

Cross

Together with other vacuum components, the cross (378 015) and/or the T-piece (378 005) enable assembly of a metal adapter (see Fig. 2) for flanging onto the suction line of a vacuum pump (e.g. rotary-vane vacuum pump D 1.6 B, (378 75).

The adapter is utilized in vacuum arrangements in which e.g. the use of an air inlet valve, a cut-off device or a pressure-measuring apparatus (e.g. 378 500/501/502) is necessary or recommended (e.g. in experiments with discharge tubes 554 16, 554 36, 555 222).

For small-flange vacuum components for narrower tube diameters, the two sizes DN 10 KF and DN 16 KF are standardized. The numbers stand for the inside diameter of the flange in millimeters. For vacuum-tight connection of the two components, a centering ring is used (378 045 or 378 040) (see Fig. 2), and this joint is secured mechanically using a clamping ring (378 050). Note that the centering rings must fit the flange dimensions; the clamping rings are universal.

With the exception of the air inlet valve DN 10 KF (378 771), all Leybold Didactic vacuum components are designed in the commonly used size DN 16 KF. However, the program also includes a variety centering rings and blank flanges to permit connection to DN 10 KF vacuum components.

Available components

- ① Cross DN 16 KF 378 015
T-piece DN 16 KF 378 005
- ② Air inlet valve DN 10 KF 378 771
for venting the vacuum recipient
- ③ Fine vacuum ball valve DN 16 KF 378 777
- ④ Variable leak valve DN 16 KF 378 776

- ⑤ Blank flanges
Blank flange DN 16 KF 378 065
for vacuum-tight sealing of
small flange DN 16 KF
Blank flange DN 10 KF 378 060
for vacuum-tight sealing of
small flange DN 16 KF
- ⑥ Small flange DN 16 KF with hose nozzle 378 031
for matching small-flange components to vacuum tubing
- ⑦ Male ground joint ST 19/26, DN 16 KF 378 023
for connecting components with female ground joint
(e.g. discharge tubes 554 16 and 554 36)
- ⑧ Lengthened intake port DN 16 KF 379 201
for attaching an adapter to a pump
mounted on the base plate of the pump trolley (598 13)
- ⑨ Clamping ring DN 10/16 KF 378 050
for mechanically securing small-flange joints DN 10 KF and
DN 16 KF
- ⑩ Centering rings
Centering ring DN 16 KF 378 045
for connecting two small flanges DN 16 KF
Centering ring (adapter) DN 10/16 KF 378 040
for connecting small flange DN 10 KF
to small flange DN 16 KF
Centering ring DN 10 KF 378 041
for connecting two small flanges DN 16 KF

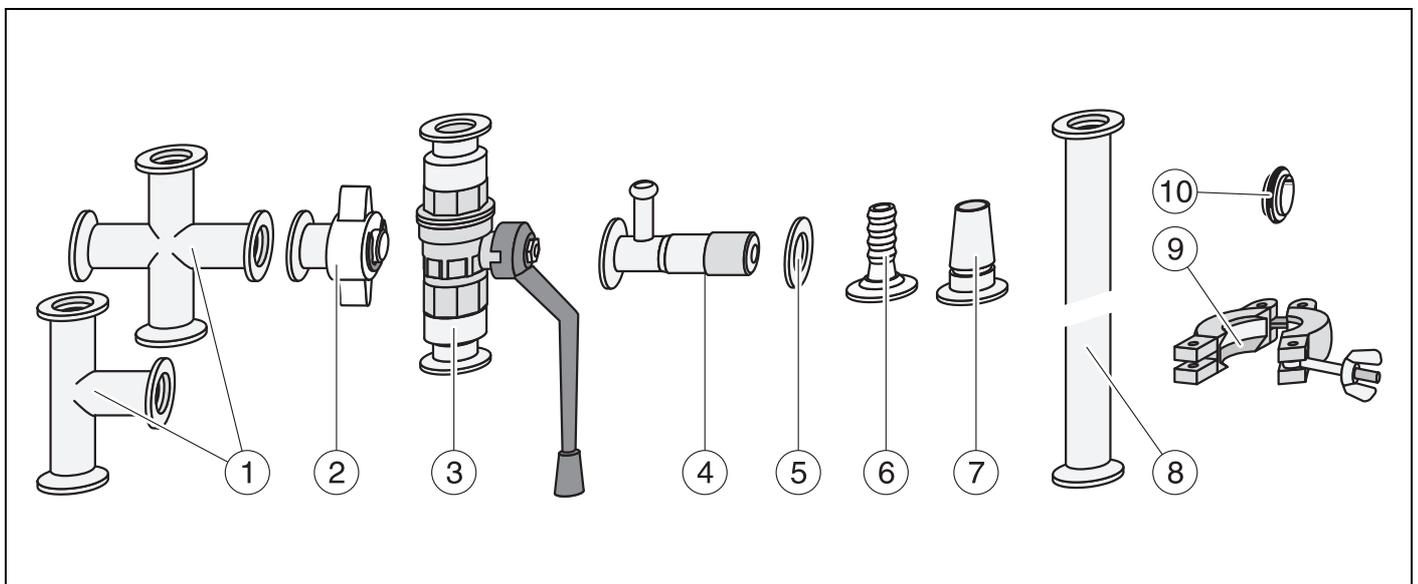


Fig 1

For filling the recipient with a defined quantity of air or gases. Mount the elements of the adapter on the small flange on the suction side of the pump - if necessary via the lengthened intake port ⑧ - as shown in Fig. 2 in accordance with the individual

experiment requirements. Seal all connection points which are not occupied by a functional element of the vacuum apparatus using a blank flange ⑤.

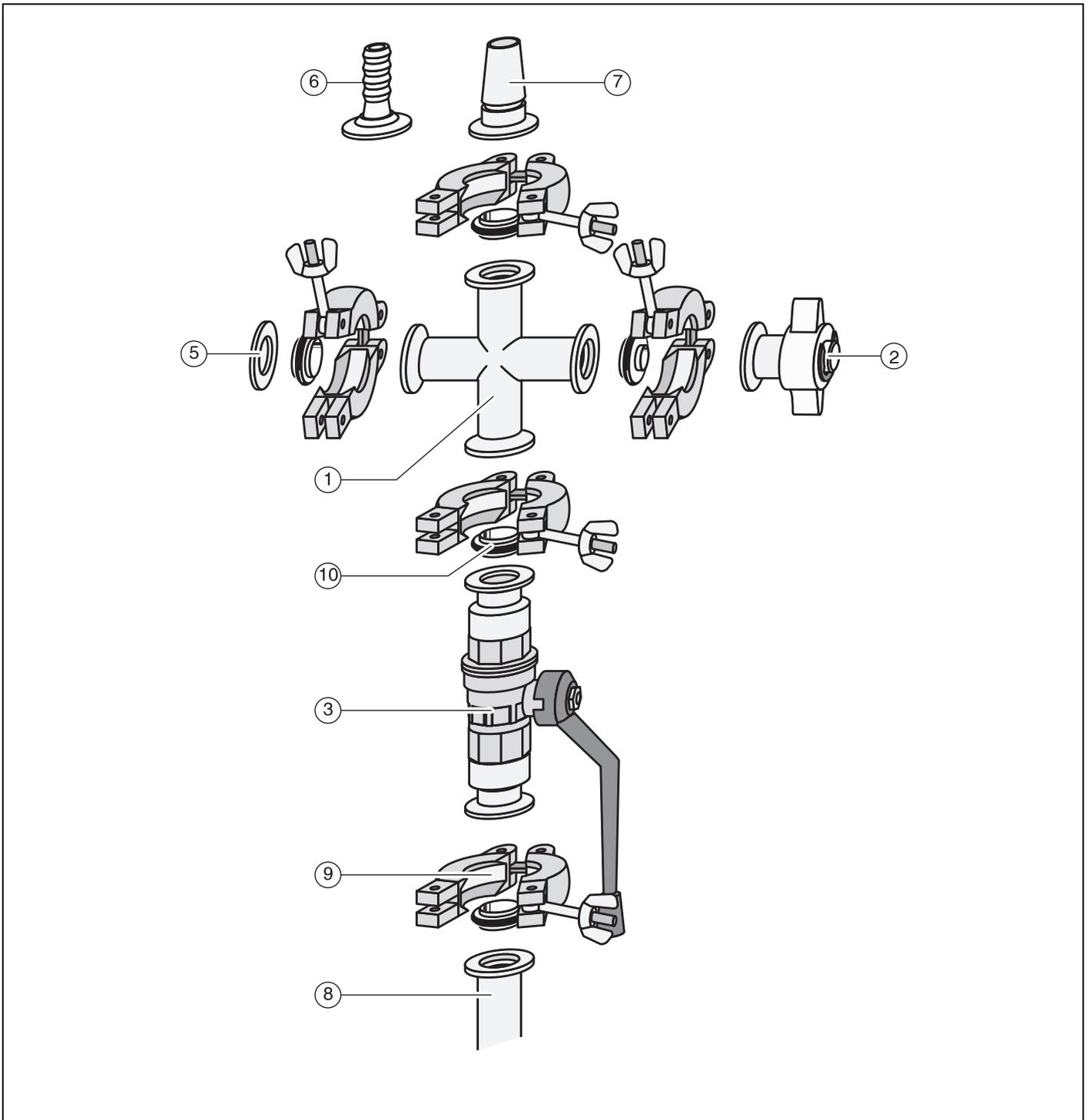


Fig. 2