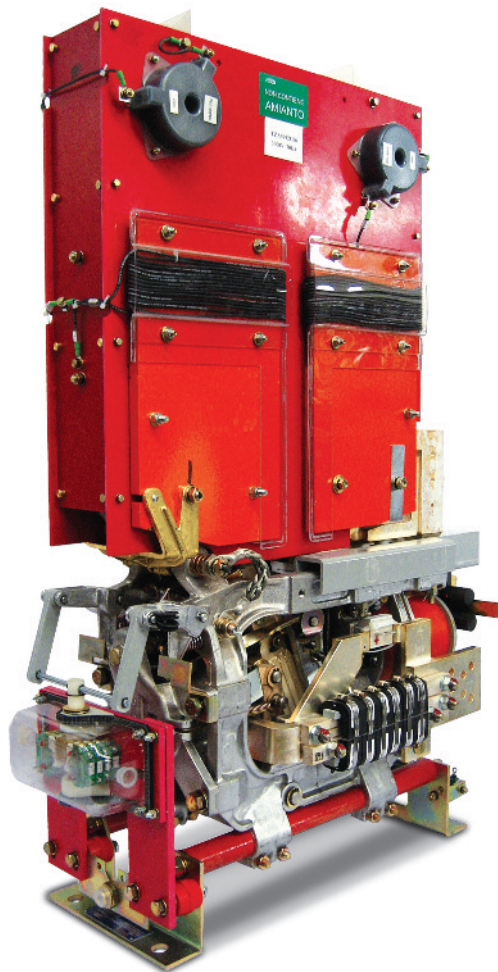


HSCBs

DC High Speed Circuit Breakers



IRA

Applications

DC Substations

Industry

Vehicles

The IRA Series is single pole, magnetic blow out, trip free, air circuit breakers.

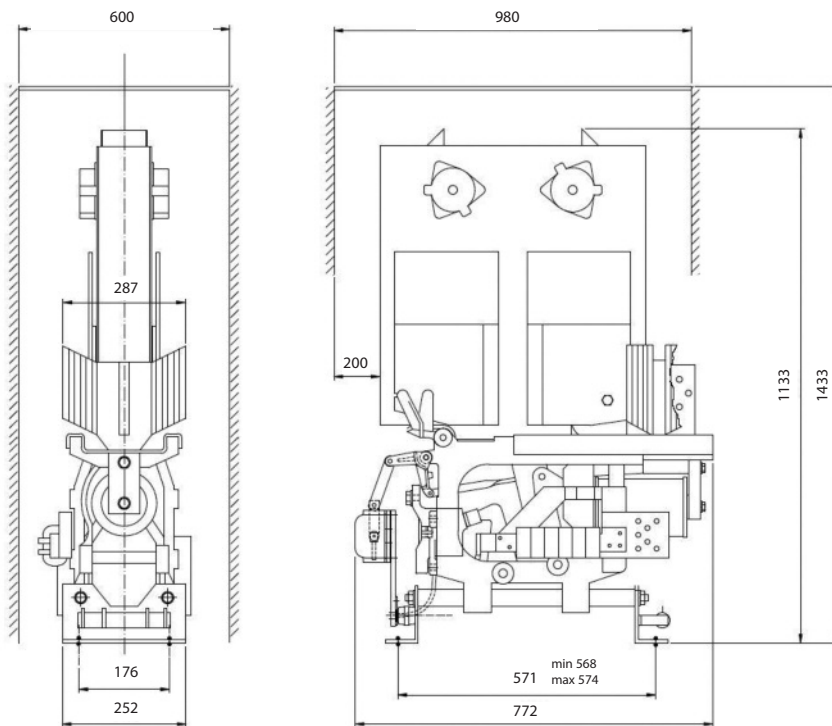
The breaker closing device is electromagnetic (for Substation and Industry applications) or electropneumatic (for Locomotives). The breaker is held closed by a holding coil and is equipped with a direct acting unidirectional over-current trip device.



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HSCBs

DC High Speed Circuit Breakers: IRA



Overall Dimensions: mm

Technical Data

		IRA	IRA	IRA
Rated voltage [V]	U_n	750	1500	3000
Rated current [A]	I_n	Up to 3000	Up to 3000	Up to 3000
Short circuit breaking capacity	U_e	750 [V]	1800 [V]	3600 [V]
	\hat{I}_{cc}	120 [kA] - Peak	100 [kA] - Peak	100 [kA] - Peak
	I_{cc}	90 [kA] - Steady State	60 [kA] - Steady State	60 [kA] - Steady State
Auxiliary circuit				
Rated voltage [V_{DC}]	U_n	24 ÷ 250	24 ÷ 250	24 ÷ 250
Type of closing device		Solenoid	Solenoid	Solenoid
Type of holding device [EM= Electromagnetic]		EM	EM	EM
Note				
Available contacts		4 NO + 4 NC	4 NO + 4 NC	4 NO + 4 NC
Weight (1500A version)	kg	175	178	225



KNORR-BREMSE



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HSCBs

DC High Speed Circuit Breakers



IR2000SV

Applications

Vehicles

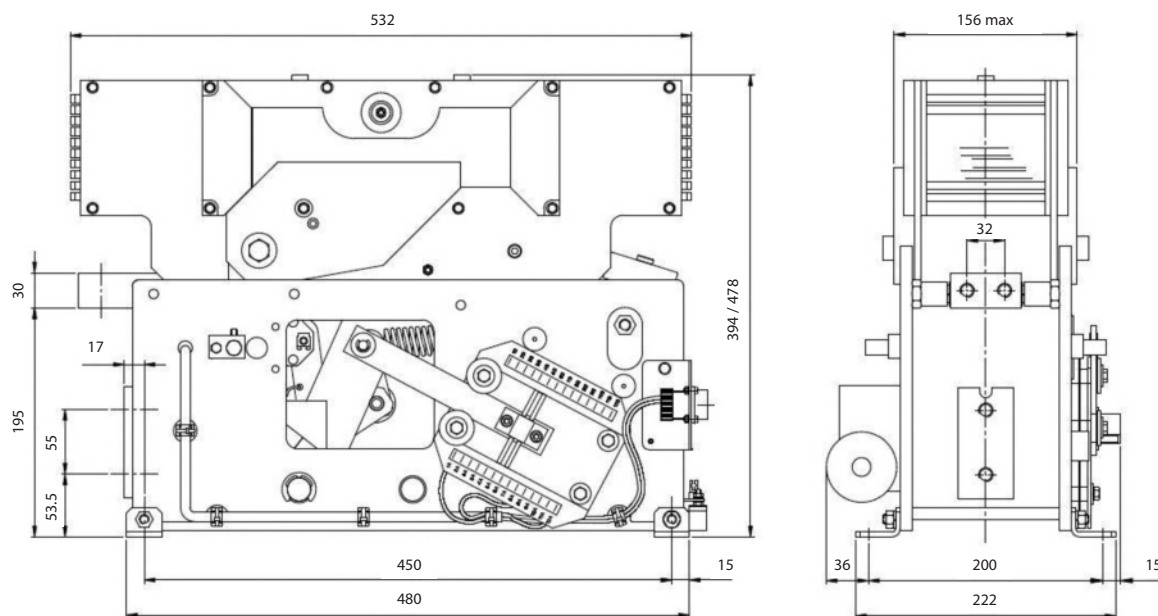
The IR2000SV Series is a single pole, magnetic blow out, trip free, High Speed Circuit Breaker. The closing mechanism is an independent motor operated type. The Circuit Breaker is held closed by holding coil and it is equipped with a direct acting overcurrent trip device which may be either unidirectional and bidirectional. The breaker may be operated as single voltage (750, 1500V) or dual voltage (750/1500V). The HSCB conforms to EN 60077 Standard.



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HSCBs

DC High Speed Circuit Breakers: IR2000SV



Overall Dimensions: mm (inches)

Technical Data

		IR2000SV	IR2000SV
Rated voltage [V]	U_n	750	1500
Protection Degrees in Box		IP45	IP45
Rated current [A]	I_n	Up to 3000	Up to 3000
Short circuit breaking capacity (IEC 60077)	U_e	900 [V]	1800 [V]
	\hat{I}_{cc}	50 [kA] - Peak	45 [kA] - Peak
	I_{cc}	30 [kA] - Steady State	25 [kA] - Steady State
Tripping direction		Uni and Bidirectional	Uni and Bidirectional
Trip setting of overcurrent release	I	From 1000 to 6000 [A]	From 1000 to 6000 [A]
Auxiliary circuit			
Rated voltage [V_{DC}]	U_n	24 ÷ 110	24 ÷ 110
Type of closing device		With servomotor	With servomotor
Type of holding device [E= Electrical ; M= Magnetic]		E o M	E o M
Note			
Available contacts		6 NO + 5 NC	6 NO + 5 NC
Weight (version with box)	kg	56	85



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