

# Data sheet for three-phase Squirrel-Cage-Motors SIMOTICS



Motor type : 1AV3130A

SIMOTICS GP - 132 S - IM B3 - 2p

|                  |                 |           |
|------------------|-----------------|-----------|
| Client order no. | Item-No.        | Offer no. |
| Order no.        | Consignment no. | Project   |

Remarks

## Electrical data

## Safe Area

| U                                                    | Δ / Y | f        | P    | P    | I     | n       | M    | η <sup>3)</sup> |                                                  |      | cosφ <sup>3)</sup>     |      |      | I <sub>A</sub> /I <sub>N</sub> | M <sub>A</sub> /M <sub>N</sub> | M <sub>K</sub> /M <sub>N</sub> | IE-CL |
|------------------------------------------------------|-------|----------|------|------|-------|---------|------|-----------------|--------------------------------------------------|------|------------------------|------|------|--------------------------------|--------------------------------|--------------------------------|-------|
| [V]                                                  |       | [Hz]     | [kW] | [hp] | [A]   | [1/min] | [Nm] | 4/4             | 3/4                                              | 2/4  | 4/4                    | 3/4  | 2/4  | I <sub>I</sub> /I <sub>N</sub> | T <sub>I</sub> /T <sub>N</sub> | T <sub>B</sub> /T <sub>N</sub> |       |
| DOL duty (S1) - 155(F) to 130(B)                     |       |          |      |      |       |         |      |                 |                                                  |      |                        |      |      |                                |                                |                                |       |
| 400                                                  | Δ     | 50       | 5.50 | -/-  | 10.10 | 2945    | 17.8 | 89.2            | 89.5                                             | 88.6 | 0.88                   | 0.84 | 0.73 | 8.9                            | 2.5                            | 3.8                            | IE3   |
| 690                                                  | Y     | 50       | 5.50 | -/-  | 5.90  | 2945    | 17.8 | 89.2            | 89.5                                             | 88.6 | 0.88                   | 0.84 | 0.73 | 8.9                            | 2.5                            | 3.8                            | IE3   |
| 460                                                  | Δ     | 60       | 6.30 | -/-  | 10.00 | 3540    | 17.0 | 88.5            | 89.0                                             | 88.1 | 0.89                   | 0.84 | 0.75 | 9.9                            | 2.6                            | 4.0                            | IE2   |
| 460                                                  | Δ     | 60       | 5.50 | -/-  | 8.90  | 3550    | 14.8 | 89.5            | 89.0                                             | 87.0 | 0.87                   | 0.82 | 0.71 | 11.1                           | 3.0                            | 4.6                            | IE3   |
| IM B3 / IM 1001                                      |       | FS 132 S |      |      |       | IP55    |      |                 | IEC/EN 60034                                     |      | IEC, DIN, ISO, VDE, EN |      |      |                                |                                |                                |       |
| Environmental conditions : -20 °C - +40 °C / 1,000 m |       |          |      |      |       |         |      |                 | Locked rotor time (hot / cold) : 10.3 s   14.1 s |      |                        |      |      |                                |                                |                                |       |

## Mechanical data

|                                                                                     |                             |                             |                                 |                                         |
|-------------------------------------------------------------------------------------|-----------------------------|-----------------------------|---------------------------------|-----------------------------------------|
| Sound level (SPL / SWL) at 50Hz 60Hz                                                | 68 / 80 dB(A) <sup>2)</sup> | 72 / 84 dB(A) <sup>2)</sup> | Vibration severity grade        | A                                       |
| Moment of inertia                                                                   | 0.0168 kg m <sup>2</sup>    |                             | Thermal class                   | F                                       |
| Bearing DE   NDE                                                                    | 6208 2Z C3                  | 6208 2Z C3                  | Duty type                       | S1                                      |
| bearing lifetime                                                                    |                             |                             | Direction of rotation           | bidirectional                           |
| L <sub>10mh</sub> F <sub>Rad min</sub> for coupling operation 50 60Hz <sup>1)</sup> | 40000 h                     | 32000 h                     | Frame material                  | aluminum                                |
| Lubricants                                                                          | Unirex N3                   |                             | Net weight of the motor (IM B3) | 48 kg                                   |
| Regreasing device                                                                   | No                          |                             | Coating (paint finish)          | Standard paint finish C2                |
| Grease nipple                                                                       | -/-                         |                             | Color, paint shade              | RAL7030                                 |
| Type of bearing                                                                     | Preloaded bearing DE        |                             | Motor protection                | (A) without (Standard)                  |
| Condensate drainage holes                                                           | No                          |                             | Method of cooling               | IC411 - self ventilated, surface cooled |
| External earthing terminal                                                          | No                          |                             |                                 |                                         |

## Terminal box

|                          |           |                                |                   |
|--------------------------|-----------|--------------------------------|-------------------|
| Terminal box position    | top       | Max. cross-sectional area      | 6 mm <sup>2</sup> |
| Material of terminal box | Aluminium | Cable diameter from ... to ... | 11 mm - 21 mm     |
| Type of terminal box     | TB1 H00   | Cable entry                    | 2xM32x1,5         |
| Contact screw thread     | M4        | Cable gland                    | 2 plugs           |

## Notes:

|                                                                         |                                           |                                                                  |
|-------------------------------------------------------------------------|-------------------------------------------|------------------------------------------------------------------|
| I <sub>A</sub> /I <sub>N</sub> = locked rotor current / current nominal | 1) L10mh according to DIN ISO 281 10/2010 | 3) Value is valid only for DOL operation with motor design IC411 |
| M <sub>K</sub> /M <sub>N</sub> = locked rotor torque / torque nominal   | 2) at rated power / at full load          |                                                                  |
| M <sub>B</sub> /M <sub>N</sub> = break down torque / nominal torque     |                                           |                                                                  |

|                   |                     |                 |               |                                                                                                              |                                |
|-------------------|---------------------|-----------------|---------------|--------------------------------------------------------------------------------------------------------------|--------------------------------|
| responsible dep.  | technical reference | created by      | approved by   | Technical data are subject to change! There may be discrepancies between calculated and rating plate values. | <a href="#">Link documents</a> |
| DI MC LVM         |                     | DT Configurator |               |                                                                                                              |                                |
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