

**BALDOR • RELIANCE**

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# Customer information packet

## CECP4103T

25HP, 1770RPM, 3PH, 60HZ, 286TC, 1056M, TEFC, F

Class - CLI GP A,B,C,D

Division - Division II

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10/5/2024 2:20:30 AM

## Specifications

|                                |  |
|--------------------------------|--|
| Enclosure                      | TEFC   |
| Frame                          | 286TC  |
| Frame Material                 | Iron   |
| Frequency                      | 60.00 Hz   |
| Haz Area Class and Group       | CLI GP A,B,C,D   |
| Haz Area Division              | Division II  |
| Motor Letter Type              | Three Phase  |
| Output @ Frequency             | 25.000 HP @ 60 HZ  |
| Phase                          | 3  |
| Synchronous Speed @ Frequency  | 1800 RPM @ 60 HZ   |
| Voltage @ Frequency            | 230.0 V @ 60 HZ<br>460.0 V @ 60 HZ                       |
| Agency Approvals               | CSA EEV<br>NEMA PREMIUM<br>NEMA_PREMIUM<br>UR<br>CCSA US |
| Ambient Temperature            | 40 °C  |
| Auxillary Box                  | No Auxillary Box   |
| Auxillary Box Lead Termination | None   |
| Base Indicator                 | Rigid  |
| Bearing Grease Type            | Polyrex EM (-20F +300F)                                  |
| Blower                         | None   |
| Constant Torque Speed Range    | 1.0  |
| Current @ Voltage              | 60.000 A @ 230.0 V<br>30.000 A @ 460.0 V                 |
| Design Code                    | B  |
| Drip Cover                     | No Drip Cover  |
| Duty Rating                    | CONT   |
| Efficiency @ 100% Load         | 93.6 %   |
| Electrically Isolated Bearing  | Not Electrically Isolated                                |
| Enclosure Modification         | Severe Duty Features                                     |

## Part detail

|              |            |
|--------------|------------|
| Revision     | K          |
| Type         | AC         |
| Mech. spec.  | 10H412     |
| Base         |            |
| Status       | PRD/A      |
| Elec. spec.  | 10WGZ624   |
| Layout       | 10LYH412   |
| Eff. date    | 07-29-2024 |
| CD Diagram   | CD0005     |
| Poles        | 04         |
| Leads        | 9#10       |
| Proprietary  | False      |
| Created date | 04-03-2017 |

|                               |                             |
|-------------------------------|-----------------------------|
| Feedback Device               | NO FEEDBACK                 |
| Front Face Code               | Standard                    |
| Front Shaft Indicator         | None                        |
| Haz Area Temp Code            | T3C                         |
| Heater Indicator              | No Heater                   |
| High Voltage Full Load Amps   | 30.0 a                      |
| Insulation Class              | F                           |
| Inverter Code                 | Inverter Duty               |
| KVA Code                      | F                           |
| Lifting Lugs                  | Standard Lifting Lugs       |
| Locked Bearing Indicator      | Locked Bearing              |
| Max Speed                     | 2700 rpm                    |
| Motor Lead Exit               | Ko Box                      |
| Motor Lead Quantity/Wire Size | 9 @ 10 AWG                  |
| Motor Lead Termination        | Flying Leads                |
| Motor Standards               | NEMA                        |
| Motor Type                    | 1056M                       |
| Mounting Arrangement          | F1                          |
| Number of Poles               | 4                           |
| Overall Length                | 28.00 IN                    |
| Power Factor                  | 85                          |
| Product Family                | Super-E Chemical Processing |
| Pulley End Bearing Type       | Ball                        |
| Pulley Face Code              | C-Face                      |
| Pulley Shaft Indicator        | Standard                    |
| Rodent Screen                 | None                        |
| Service Factor                | 1.15                        |
| Shaft Diameter                | 1.875 IN                    |
| Shaft Extension Location      | Pulley End                  |
| Shaft Ground Indicator        | No Shaft Grounding          |
| Shaft Rotation                | Reversible                  |
| Shaft Slinger Indicator       | Shaft Slinger               |
| Speed                         | 1770 rpm                    |
| Speed Code                    | Single Speed                |

|                                   |                     |
|-----------------------------------|---------------------|
| <b>Starting Method</b>            | Direct on line      |
| <b>Thermal Device - Bearing</b>   | None                |
| <b>Thermal Device - Winding</b>   | None                |
| <b>Vibration Sensor Indicator</b> | No Vibration Sensor |
| <b>Winding Thermal 1</b>          | None                |
| <b>Winding Thermal 2</b>          | None                |

**Nameplate**

**NP3241**

|                   |              |                                |      |                   |            |
|-------------------|--------------|--------------------------------|------|-------------------|------------|
| <b>CAT.NO.</b>    | CECP4103T    | <b>P/N</b>                     |      | <b>ENCLOSURE</b>  | TEFC       |
| <b>SPEC.</b>      | 10H412Z624G1 | <b>CC</b>                      | 010A | <b>FRAME</b>      | 286TC      |
| <b>HP</b>         | 25           | <b>CLASS</b>                   | F    | <b>HZ</b>         | 60         |
| <b>RPM</b>        | 1770         | <b>RPM MAX</b>                 | 2700 | <b>PH</b>         | 3          |
| <b>VOLT</b>       | 230/460      | <b>MOTOR WEIGHT</b>            | 449  | <b>KVA-CODE</b>   | F          |
| <b>AMP</b>        | 60/30        | <b>SER.F.</b>                  | 1.15 | <b>PF</b>         | 85         |
| <b>RATING</b>     | 40C AMB-CONT | <b>NEMA-NOM-EFF</b>            | 93.6 | <b>ODE BRG</b>    | 6311       |
|                   |              | <b>DE BRG</b>                  | 6311 | <b>GREASE</b>     | POLYREX EM |
|                   |              | <b>INV.TYPE</b>                | PWM  |                   |            |
| <b>TEMP CODE</b>  | T3C          | <b>INVERTER-TEMP-CODE</b>      | 180  |                   |            |
| <b>TEMP =</b>     | 160          | <b>C HP FR</b>                 | 60   | <b>C HP TO</b>    | 90         |
| <b>CT HZ FROM</b> | 1.0          | <b>CT HZ TO</b>                | 60   |                   |            |
| <b>HTR-VOLTS</b>  |              | <b>HTR-AMPS</b>                |      | <b>HTR-WATTS</b>  |            |
|                   |              | <b>MAX. SPACE HEATER TEMP.</b> |      | <b>VT HZ FROM</b> | 0          |
|                   |              |                                |      | <b>VT HZ TO</b>   | 60         |

**AC Induction Motor Performance Data**

Record # 62432

Typical performance - not guaranteed values

| <b>Winding: 10WGZ624-R001</b> |                        | <b>Type: 1056M</b>               |  | <b>Enclosure: TEFC</b> |  |
|-------------------------------|------------------------|----------------------------------|--|------------------------|--|
| <b>Nameplate Data</b>         |                        |                                  | <b>460 V, 60 Hz:<br/>High Voltage Connection</b> |                        |  |
| <b>Rated Output (HP)</b>      | 25                     | <b>Full Load Torque</b>          | 74.31 LB-FT                                      |                        |  |
| <b>Volts</b>                  | 460                    | <b>Start Configuration</b>       | direct on line                                   |                        |  |
| <b>Full Load Amps</b>         | 30                     | <b>Breakdown Torque</b>          | 197 LB-FT  |                        |  |
| <b>R.P.M.</b>                 | 1770                   | <b>Pull-up Torque</b>            | 91.4 LB-FT                                       |                        |  |
| <b>Hz</b>                     | 60                     | <b>Locked-rotor Torque</b>       | 115 LB-FT  |                        |  |
| <b>NEMA Design Code</b>       | <b>Phase</b> 3         | <b>Starting Current</b>          | 173 A  |                        |  |
| <b>Service Factor (S.F.)</b>  | <b>B KVA Code</b> F    | <b>No-load Current</b>           | 10.4 A   |                        |  |
| <b>NEMA Nom. Eff.</b>         | 1.15                   | <b>Line-line Res. @ 25°C</b>     | 0.29877 Ω  |                        |  |
| <b>Rating - Duty</b>          | 93.6                   | <b>Temp. Rise @ Rated Load</b>   | 54°C   |                        |  |
| <b>S.F. Amps</b>              | <b>Power Factor</b> 85 | <b>Temp. Rise @ S.F. Load</b>    | 67°C   |                        |  |
|                               | 40C AMB-CONT           | <b>Locked-rotor Power Factor</b> | 30.3   |                        |  |

**Load Characteristics 460 V, 60 Hz, 25 HP**

| <b>% of Rated Load</b> | <b>25</b> | <b>50</b> | <b>75</b> | <b>100</b> | <b>125</b> | <b>150</b> | <b>S.F.</b> |
|------------------------|-----------|-----------|-----------|------------|------------|------------|-------------|
| <b>Power Factor</b>    | 51        | 73        | 81        | 85         | 86         | 86         | 86          |
| <b>Efficiency</b>      | 91        | 93.8      | 94.1      | 93.7       | 92.9       | 91.8       | 93.2        |
| <b>Speed</b>           | 1792.8    | 1785.5    | 1778.9    | 1770.7     | 1762.4     | 1751.5     | 1766        |
| <b>Line amperes</b>    | 12.5      | 17        | 22.9      | 29.5       | 36.5       | 44.7       | 33.7        |

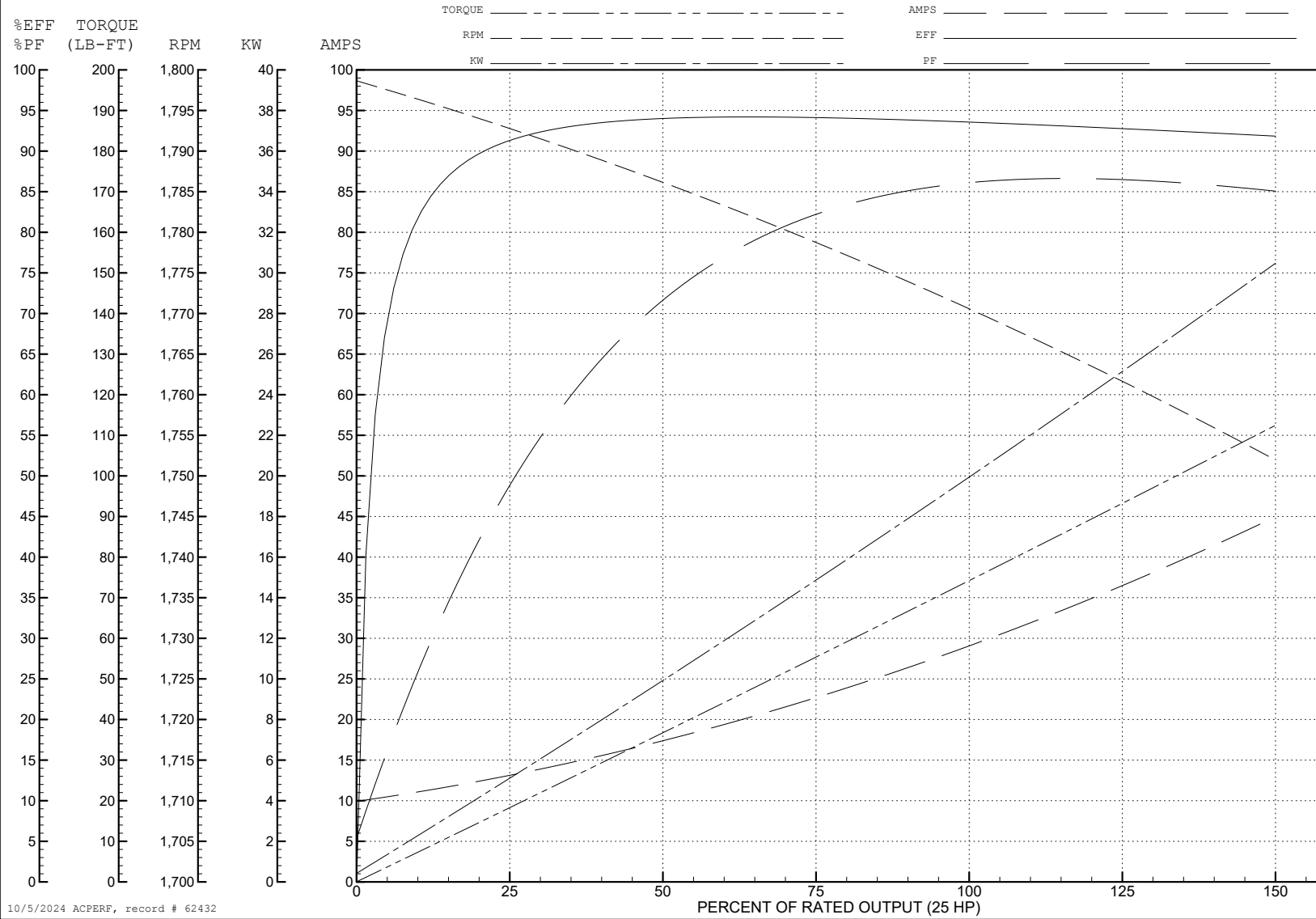
ABB Motors and Mechanical Inc.

WINDING # 10WGZ624

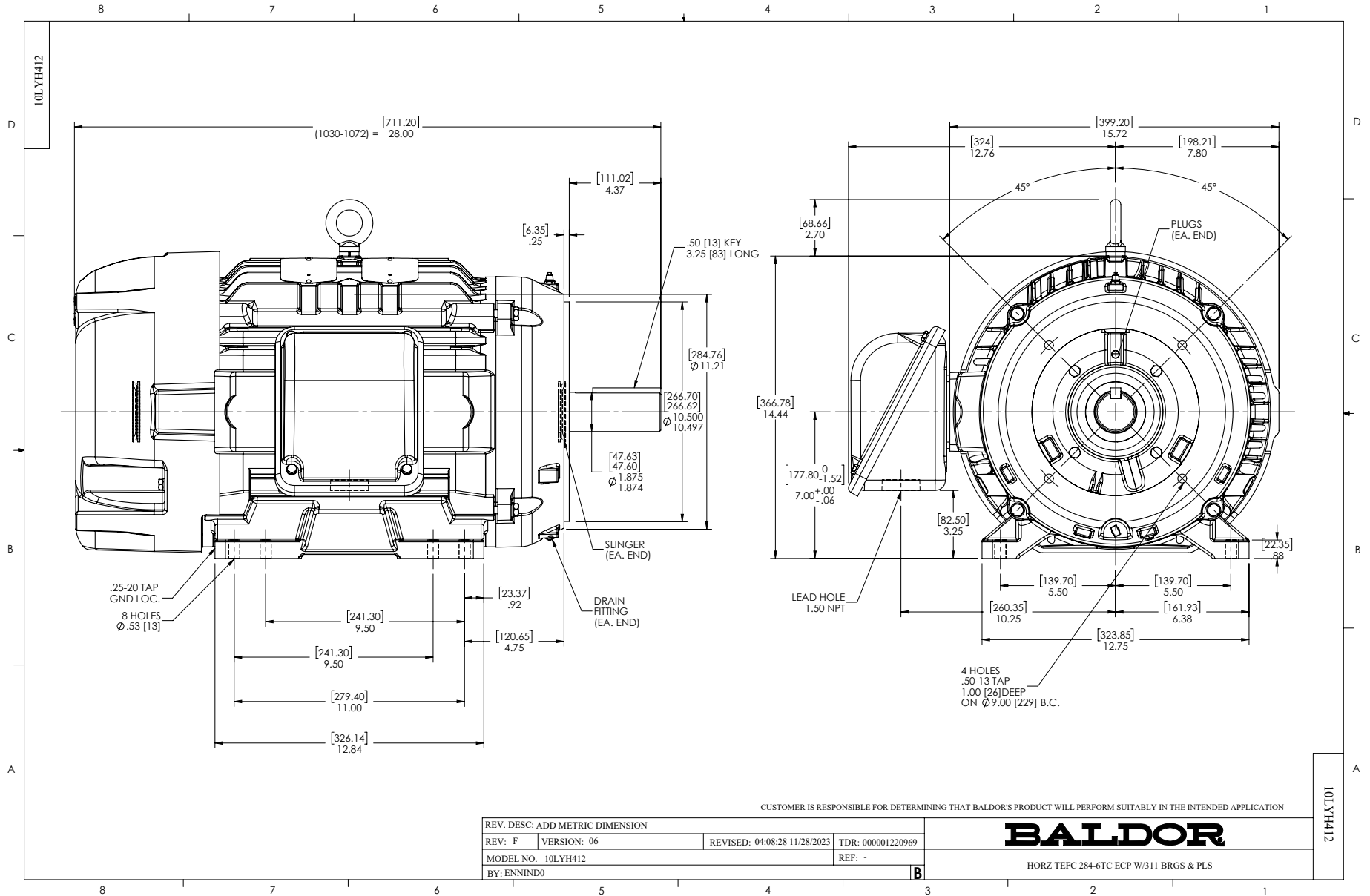
Typical performance - not guaranteed values.

25 HP 3 PH 60 HZ 1770 RPM 460 V 1056M

TORQUES (LB-FT): PO=197 PU=91.4 LR=115 LRA=173



10/5/2024 ACPERF, record # 62432





CD0005



LOW VOLTAGE  
(2Y)



LINE

HIGH VOLTAGE  
(1Y)



LINE

NOTES:

1. INTERCHANGE ANY TWO LINE LEADS TO REVERSE ROTATION.
2. OPTIONAL THERMOSTATS ARE PROVIDED WHEN SPECIFIED.
3. ACTUAL NUMBER OF INTERNAL PARALLEL CIRCUITS MAY BE A MULTIPLE OF THOSE SHOWN ABOVE.
4. LEAD COLORS ARE OPTIONAL. LEADS MUST ALWAYS BE NUMBERED AS SHOWN.

CD0005

|   |         |                         |              |
|---|---------|-------------------------|--------------|
| REV. DESC: REVISE TO SHOW OPTIONAL COLORS |         |                         |              |
| REV. LTR: E                               | BY: JLP | REVISED: 01/19/99 10:15 | TDR: 0171435 |
| S00000                                    |         | FILE: AAA00005140       | MDL: -       |
|   |         | MTL: -                  |              |

**BALDOR ELECTRIC Co.**

3PH, DV, 9 LEADS