



# ZWBPD024024

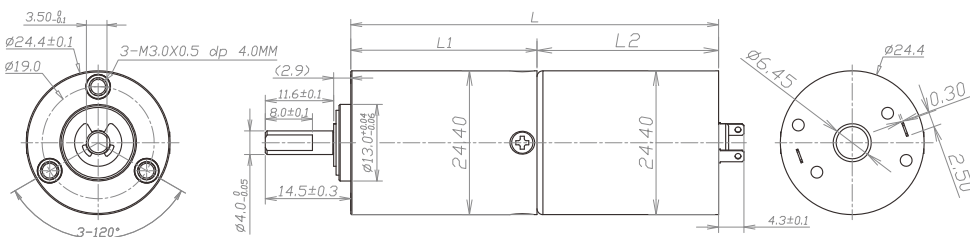
## 齿轮箱规格 Gearbox specifications

|                            |            |  |                     |                      |
|----------------------------|------------|--|---------------------|----------------------|
| 外径 Outer diameter          | 24mm       | 轴承 Bearing                             | 烧结轴承 Porous Bearing | 滚动轴承 Rolling bearing |
| 材质 Material                | 塑料 Plastic | 轴向窜动 Axial endplay                     | ≤0.1mm              | ≤0.1mm               |
| 旋转方向 Direction of rotation | cc & ccw   | 输出轴径向负载 Radial loading on output shaft | ≤50N                | ≤100N                |
| 齿轮箱回程差 Gear backlash       | ≤3° (可定制)  | 工作温度 Operating temperature range       | -20 ~ +85°C         |                      |

## 齿轮级数 Gearbox stages

|   | 1     | 2            | 3                   | 4                            |
|---|-------|--------------|---------------------|------------------------------|
| 减速比 Reduction ratio                             | 4 / 6 | 16 / 24 / 36 | 64 / 96 / 144 / 216 | 256 / 384 / 576 / 864 / 1296 |
| 最大容许扭力 (gf.cm max) Max rated torque of gear box | 15000 | 15000        | 15000               | 15000                        |
| 瞬间容许力矩 (gf.cm max) Instant torque of gear box   | 45000 | 45000        | 45000               | 45000                        |
| 齿轮箱效率 Gearbox efficiency                        | 85    | 73           | 65                  | 58                           |
| 长度 Length                                       | 18.8  | 24.7         | 31.7                | 38.7                         |

## 技术插图 | Technical illustrations



## 马达规格参数 Motor specifications

|                           |   |                  |           |
|---------------------------|---|------------------|-----------|
| 马达(可选择) Motors(Optional)  | 空心杯电机、无刷电机、步进电机<br>Coreless motor, brushless motor, Stepper motor | 输入速度 Input speed | ≤15000rpm |
| 电压(可选择) Voltage(Optional) | 3-24V   | 电流 Current       | 300MA max |

参考数据 (马达定义值): 12v 6000rpm 下表根据马达定义值测试, 数据只作为参考值

| 型号 Model         | Rated Speed<br>额定转速 | Max Speed<br>最高转速 | Max Rated Torque<br>额定容许力矩 | Max Instant Torque<br>瞬间容许力矩 | Reduction ratio<br>减速比 | Length<br>减速箱长 L1 | Overall Length<br>总长 L |
|------------------|---------------------|-------------------|----------------------------|------------------------------|------------------------|-------------------|------------------------|
|                  | rpm                 | rpm               | gf.cm                      | gf.cm                        |                        | mm                | mm                     |
| ZWBPD024024-4    | 1875                | 7500              | 15000                      | 45000                        | 4                      | 18.8              | 49.6                   |
| ZWBPD024024-6    | 1250                | 5000              | 15000                      | 45000                        | 6                      |                   |                        |
| ZWBPD024024-16   | 469                 | 1875              | 15000                      | 45000                        | 16                     | 24.7              | 55.5                   |
| ZWBPD024024-24   | 313                 | 1250              | 15000                      | 45000                        | 24                     |                   |                        |
| ZWBPD024024-36   | 208                 | 833               | 15000                      | 45000                        | 36                     |                   |                        |
| ZWBPD024024-64   | 117                 | 469               | 15000                      | 45000                        | 64                     |                   |                        |
| ZWBPD024024-96   | 78                  | 313               | 15000                      | 45000                        | 96                     | 31.7              | 62.5                   |
| ZWBPD024024-144  | 52                  | 208               | 15000                      | 45000                        | 144                    |                   |                        |
| ZWBPD024024-216  | 35                  | 139               | 15000                      | 45000                        | 216                    |                   |                        |
| ZWBPD024024-256  | 29                  | 117               | 15000                      | 45000                        | 256                    |                   |                        |
| ZWBPD024024-384  | 20                  | 78                | 15000                      | 45000                        | 384                    | 38.7              | 69.5                   |
| ZWBPD024024-576  | 13                  | 52                | 15000                      | 45000                        | 576                    |                   |                        |
| ZWBPD024024-864  | 9                   | 35                | 15000                      | 45000                        | 864                    |                   |                        |
| ZWBPD024024-1296 | 6                   | 23                | 15000                      | 45000                        | 1296                   |                   |                        |

注: 可根据客户要求定制 Can customize product as requirements