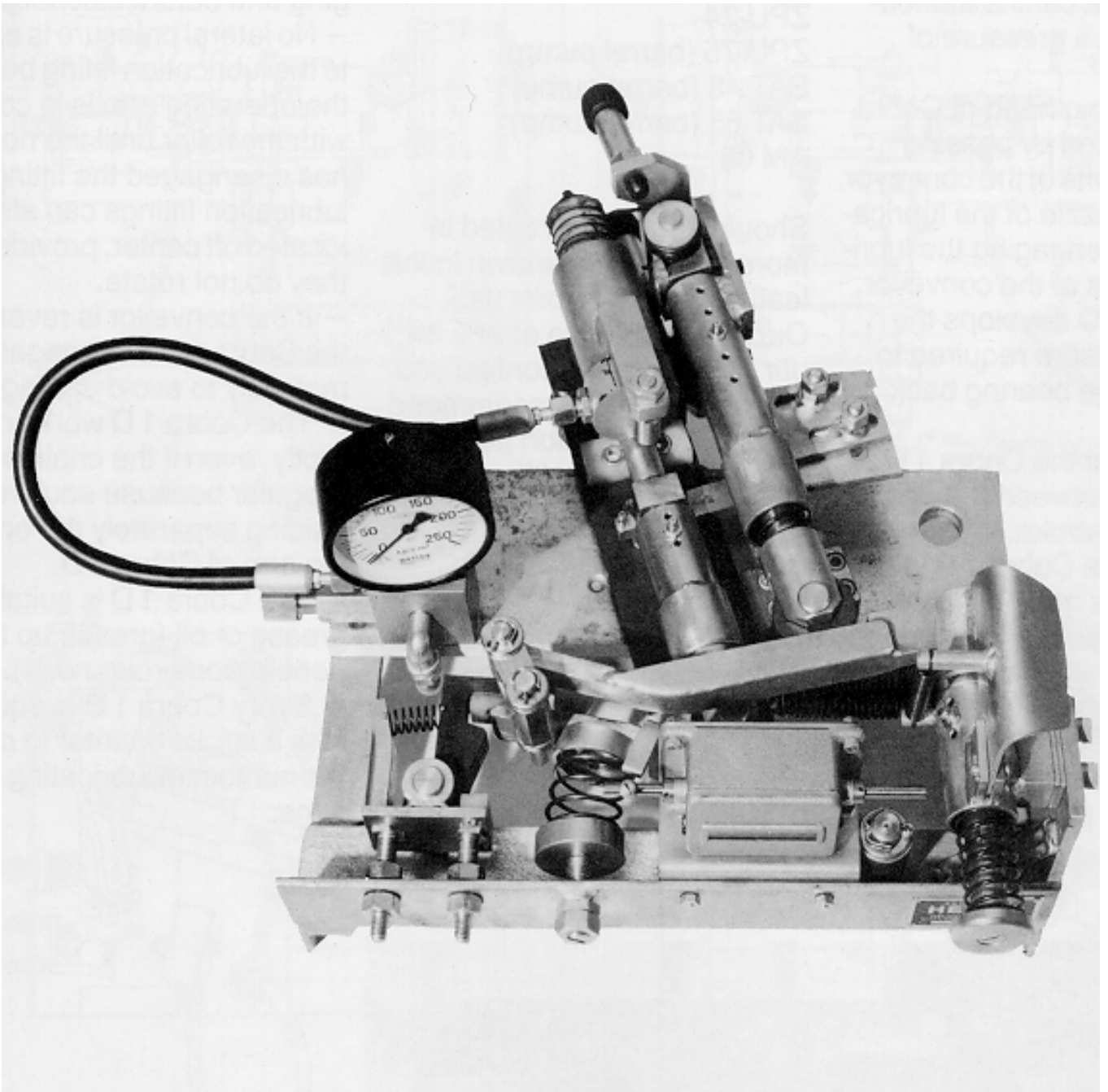
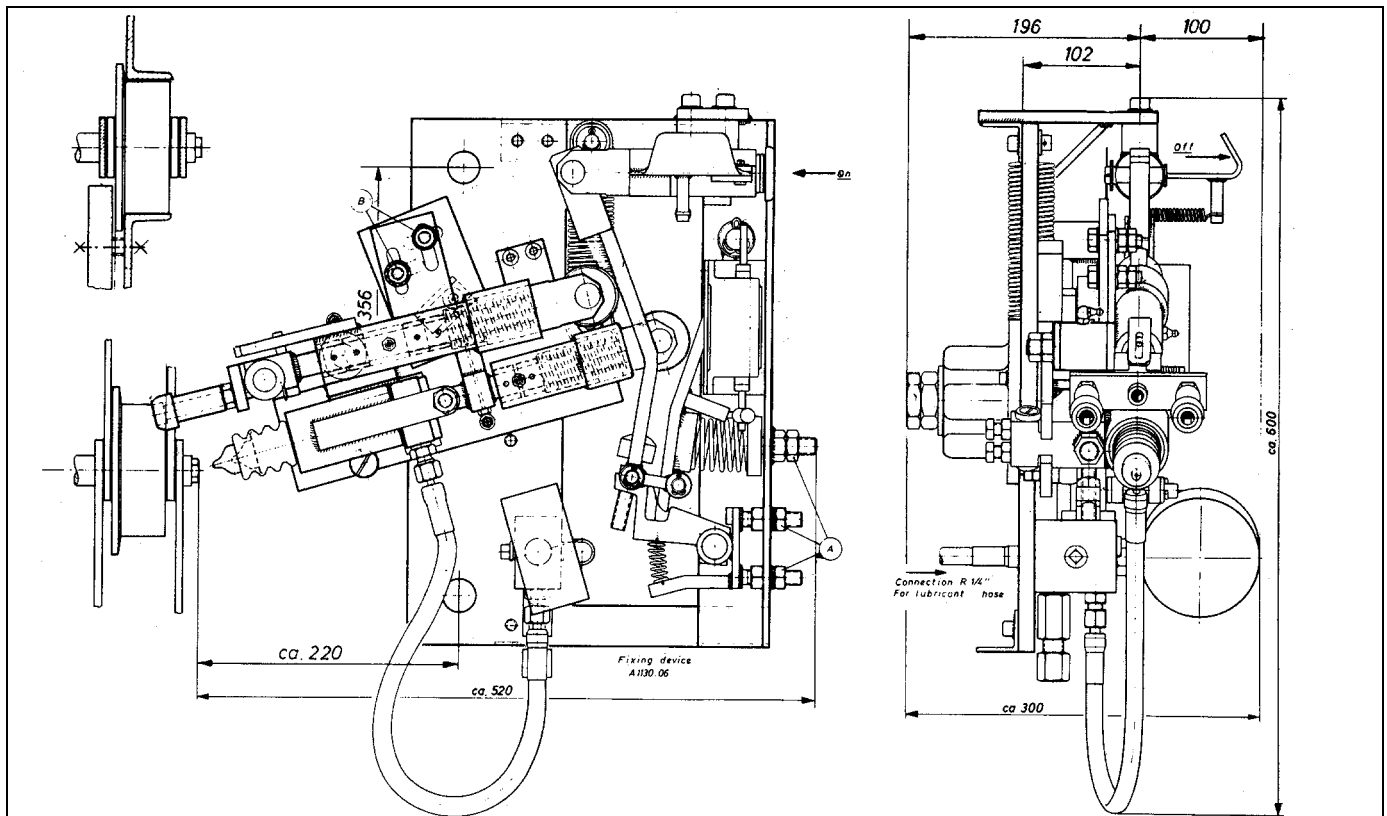


***Lubricating Device Model COBRA 1 D Mechanically Controlled  
for Moving Lubrication Points***



3000A95



4010A95

**Application range:**

Lubrication of track rollers or middle bars of heavy-duty conveyor units in:

- Mining (plate conveyors)
- Steel and iron industry (coil conveyor belts)
- Cement industry (clinker transport and crusher discharging belt conveyors)
- Automotive industry (endless conveyors, car body transport conveyors, e.g. in immersion painting systems)
- Sugar industry (beet transport conveyors)

**Mode of operation:**

Each conveyor requires 2 COBRA units:

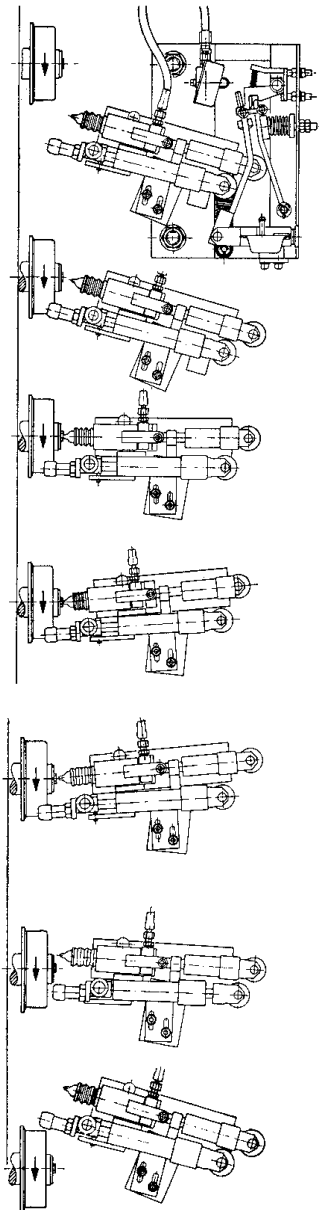
One unit for the left-hand side, and one unit for the right-hand side.

The lubricant is supplied to the COBRA unit by a reservoir pump or a barrel pump.

**Advantages:**

- Metered application of lubricants, even if they are highly viscous, through lubrication fittings at the conveyor belt directly into the bearing unit.
- The nipple can also be located off center, if the roller shafts do not rotate.
- The Cobra 1D works correctly even if the chain pitch is irregular because each roller is guiding separately the operating arm of Cobra 1 D
- If the conveyor is reversed the Cobra 1D disengages automatically to avoid damage.
- Stroke counter to control the number of lubricating operations
- Remote start of the unit (pneumatically) available.

**Operation:**



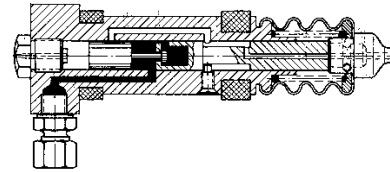
1. Roller approaches actuating arm of Cobra unit
2. Roller contacts the operating arm of Cobra unit
3. Roller begins to actuate the Cobra unit and the nozzle of the Cobra unit is centering onto the lubricating nipple
4. Roller continues to operate the Cobra unit. The mechanical actuation of the unit pushes the lubricating nozzle towards the grease nipple on the roller and after contact, lubricant is discharged into the grease nipple
5. Roller continues to operate the actuating arm of the Cobra unit and the lubricating nozzle is disconnected from the grease nipple. At this point, the lubricating head of the Cobra unit will be recharged with lubricant from the refilling pump unit.
6. The actuating arm of the Cobra unit has been released from the roller and the Cobra unit automatically and mechanically returns to the starting position.
7. The Cobra unit is ready to be actuated by the following roller.

Cobr\_B01

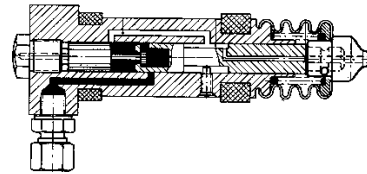
Cobr\_B03

Cobr\_B02

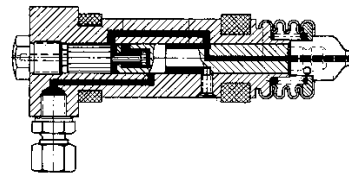
**Operation of lubricating head**



Lubricant being charged into the measuring chamber (by a remote sited lubricant supply pump).



Initial actuation of the lubricating nozzle closes the delivery port to the measuring chamber



Further actuation of the lubricating nozzle opens the transfer port within the measuring chamber, to direct the lubricant through the centre of the nozzle to the lubricating point

**Permitted Conveyor Operating Speeds**

The maximum recommended lubricating frequency for the Cobra units is two lubrication cycles per second. Therefore, the maximum permissible chain speed, as a function of chain pitch, is calculated as follows:

max. lubricating frequency :  $Z = 2/s$

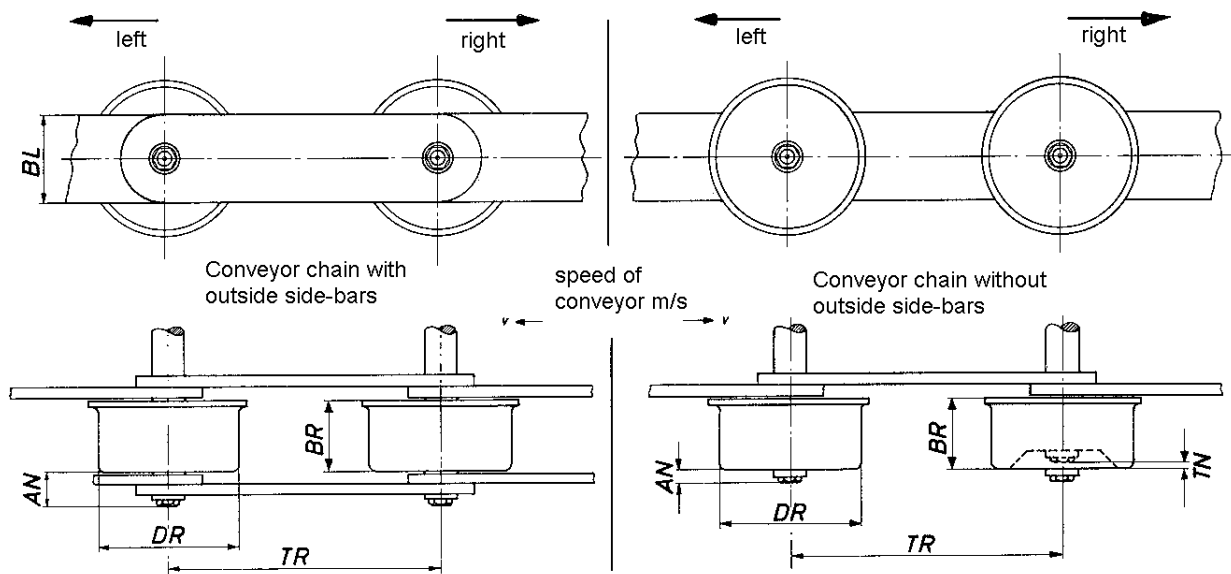
Chain pitch:  $t [m]$

Chain speed:  $V_{zul} [m/s]$

$V_{zul} = t \times Z$

On inquiries or orders, please state the following data:

- BL = width of side bar
- AN = distance between nipple and roller
- DR = diameter of roller
- TR = chain pitch
- BR = width of roller
- TN = distance between nipple and roller face (only on rollers with immersed nipples)
- V = speed of conveyor
- Direction of conveyor (to left/to right)



Cobr\_B04