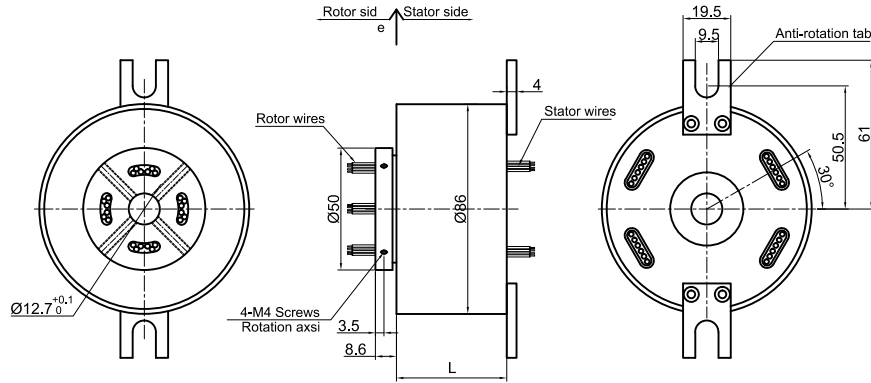
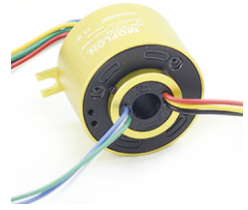
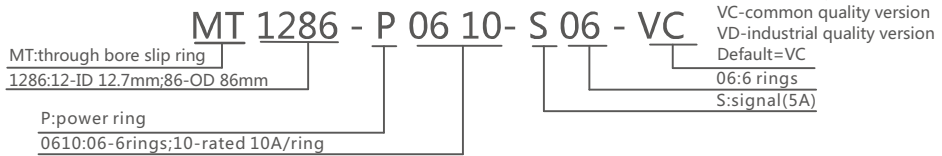


# MT1286 Series

MT1286 series provides a 12.7mm through-bore for routing of hydraulic or pneumatic lines or hydraulic or pneumatic rotating shaft installation, and a compact 86mm outside diameter, features long life, fiber brush contact technology for ultimate performance in many challenging applications. MT1286 series are standard, off-the-shelf products, Color-coded lead wires are used on both the stator and rotor for simplified electrical connections. It can transmit signal (2A), 10A, multiple 10A current when 360° degree free rotating.



## Part# Explanation



## Part# List

| MT1286 Series Parts# List |     |              |               |                  |     |              |               |
|---------------------------|-----|--------------|---------------|------------------|-----|--------------|---------------|
| Part#                     | 10A | Signal or 5A | Length-L (mm) | Part#            | 10A | Signal or 5A | Length-L (mm) |
| MT1286-S02                | 0   | 2            | 31.6          | MT1286-P2410-S06 | 24  | 6            | 126.8         |
| MT1286-P0210              | 2   | 0            | 31.6          | MT1286-P3010     | 30  | 0            | 126.8         |
| MT1286-S03                | 0   | 3            | 35            | MT1286-S36       | 0   | 36           | 150.2         |
| MT1286-P0310              | 3   | 0            | 35            | MT1286-P0610-S30 | 6   | 30           | 150.2         |
| MT1286-S06                | 0   | 6            | 45.2          | MT1286-P1210-S24 | 12  | 24           | 150.2         |
| MT1286-P0210-S04          | 2   | 4            | 45.2          | MT1286-P3610     | 36  | 0            | 150.2         |
| MT1286-P0410-S02          | 4   | 2            | 45.2          | MT1286-S42       | 0   | 42           | 170.6         |
| MT1286-P0610              | 6   | 0            | 45.2          | MT1286-P0610-S36 | 6   | 36           | 170.6         |
| MT1286-S12                | 0   | 12           | 65.6          | MT1286-P1210-S30 | 12  | 30           | 170.6         |
| MT1286-P0210-S10          | 2   | 10           | 65.6          | MT1286-P4210     | 42  | 0            | 170.6         |
| MT1286-P0310-S09          | 3   | 9            | 65.6          | MT1286-S48       | 0   | 48           | 191           |
| MT1286-P0610-S06          | 6   | 6            | 65.6          | MT1286-P0610-S42 | 6   | 42           | 191           |
| MT1286-P0810-S04          | 8   | 4            | 65.6          | MT1286-P1210-S36 | 12  | 36           | 191           |
| MT1286-P1010-S02          | 10  | 2            | 65.6          | MT1286-P1810-S30 | 18  | 30           | 191           |
| MT1286-P1210              | 12  | 0            | 65.6          | MT1286-P2410-S24 | 24  | 24           | 191           |
| MT1286-S18                | 0   | 18           | 86            | MT1286-P4810     | 48  | 0            | 191           |
| MT1286-P0210-S16          | 2   | 16           | 86            | MT1286-S60       | 0   | 60           | 231.8         |
| MT1286-P0410-S14          | 4   | 14           | 86            | MT1286-P0610-S54 | 6   | 54           | 231.8         |
| MT1286-P0610-S12          | 6   | 12           | 86            | MT1286-P0910-S51 | 9   | 51           | 231.8         |
| MT1286-P0810-S10          | 8   | 10           | 86            | MT1286-P1210-S48 | 12  | 48           | 231.8         |
| MT1286-P1010-S08          | 10  | 8            | 86            | MT1286-P2410-S36 | 24  | 36           | 231.8         |
| MT1286-P1210-S06          | 12  | 6            | 86            | MT1286-S72       | 0   | 72           | 275.6         |
| MT1286-P1410-S04          | 14  | 4            | 86            | MT1286-P1210-S60 | 12  | 60           | 275.6         |
| MT1286-P1610-S02          | 16  | 2            | 86            | MT1286-P2410-S48 | 24  | 48           | 275.6         |
| MT1286-S24                | 0   | 24           | 106.4         | MT1286-P3610-S36 | 36  | 36           | 275.6         |
| MT1286-P0410-S20          | 4   | 20           | 106.4         | MT1286-S84       | 0   | 84           | 316.4         |
| MT1286-P0610-S18          | 6   | 18           | 106.4         | MT1286-P1210-S72 | 12  | 72           | 316.4         |
| MT1286-P1210-S12          | 12  | 12           | 106.4         | MT1286-P2410-S60 | 24  | 60           | 316.4         |
| MT1286-P1810-S06          | 18  | 6            | 106.4         | MT1286-P3610-S48 | 36  | 48           | 316.4         |
| MT1286-P2410              | 24  | 0            | 106.4         | MT1286-S96       | 0   | 96           | 357.2         |
| MT1286-S30                | 0   | 30           | 126.8         | MT1286-P1210-S84 | 12  | 84           | 357.2         |
| MT1286-P0610-S24          | 6   | 24           | 126.8         | MT1286-P2410-S72 | 24  | 72           | 357.2         |
| MT1286-P1210-S18          | 12  | 18           | 126.8         | MT1286-P3610-S60 | 36  | 60           | 357.2         |
| MT1286-P1810-S12          | 18  | 12           | 126.8         | MT1286-P4210-S54 | 42  | 54           | 357.2         |

Note: N channels 10A rings parallel can be used as 1 channel N\*10A current. For example: 2 rings 10A parallel could be used as 1 wires 20A, 10A, 5A (signal) can combine freely in any way. It can be customized based on standard slip ring, please contact customer service for more details.

## Specifications

| Electrical Data       |                                 |                |
|-----------------------|---------------------------------|----------------|
| Parameter             | Value                           |                |
|                       | Power                           | Signal         |
| Rated Voltage         | 0~690VAC/VDC                    | 0~440VAC/VDC   |
| Insulation Resistance | ≥1000MΩ/500VDC                  | ≥1000MΩ/500VDC |
| Lead Wires            | AWG16#Teflon                    | AWG22#Teflon   |
| Lead Length           | Standard 300mm(adjustable)      |                |
| Insulation Strength   | 1000VAC@50Hz , 60s              |                |
| Electrical Noise      | <0.01Ω                          |                |
| Mechanical data       |                                 |                |
| Parameter             | Value                           |                |
| Working Life          | See Product Quality Level Table |                |
| Rotating Speed        | See Product Quality Level Table |                |
| Working Temperature   | -30°C~80°C                      |                |
| Operating Humidity    | 0~85% RH                        |                |
| Contact Material      | See Product Quality Level Table |                |
| Housing Material      | Aluminium Alloy                 |                |
| Torque                | 0.1N.m ; +0.03N.m/6rings        |                |
| Protection Grade      | IP51                            |                |

## Product Quality Level Table

| Products Level Code | Max Rotating Speed | Working Life     | Contact Material |
|---------------------|--------------------|------------------|------------------|
| VC                  | 250RPM             | 20 Million Revs  | Precious Metal   |
| VD                  | 600RPM             | 80 Million Revs  | Gold-plated      |
| VH                  | 1000RPM            | 150 Million Revs | Gold-Gold        |

## Lead Wires Color Code

| Ring  | 1   | 2   | 3   | 4   | 5   | 6   | 7   | 8   | 9   | 10  | 11  | 12  |
|-------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| Color | BLK | RED | YEL | GRN | BLU | WHT | BLK | RED | YEL | GRN | BLU | WHT |

(6 wires for 1 group color, from 7-12, repeat the same color as 1...6, indicated with number code pipe)

## Options For Custom Slip Ring

Note: Below special demands can be customized. According, the delivery date will be extended 3 to 15 days; also the cost will be increased 30% to 50%. Most of our basic parts are standard and modular, which can save the cost and lead time.

- ① Cable exit way and cable length can be customized for both rotor and stator.
- ② Because of the structure limitation, length/height/OD can be customized on your request.
- ③ Support current or signal up to 200 rings.
- ④ Aviation plug, terminal and heat-shrink tube are optional.
- ⑤ Hybrid slip ring for Yaskawa/Panasonic/Siemens servo control signal, power line and encoder line.
- ⑥ Support mixed high speed data transmission (including Ethernet, USB, RS232, RS485, Profibus, CanBUS, CANOPEN, DeviceNET, CC-LINK, ProfiNET, EtherCAT, etc.)
- ⑦ Can combine temperature control signal with thermocouple signal.
- ⑧ Special environment can be customized, such as quakeproof, high temperature, etc.
- ⑨ Hybrid Pneumatic/hydraulic and electric slip ring can be mixed.
- ⑩ High temperature can up to 500 degrees.
- ⑪ High pressure can up to 110KV
- ⑫ Rotating speed can up to 10000RPM
- ⑬ Maximum current can up to 5000 amperes.
- ⑭ Military grade
- ⑮ Optional for underwater IP65, IP68.
- ⑯ Optional for stainless steel housing

Technical support: technical@moflon.com