Testing of enclosures made of insulating material			Is the panel builder's responsibility.
10.10 Temperature rise			The panel builder is responsible for the temperature rise calculation. Eaton will provide heat dissipation data for the devices.
10.11 Short-circuit rating			Is the panel builder's responsibility. The specifications for the switchgear must be observed.
10.12 Electromagnetic compatibility			Is the panel builder's responsibility. The specifications for the switchgear must be observed.
10.13 Mechanical function			The device meets the requirements, provided the information in the instruction leaflet (IL) is observed.

#### **Technical data ETIM 7.0**

Circuit breakers and fuses (EG000020) / Miniature circuit breaker (MCB) (EC000042)

Electric engineering, automation, process control engineering / Electrical installation, device / Miniature circuit breaker system (MCB) / Miniature circuit breaker (MCB) (ecl@ss10.0.1-27-14-19-01 [AAB905014])

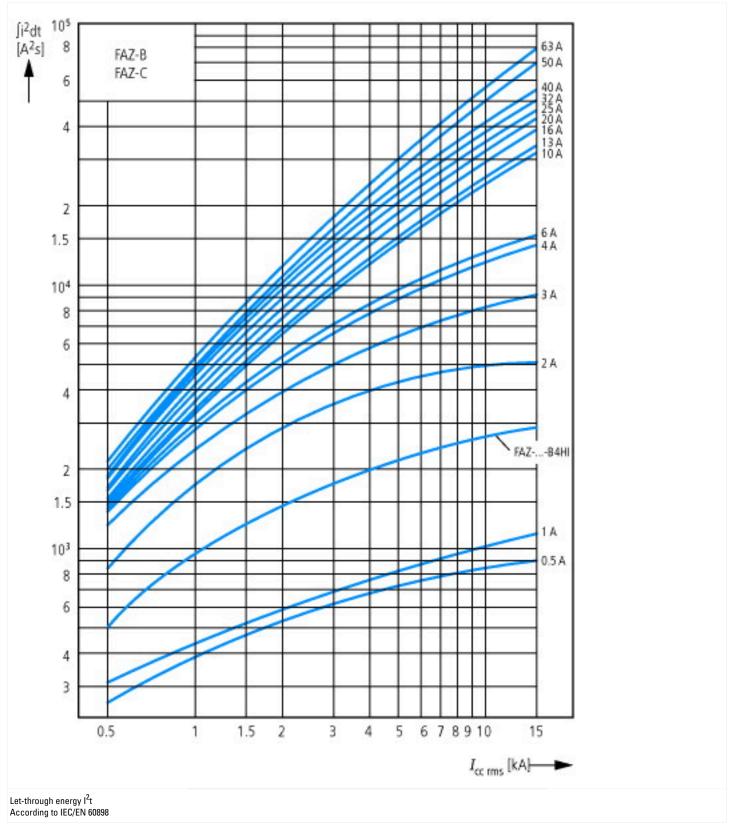
Release characteristic		Z
Number of poles (total)		2
Number of protected poles		2
Rated current	А	6
Rated voltage	V	400
Rated insulation voltage Ui	V	440
Rated impulse withstand voltage Uimp	kV	4
Rated short-circuit breaking capacity Icn EN 60898 at 230 V	kA	0
Rated short-circuit breaking capacity Icn EN 60898 at 400 V	kA	0
Rated short-circuit breaking capacity Icu IEC 60947-2 at 230 V	kA	10
Rated short-circuit breaking capacity Icu IEC 60947-2 at 400 V	kA	10
Voltage type		AC
Frequency	Hz	50 - 60
Current limiting class		3
Suitable for flush-mounted installation		No
Concurrently switching N-neutral		No
Over voltage category		3
Pollution degree		2

Additional equipment possible		Yes
Width in number of modular spacings		2
Built-in depth	mm	70.5
Degree of protection (IP)		IP20
Ambient temperature during operating	°C	-25 - 75
Connectable conductor cross section multi-wired	mm²	1 - 25
Connectable conductor cross section solid-core	mm²	1 - 25

## **Approvals**

Product Standards	IEC/EN 60947-2; IEC/EN 60898; EN 45545-2; IEC 61373; UL 1077; CSA-C22.2 No. 235; CE marking
UL File No.	E177451
UL Category Control No.	ΩVNU2, ΩVNU8
CSA File No.	204453
CSA Class No.	3215-30
North America Certification	UL recognized, CSA certified
Conditions of Acceptability	Supplementary Protector only
Suitable for	Branch Circuits; not as BCPD
Current Limiting Circuit-Breaker	No
Max. Voltage Rating	480Y/277 VAC; 96 VDC
Degree of Protection	IEC: IP20; UL/CSA Type: -

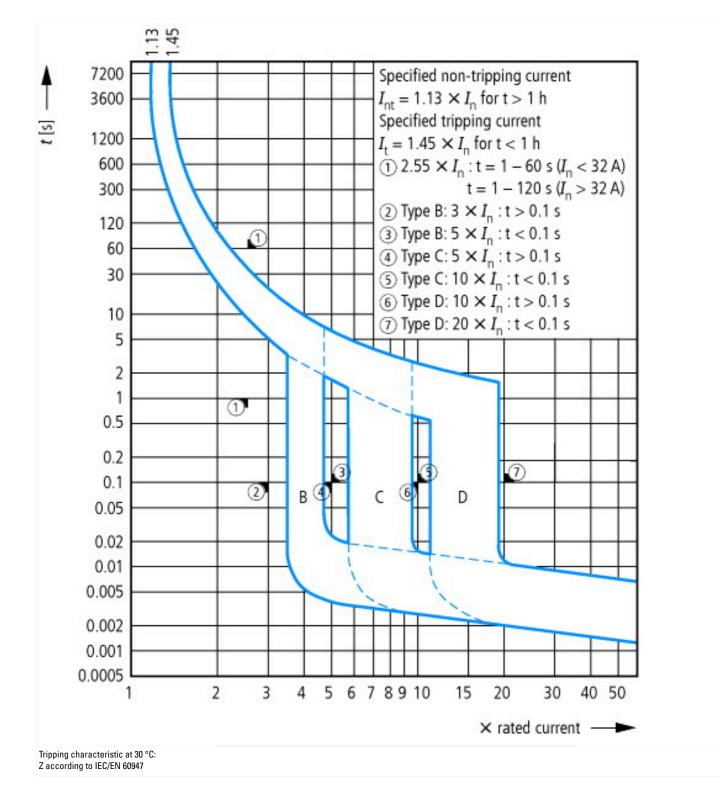
## **Characteristics**



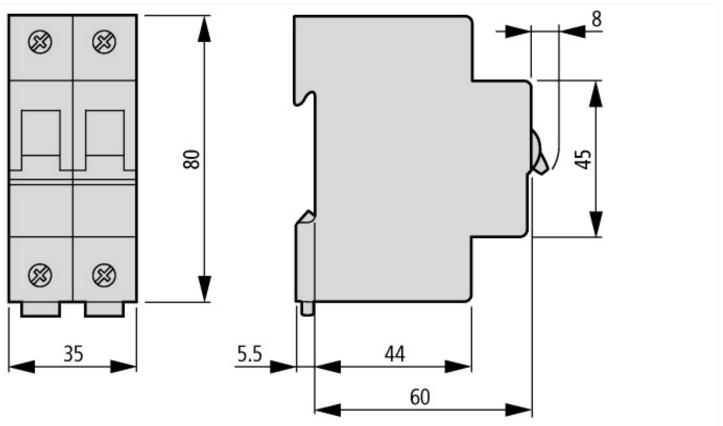








## **Dimensions**



## Additional product information (links)

Temperature dependency, derating

 $\label{eq:https://www.eaton.com/content/dam/eaton/technicaldocumentation/technical-data-tables/Derating table FAZ.pdf$