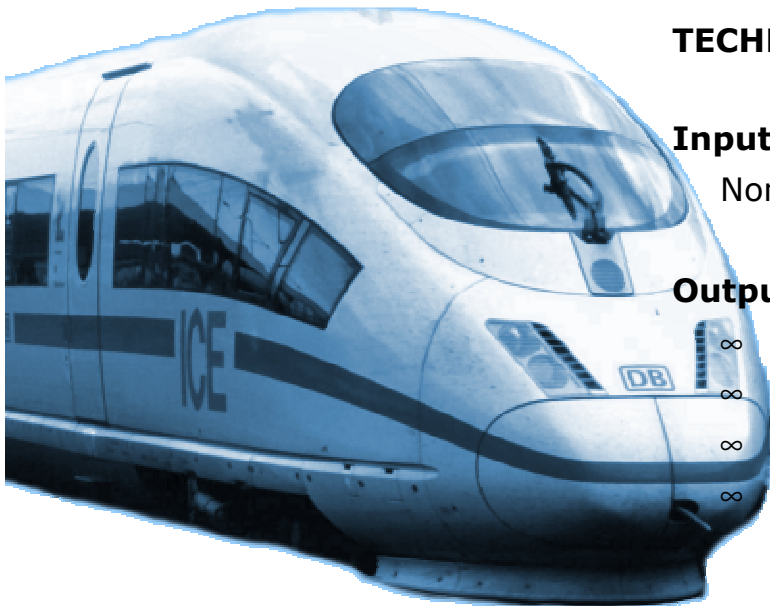


67TX670 - AIR CONDITIONING DRIVE

The power converter is used to drive the high speed motor of the Air Cycle Unit (air conditioning unit). "Consortium ICE Siemens/Bombardier in co-operation with Deutsche Bahn AG".



TECHNICAL DATA

Input Characteristics:

Nominal input voltage 670 V_{DC}

Output Characteristics:

- ∞ Output voltage $U_{AN} = 0...3 \times 400 \text{ V}_{\text{rms}}$
- ∞ Output current $I_{AN} = 67 \text{ A}$
- ∞ Output frequency $f_N = 100..660 \text{ Hz}$
- ∞ Output power 50 kVA

Protections

- over current protection
- over voltage protection
- under voltage protection
- earth-fault protection
- output phase supervision
- short-circuit protection
- motor thermal protection
- over and under temperature protection

Application:

- ∞ HVAC system



Power converter for High Speed Motors is located into the ASR-unit in the underframe of vehicle.

Mechanical Data

Input		General	
Nominal input voltage	670 Vdc	Efficiency	> 95%
Operating range	580 V – 900 VDC	Temperature range	-40 ...55°C
AC-output		Humidity	15 .. 95%
Three-phase voltage	3x400Vac (± 5%)	Cooling	Forced Air Cooling
Frequency	100..660 Hz	Dimensions in mm	335x545x600
Continuous power	50 kVA	Weight	58 kg
Max. output power	75 kVA	Mounting	Inside electric container
		Housing	IP 21 / 65

Complying standards

Electrical particles	EN 50207, Railway applications – Electronic power converters for rolling stock
Vibration shock etc.	EN 50155, Railway applications – Electronic equipment used on rolling stock
EMC	EN 50121-3-2, EMC on board rolling stock

Block diagram

