



RD2 Primary & Secondary Rotary Drive

Primary rotation with secondary linear movement 12mm and 24mm versions. The RD2 and RD224 ranges are low backlash, high precision drives providing continuous primary rotation and secondary linear axis movement.

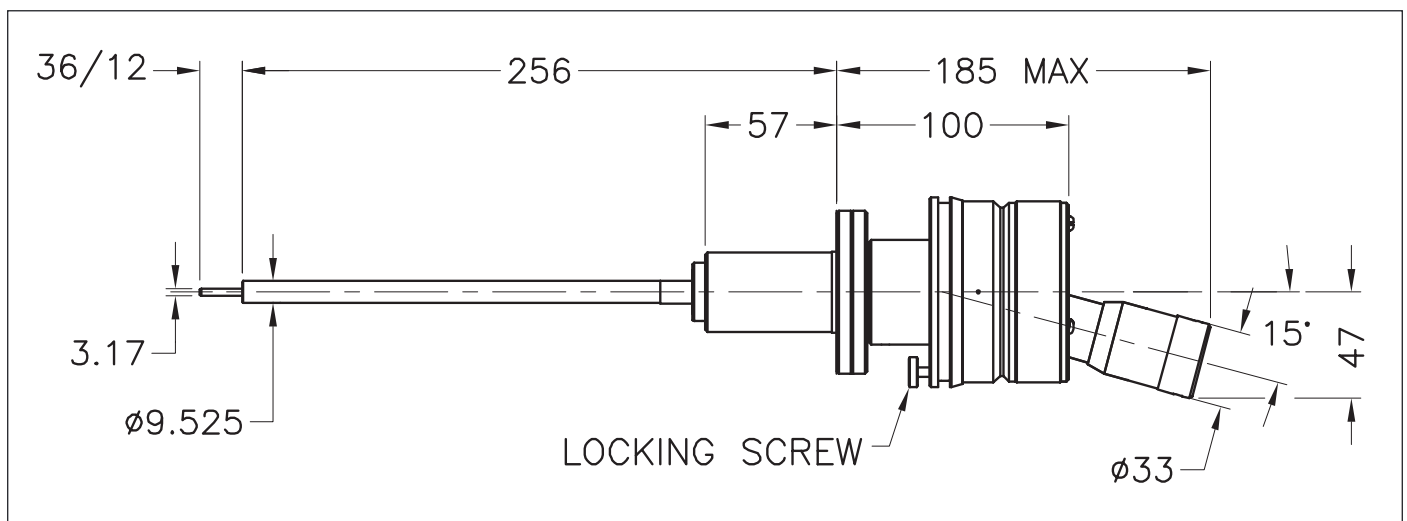


Product Overview

- Low backlash
- Continuous rotation to 500rpm
- 70mm OD flange
- Graduated handwheel with Vernier scale
- Axial Load: rotary shaft 40N
- Linear shaft movements of 12 and 24mm
- Long life bellows
- Bakeable to 230°C (motors removed)
- Stepper motor kits
- Encoder options

The RD2 uses the same primary axis movement as the RD1 and has the full RD1 options of extended shafts and motorisation. In addition, the RD2 is fitted with a high resolution actuator to give 12mm linear movement. This operates the azimuthal (R2) or tilt (R3) movements of most standard VACGEN sample holders. The standard linear resolution is 0.02mm, but angular graduations can be supplied. The secondary axis can be motorised to give 0.05 microns resolution in half step mode. Adjustable microswitches are included with the R2 motor kit.

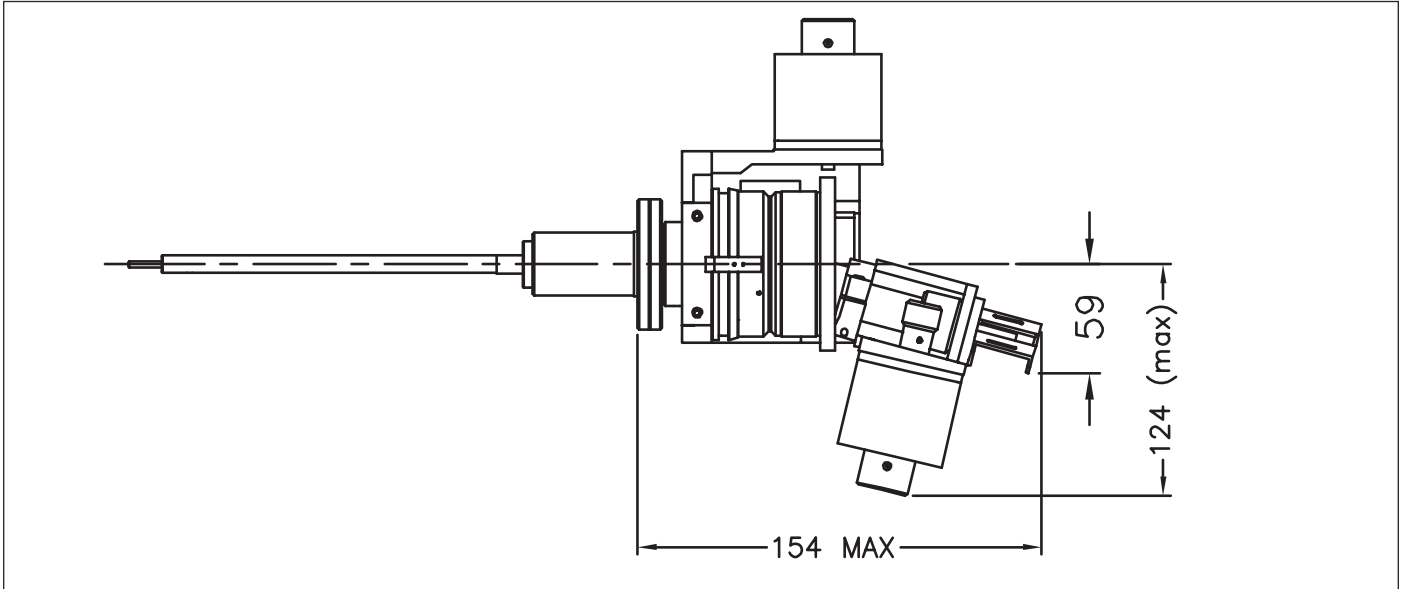
RD2 manual primary and secondary rotary drive





RD2 Primary & Secondary Rotary Drive

RD2 with both primary and secondary drive axis fitted with stepper motors



RD2 (Primary and Secondary) Series Rotary Drive

| Flange OD mm | Flange OD inch | Primary Rotation | Linear Secondary Motion | Resolution Primary Degrees | Resolution Secondary mm | Torque Primary | Torque Primary | Gearbox ratio | Order Code |
|---|----------------------|------------------|-------------------------|----------------------------|-------------------------|-------------------|-------------------|---------------|------------|
| 70 | 2.75 | Continuous* | 12mm | 0.1 | 0.02 | 0.5Nm at 500 rpm | 5Nm at 10 rpm | - | ZRD2 |
| 70 | 2.75 | Continuous* | 24mm | 0.1 | 0.02 | 0.5Nm at 500 rpm | 5Nm at 10 rpm | - | ZRD224 |
| Stepper Motor Kit Primary (R1) | Stepper Motor Kit R1 | Continuous* | - | 0.01 | - | 4Nm at 16 rpm max | 4Nm at 16 rpm max | - | ZRDPMKW |
| Stepper Motor + encoder Kit | Stepper Motor Kit R1 | Continuous* | - | 1.01 | - | 4Nm at 16 rpm max | 4Nm at 16 rpm max | - | ZRDPMKE |
| Primary (R1) Stepper Motor Kit secondary (R2) | Stepper Motor Kit R2 | - | max 24mm | 0.01 | 18 steps per 0.005 mm | - | - | 9:01 | ZRD5MKW |
| Stepper Motor + encoder secondary (R2) | Stepper Motor Kit R2 | - | max 24mm | 1.01 | 18 steps per 0.005 mm | - | - | 9:01 | ZRD5MKE |

* Continuous rotation where fixtures on the end of the rotary drive allow this