

**Rotary drive EDE 110**

A product of BALZERS AG, Balzers

Issued: Sept. 1975 / DN 6522

**1. APPLICATION**

The EDE 110 rotary drive is used for the crucible movements (rotation, oscillation and positioning) in the electron beam guns ESQ 110 and ESQ 200. It is connected to the EKS evaporation control unit.

**2. TECHNICAL DATA**

Voltage: 24 V, DC  
Current: max. 0.5 A

The torque necessary for the source is approx. 15 cmkp.

The coupling is adjusted at approx. 40 cmkp.

The torque for the drive shaft must not exceed 90 cmkp.

**3. INSTALLATION**

- a. The rotary drive is flanged to the source lower section. The red PVC flange replaces the ball-bearing holder flange.
- b. Fasten the PVC flange (with central hole and spigot) with four M4 hollow screws.
- c. Attach the rotary drive assembly, consisting of motor holder plate and switch plate with 4 cap screws to the mounted PVC flange, via the 4 distance rods (if necessary, lift crucible lower section together with crucible approx. 2 cm). Slightly twisting, push it into the coupling section (keyway) and fasten the crucible section with the knurled nut (tighten the two M5 fastening screws). Axial clearance approx. 0.4 – 0.6 mm.
- d. Set the exact crucible position on the positioning cam. With the oscillating crucible, note the "Oscillation" position!
- e. Push the grey cover tube over the drive unit and fasten it with four M3 socket head screws.

The rotation clearance of the crucible is approx. 4 – 6 mm relative to the crucible periphery, resulting from the keyway connections and the drive clearance. This does not affect the positioning accuracy of the crucible, because the direction of rotation is not changed during positioning.

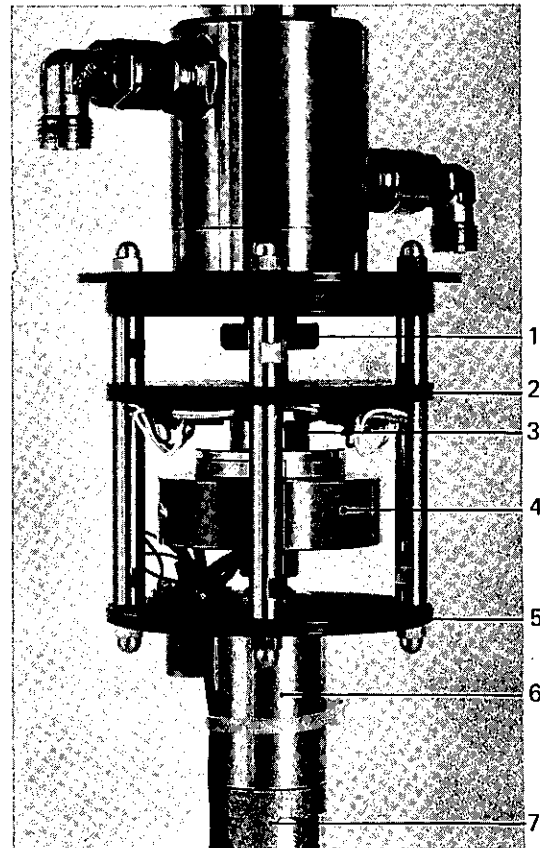


Fig. 1 Rotary drive EDE 110

1. Knurled nut with washer
2. Switch plate
3. Positioning cam
4. Coupling
5. Motor holder plate
6. Gear box
7. Motor

**4. SPARE PARTS**

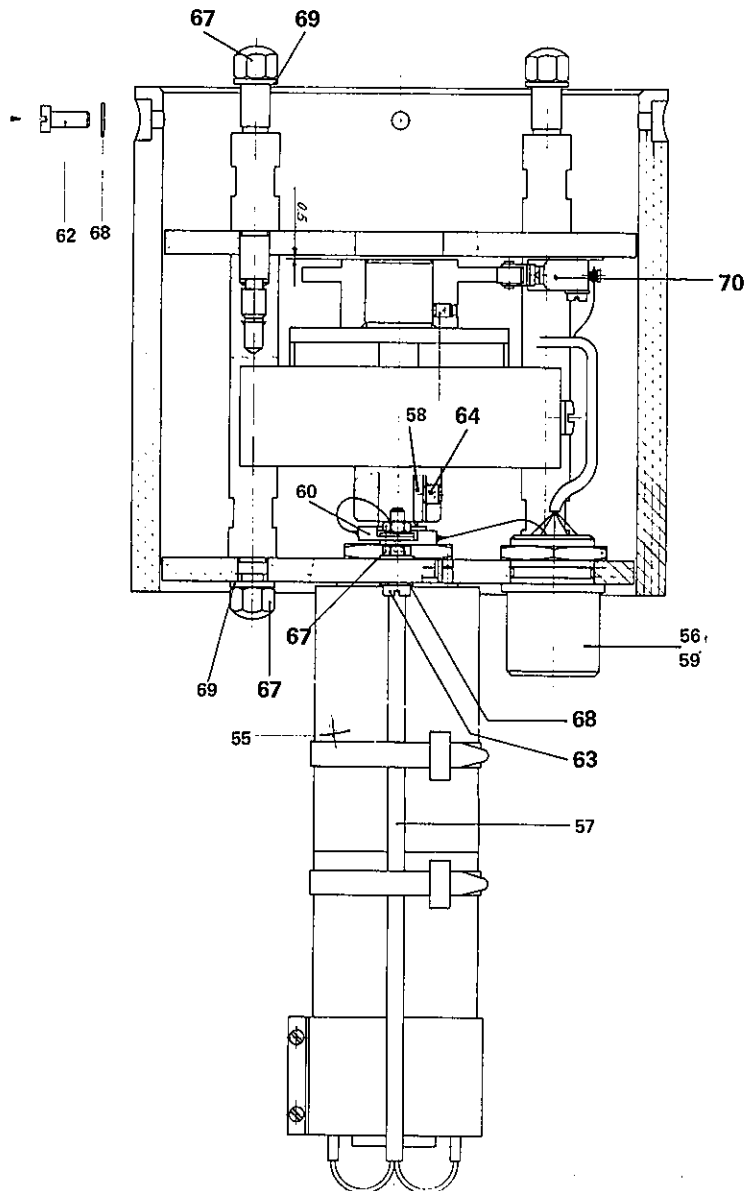
Please order your spare parts according to the enclosed spare parts list.

Always state type and serial number as indicated on the name plate of the unit.

**Ordering example:**

1 motor, 24 V, DC, n = 4410 : 1, Code No. 391 238, as to spare parts list BB 800 041 E / 3, item 55

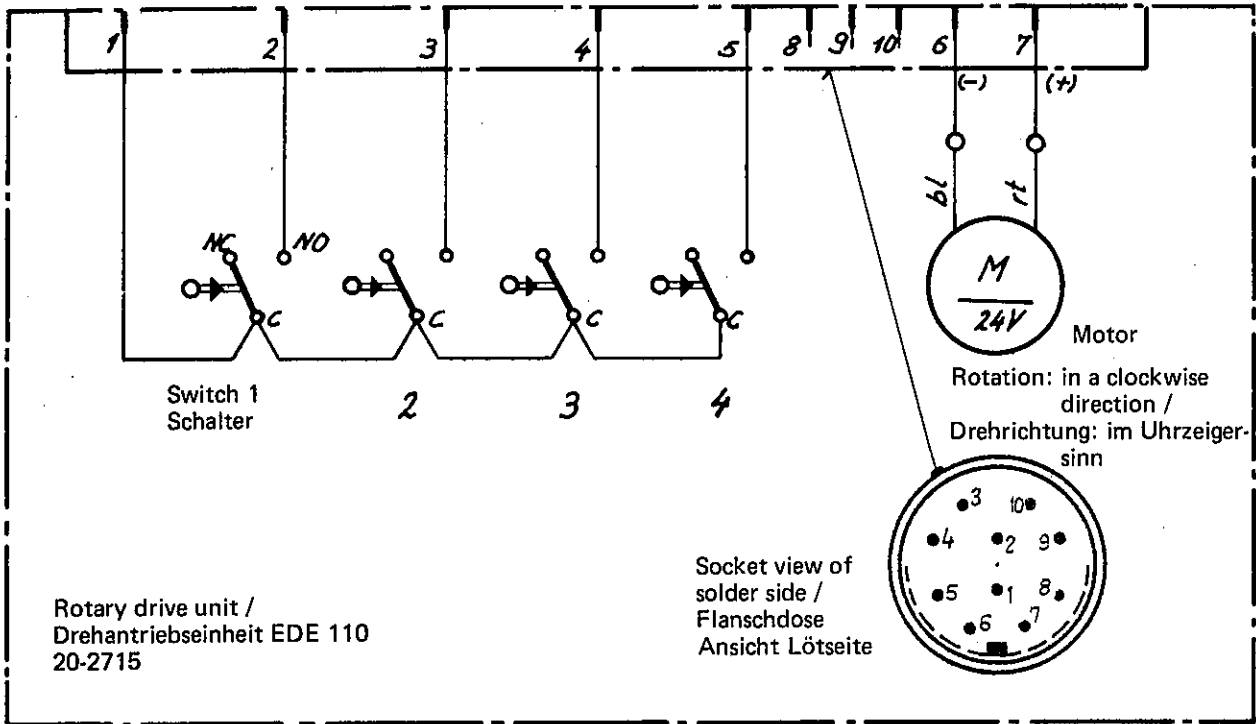
	Description Teil	Item Pos.	Code-No. Bestell-Nr.		S	Remarks Bemerkungen
1	Motor 24 V, DC,4410:1	55	BO 391 238			
1	Socket/Flanschdose DB 105 Z 062	56	B 4722 531 FD			
1	Hose/Schlauch 3/3,9 x 200	57	B 4616 117 00			
1	Key/Keil	58	20-3015 P1			
1	Cable/Kabel	59	20-2824 R1			
1	Cable shoe/Kabelschuh SOL 0,25 – 1,5/3,7	60	B 4644 203			
		61				
4	Screw/Schraube M3 x 8	62	N 3052 191 X			Inox
2	Screw/Schraube M3 x 16	63	N 3052 198 X			"
2	Threaded pin/Gewindestift M3 x 4	64	N 3208 186 X			"
1	Threaded pin/Gewindestift M4 x 4	65	N 3208 247 X			"
4	Nut/Mutter M3	66	N 3415 037 X			"
8	Nut/Mutter M5	67	N 3457 041 X			"
10	Washer/Scheibe 3,2 x 7 x 0,5	68	N 3502 412 X			"
8	Washer/Scheibe 5,3 x 10 x 1	69	N 3502 416 X			"
4	Switch / Schalter 111 SM2 - T	70	B 4746 136 BA			



Spare Parts for / Ersatzteile zu

Rotary drive unit/Antriebseinheit EDE 110 20-2715 R1

BB 800 041 E / 3 a



Switch plate seen from the motor /  
 Schalterplatte vom Motor aus gesehen

