

Motortronics®

ROTARY ENCODERS

FA-CODER®



OIH35

SmartAbs®



INCREMENTAL

APPLICATION

AC Servo motors

FEATURES

High Resolution

Low cost

High Speed responsibility

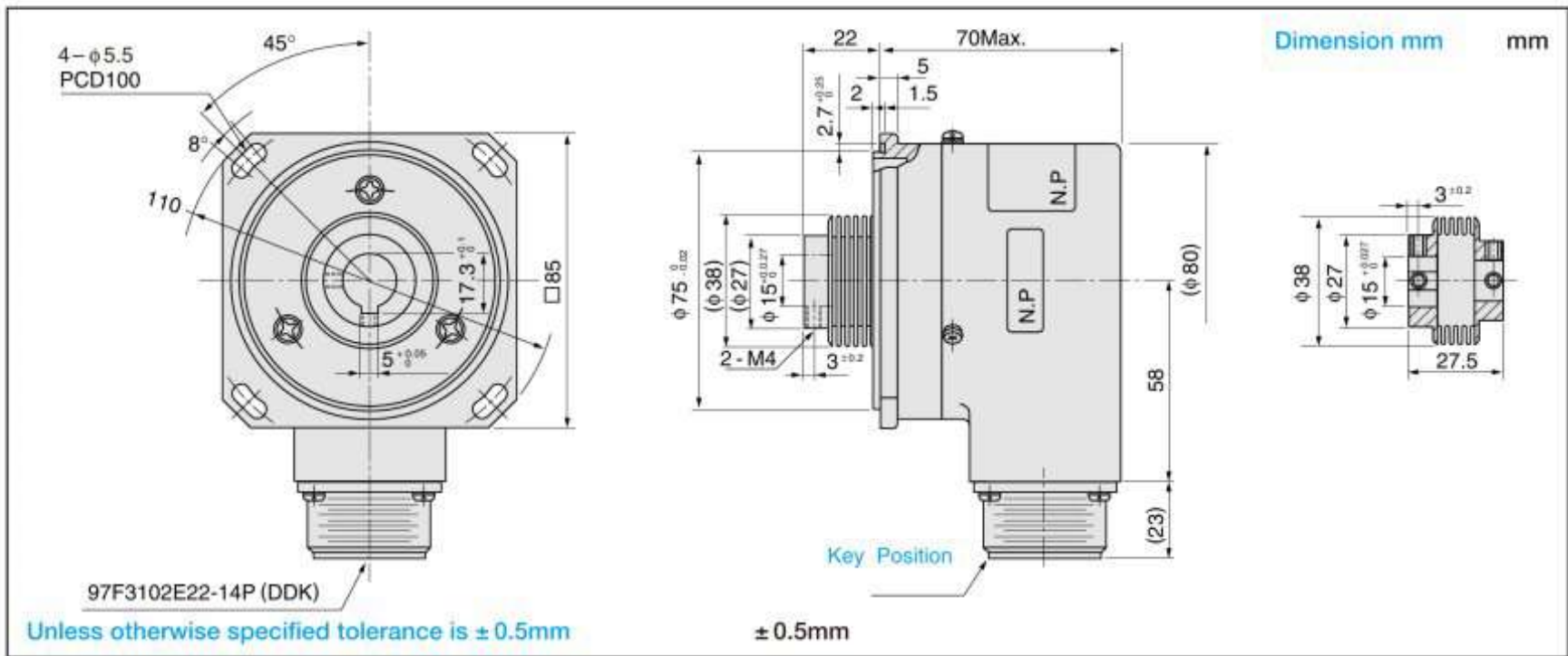
High reliability

Easy to attach

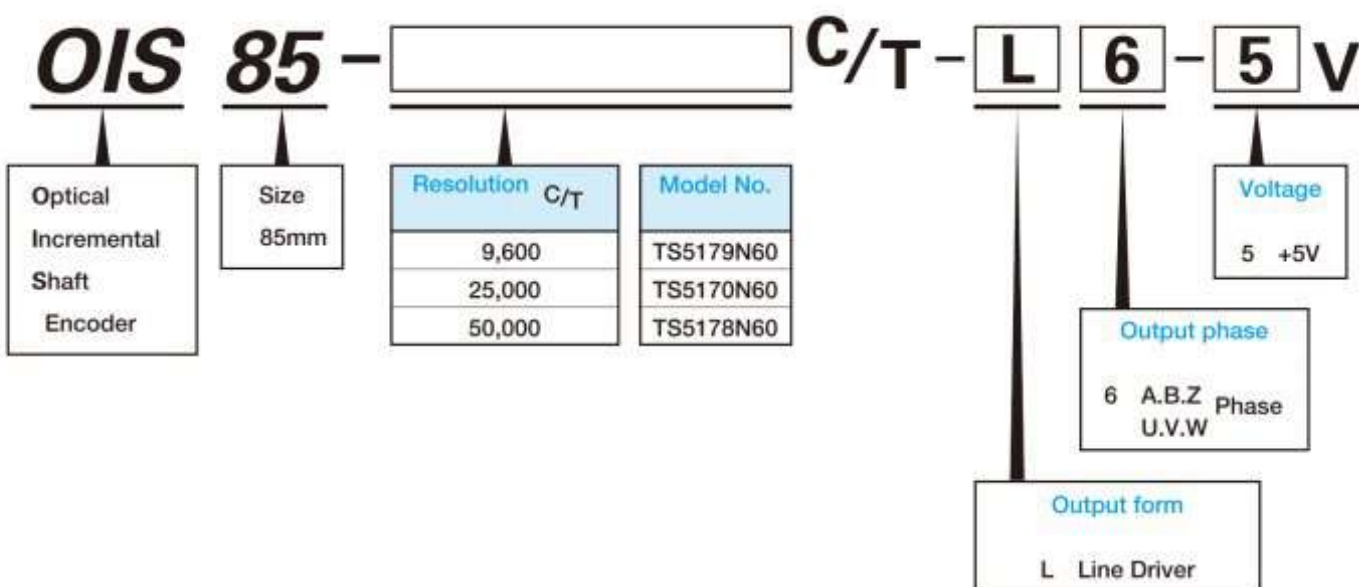


TS5170

OIS85 Series



DESIGNATE THE NAME OF FUNCTION WHEN ORDERING



For special cases, please consult us.

SPECIFICATIONS

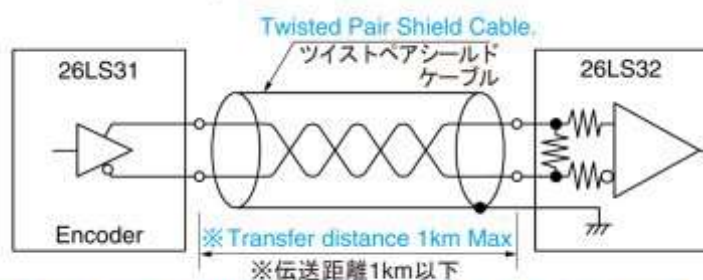
仕様

| Electrical Spec. 電氣的仕様 | | Mechanical Spec. 機械的仕様 | | |
|---------------------------------------|---|---------------------------------------|--|---------------------|
| Resolution 分 解 能 | 9,600~50,000 C/T | Starting Torque 起 動 ト ル ク | $2.0 \times 10^{-2} \text{ N} \cdot \text{m}$ (200gf·cm Max) | |
| Supply Voltage 電 源 電 圧 | DC+5V ± 5% | Moment of Inertia 慣 性 能 率 | $2.0 \times 10^{-5} \text{ kg} \cdot \text{m}^2$ (200g·cm ² Max) | |
| Consumption Current 消 費 電 流 | 250mA Max | Maximum Rotating Speed 最 大 回 転 速 度 | $5,000 \text{ min}^{-1}$ (5,000rpm) | |
| Output Form 出 力 形 態 | Line Driver ラインドライバ | 26LS31 | Radial 半径方向 | 19.6N (2kgf Max) |
| | | Source Current ソース電流 | 20mA Max | Axial 軸方向 |
| | | Sink Current シンク電流 | 20mA Max | |
| Maximum Response Frequency 最大応答周波数 | 9,600C/Tの時 576KHz 25,000C/Tの時 1.5MHz 50,000C/Tの時 2.5MHz | Operating Temp. Range 動作温度範囲 | -10~+80° C | |
| Rise time, Fall time 立上り、立下り時間 | 200nsec | Storage Temp. Range 保存温度範囲 | -20~+85° C | |
| | | Protective Construction 保護構造 | IP = 52 | |
| | | Vibration 振 動 | 49 m/s^2 (5G) | |
| | | Shock 衝 撃 | $1,960 \text{ m/s}^2$ (200G) | |
| | | Mass 質 量 | 1kg Max | |

CIRCUIT AT OUTPUT STAGE (EXAMPLE)

出力段回路 (例)

- Line Driver Output ラインドライバ出力



※Note that transfer distance depends much on ambient condition.
※表示伝送距離は、使用環境により大きく変わりますのでご注意ください。
※Use transmission cable after verifying effects of impedance characteristics.
※伝送ケーブルは、インピーダンス特性等の影響をご確認の上、使用してください。

CONNECTION TABLE

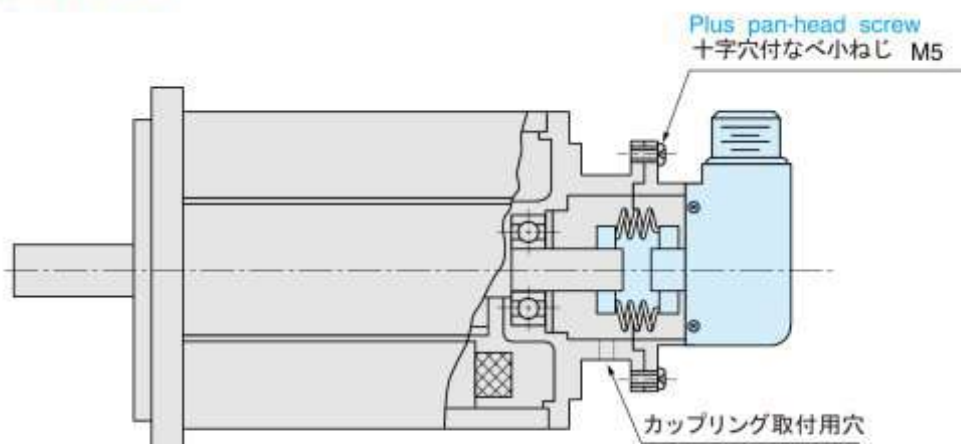
接続表

| 97F3102E22-14P | | | |
|----------------|---------------------|-----|-------------|
| PIN | Function | PIN | Function |
| A | A ch Output | K | V ch Output |
| B | \bar{A} ch Output | L | V ch Output |
| C | B ch Output | M | W ch Output |
| D | \bar{B} ch Output | T | W ch Output |
| F | Z ch Output | S | DC+5V |
| G | Z ch Output | R | GND |
| H | U ch Output | — | — |
| J | U ch Output | N | Case GND |

ATTACHING WAY (EXAMPLE)

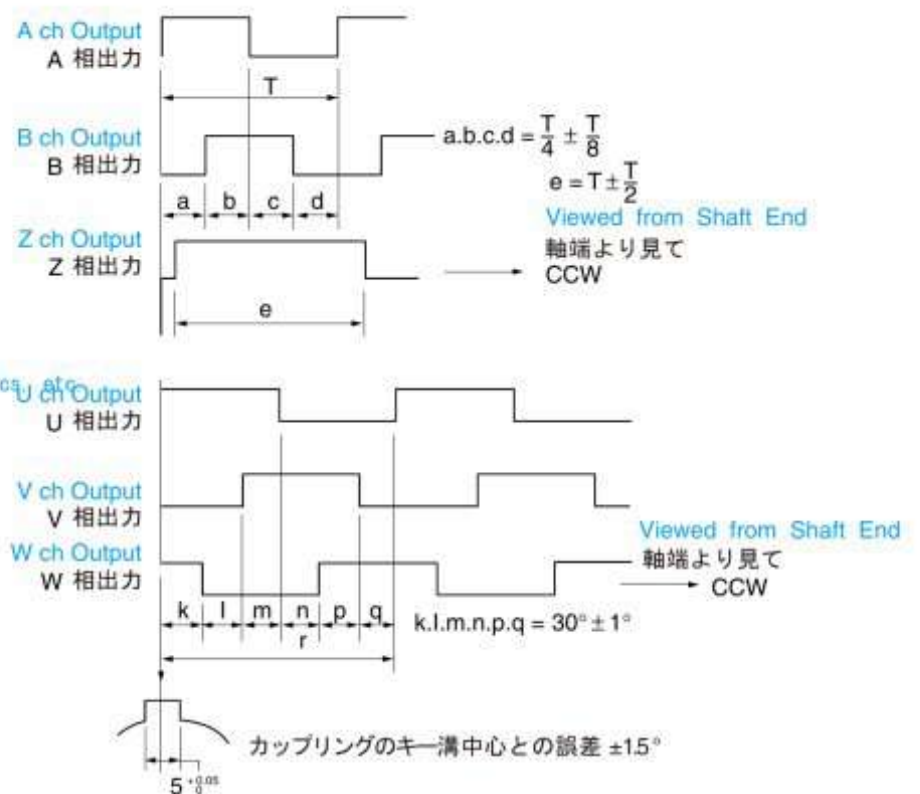
取付方法 (例)

Dimension mm 寸法 mm



OUTPUT PHASE SHIFT

出力位相差



- Align the center of key groove with motor Zero point.
- エンコーダのキー溝中心とモータの零点を合わせてください。

ROTARY ENCODERS

FA-CODER®

FA-CODER®

Digital techniques in business industry have been greatly advanced. Among these, necessity for converting analog like rotating value, shaft angle position, etc. to digital has been increased as measurement for physical value and automation for control system are advanced. Encoders, at present, have been widely used for factory automations, measurements, office automation devices, medical equipment, aviations and universal fields.

Various kinds of encoders (FA-CODER® as trade mark) from small to high resolution are available to meet all of the requirements. High performance encoders supported by these high disk producing techniques are available.

