



**SIMOTICS XP - 90 L - IM V1 - 4p**

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

|         |
|---------|
| Remarks |
|---------|

II 2G Ex db eb IIC T4 Gb

### Electrical data

-/-

| 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> |       |
| <b>DOL duty (S1) - 155(F) to 130(B)</b>             |       |      |         |      |      |         |      |                 |                                                  |      |                    |      |      |                                |                                |                                |       |
| 380                                                 | Δ     | 50   | 1.50    | -/-  | 3.35 | 1445    | 9.9  | 85.3            | 86.0                                             | 85.2 | 0.80               | 0.73 | 0.60 | 7.3                            | 2.9                            | 3.5                            | IE3   |
| 660                                                 | Y     | 50   | 1.50    | -/-  | 1.92 | 1445    | 9.9  | 85.3            | 86.0                                             | 85.2 | 0.80               | 0.73 | 0.60 | 7.3                            | 2.9                            | 3.5                            | IE3   |
|                                                     |       |      |         |      |      |         |      |                 |                                                  |      |                    |      |      |                                |                                |                                |       |
| 440                                                 | Δ     | 60   | 1.50    | -/-  | 2.95 | 1755    | 8.2  | 86.5            | 86.2                                             | 84.5 | 0.77               | 0.69 | 0.57 | 8.6                            | 3.4                            | 4.3                            | IE3   |
| IM V1 / IM 3011                                     |       |      | FS 90 L |      |      | IP55    |      | IEC/EN 60034    |                                                  |      |                    |      |      |                                |                                | Grade 3                        |       |
| Environmental conditions : -20 °C - +40 °C / 1000 m |       |      |         |      |      |         |      |                 | Locked rotor time (hot / cold) : 17.6 s   21.5 s |      |                    |      |      |                                |                                |                                |       |

## Mechanical data

|                                                                                        |                                |                                |                            |                                         |
|----------------------------------------------------------------------------------------|--------------------------------|--------------------------------|----------------------------|-----------------------------------------|
| Sound level (SPL / SWL) at 50Hz 60Hz                                                   | 55 / 63 dB(A) <sup>2) 3)</sup> | 58 / 66 dB(A) <sup>2) 3)</sup> | Thermal class              | F                                       |
| Moment of inertia                                                                      | 0.0050 kg m²                   |                                | Duty type                  | S1                                      |
| Bearing DE   NDE                                                                       | 6205 2Z C3                     | 6205 2Z C3                     | Direction of rotation      | bidirectional                           |
| <b>bearing lifetime</b>                                                                |                                |                                | Frame material             | cast iron                               |
| L <sub>10mh</sub> F <sub>Rad,min</sub> for coupling operation<br>50 60Hz <sup>1)</sup> | 20000 h                        | 16000 h                        | Net weight of the motor    | 44 kg                                   |
| Regreasing device                                                                      | Without                        |                                | Motor weight incl. options | 44 kg                                   |
| Grease nipple                                                                          | -/-                            |                                | Coating (paint finish)     | Standard paint finish C2                |
| Type of bearing                                                                        | Locating bearing DE            |                                | Color, paint shade         | RAL7030                                 |
| Condensate drainage holes                                                              | Without                        |                                | Motor protection           | (A) without (Standard)                  |
| External earthing terminal                                                             | With (standard)                |                                | Method of cooling          | IC411 - self ventilated, surface cooled |
| Vibration severity grade                                                               | A                              |                                |                            |                                         |

## Terminal box

|                          |           |                                |              |
|--------------------------|-----------|--------------------------------|--------------|
| Terminal box position    | top       | Max. cross-sectional area      | 4 mm²        |
| Material of terminal box | cast iron | Cable diameter from ... to ... | 9 mm - 17 mm |
| Type of terminal box     | TB1 E21   | Cable entry                    | -/-          |
| Contact screw thread     | M4        |                                |              |

|                                                    |                                                |                                                                  |
|----------------------------------------------------|------------------------------------------------|------------------------------------------------------------------|
| $I_R/I_N$ = locked rotor current / current nominal | 1) $L_{10th}$ according to DIN ISO 281 10/2010 | 3) Value is valid only for DOL operation with motor design IC411 |
| $M_R/M_N$ = locked rotor torque / torque nominal   | 2) at rated power / at full load               |                                                                  |
| $M_R/M_N$ = break down torque / nominal torque     |                                                |                                                                  |

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|  | Document type<br>Technical data sheet  |                   |                                      | Document status<br>Released                                                                                  |                             |  |             |
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Data sheet for three-phase Squirrel-Cage-Motors SIMOTICS



Motor type : 1CD3094B

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Special design

|     |                                                  |     |                               |
|-----|--------------------------------------------------|-----|-------------------------------|
| B02 | Acceptance test certificate 3.1 acc. to EN 10204 | D34 | China Energy Efficiency Label |
| D32 | Ex certification for China                       | H00 | Canopy                        |

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