SIEMENS

# Data sheet for SINAMICS V20

## Article No. : 6SL3210-5BE27-5UV1



Figure similar

Client order no. :
Order no. :
Offer no. :
Remarks :

Item no. :
Consignment no. :
Project :

### Rated data

| | | |
|---|---|---|
| **Input** | | |
| Number of phases | 3 AC | |
| Line voltage | 380 ... 480 V -15 % +10 % | |
| Line frequency | 47 ... 63 Hz | |
| **Output** | | |
| Number of phases | 3 AC | |
| **Rated voltage** | **400V IEC** | **480V NEC [1)]** |
| Rated power (LO) | 7.50 kW | 10.00 hp |
| Rated power (HO) | 7.50 kW | 10.00 hp |
| Rated current (LO) | 16.50 A | 16.50 A |
| Rated current (HO) | 16.50 A | 16.50 A |
| Rated current (IN) | 16.50 A | |
| Pulse frequency | 4.00 kHz | |
| Output frequency | 0 ... 550 Hz | |
| **Overload capability** | | |
| Low Overload (LO) | | |
| 110 % rated output current for 60 s, cycle time 300 s | | |
| High Overload (HO) | | |
| 150 % rated output current for 60 s, cycle time 300 s | | |

### General tech. specifications

| | |
|---|---|
| Power factor λ | 0.72 |
| Offset factor cos φ | 0.95 |
| Efficiency η | 0.98 |
| Filter class (integrated) | Unfiltered |
| With integrated braking chopper | Yes |

### Communication

| | |
|---|---|
| Communication | USS, Modbus RTU |

### Inputs / outputs

| | |
|---|---|
| **Standard digital inputs** | |
| Number | 4 |
| **Digital outputs** | |
| Number as relay changeover contact | 1 |
| Number as transistor | 1 |
| **Analog inputs** | |
| Number | 2 (Can be used as additional digital input) |
| **Analog outputs** | |
| Number | 1 |

### Ambient conditions

| | |
|---|---|
| Cooling | convection cooling |
| Installation altitude | 1,000 m (3,280.84 ft) |
| **Ambient temperature** | |
| Operation[2)] | -10 ... 60 °C (14 ... 140 °F) |
| Storage | -40 ... 70 °C (-40 ... 158 °F) |
| **Relative humidity** | |
| Max. operation | 95 % |

### Connections

| | |
|---|---|
| **Max. motor cable length** | |
| Shielded | 10 m (32.81 ft) |
| Unshielded | 50 m (164.04 ft) |

### Mechanical data

| | |
|---|---|
| Mounting position | Through-hole mounting / wall mounting / side-by-side mounting |
| Degree of protection | IP20 / UL open type |
| Frame size | FSC |
| Net weight | 2.50 kg (5.29 lb) |
| **Dimensions** | |
| Width | 184.0 mm (7.24 in) |
| Height | 182.0 mm (7.17 in) |
| Depth | 169.0 mm (6.65 in) |

### Standards

| | |
|---|---|
| Compliance with standards | CE, cULus, C-Tick (RCM), KC |
| CE marking | EN 61800-5-1 /EN 60204-1 and EN 61800-3 |

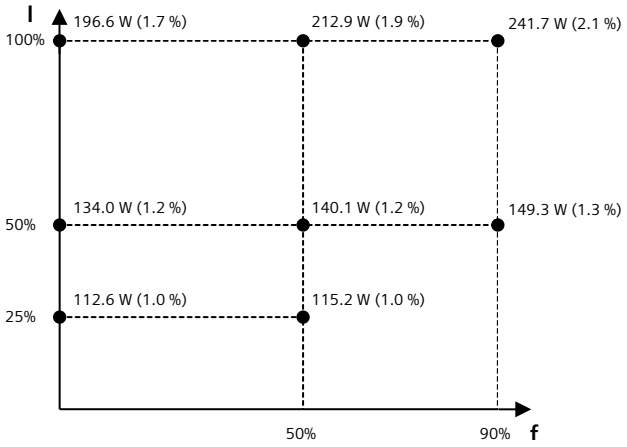
Subject to change. Calculated values may differ from nameplate ratings. © Copyright Siemens

SIEMENS

## Data sheet for SINAMICS V20

**Article No. :** **6SL3210-5BE27-5UV1**

| Converter losses to IEC61800-9-2* | |
|---|---|
| Efficiency class | IE2 |
| Comparison with the reference converter (90% / 100%) | 38.9 % |




The percentage values show the losses in relation to the rated apparent power of the converter.

The diagram shows the losses for the points (as per standard IEC61800-9-2) of the relative torque generating current (I) over the relative motor stator frequency (f). The values are valid for the basic version of the converter without options/components.

*calculated values

[1] The output current and HP ratings are valid for the voltage range 440V-480V

[2] Please observe derating at temperatures of 40 °C or above