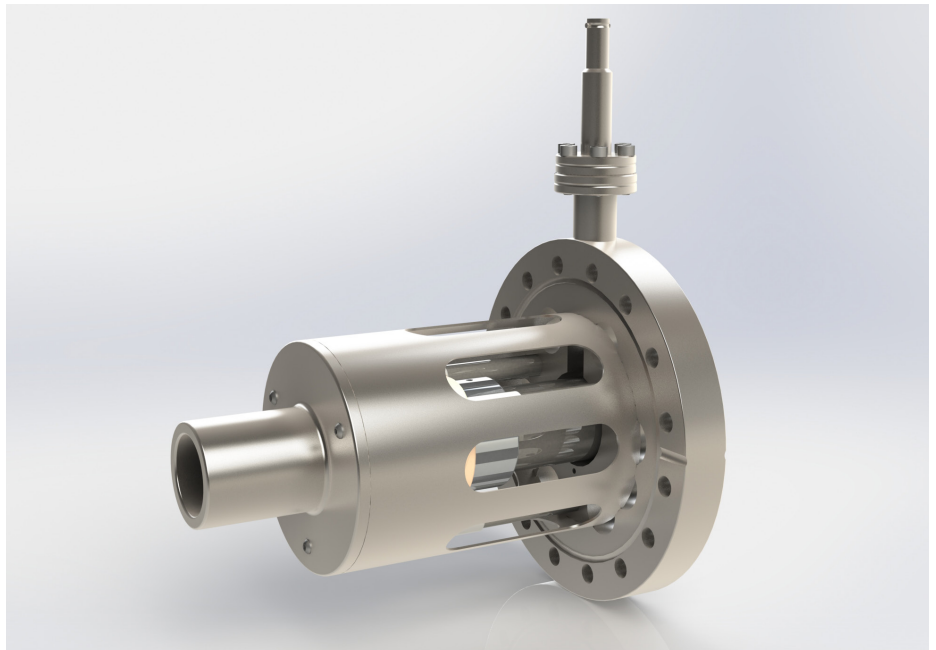


EINZEL LENS

Einzel lenses are ion-optical elements used to guide and focus charged particle beams without changing their kinetic energy.

The einzel lens consists of three cylindrical electrodes. Focusing of the beam is achieved by applying a high voltage to the central electrode.

They can be used in broad pressure ranges, down to ultra-high vacuum conditions.



Einzel lens option attached to a DN100CF flange.

Further reading and related products:
https://en.wikipedia.org/wiki/Einzel_lens
Electrostatic deflector

Special Features:

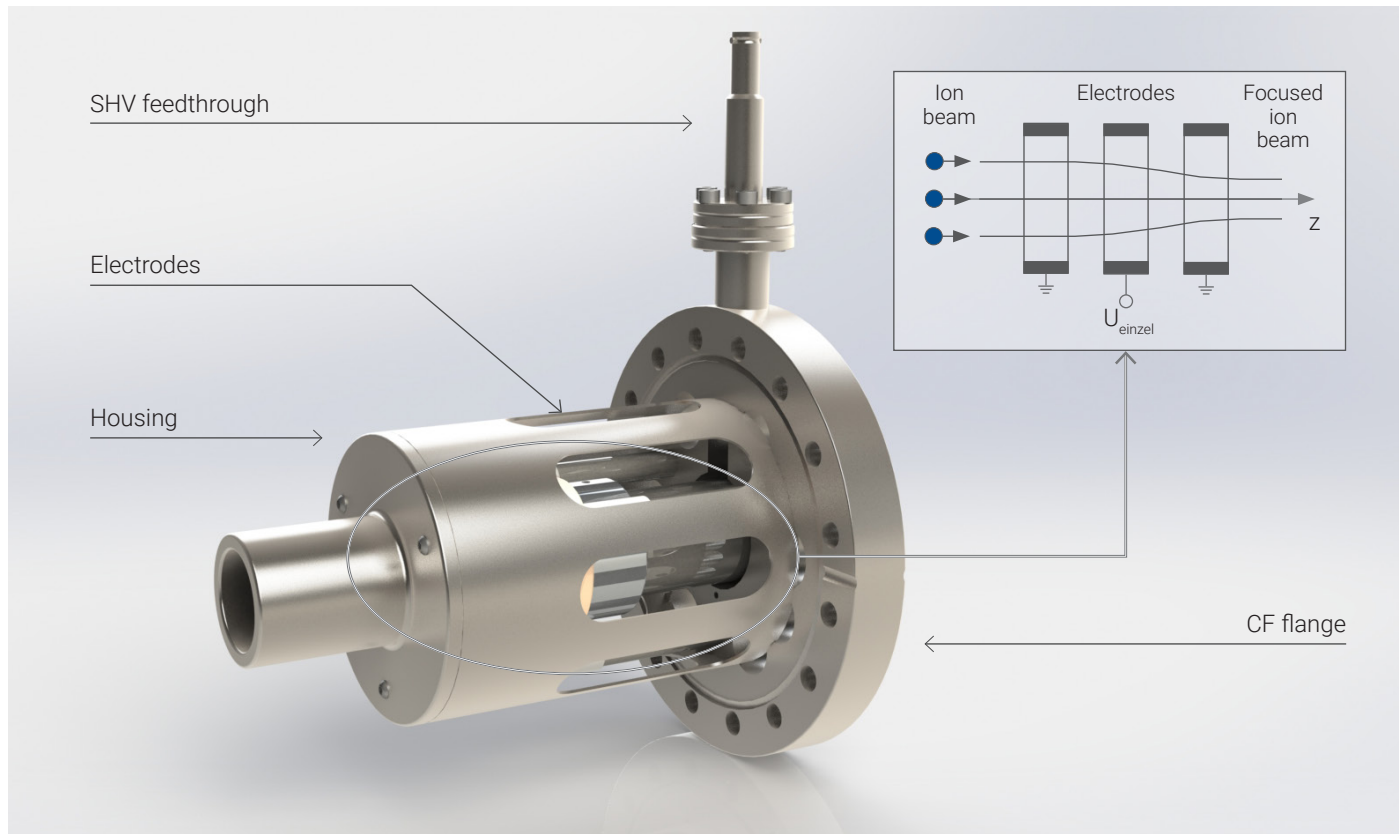
- electrostatic beam focusing for a broad range of charged particle beams varying in beam diameter and energy
- lens voltages of up to ± 30 kV, higher lens voltages up to ± 50 kV available on request
- electrodes of different diameters and with variable spacing available
- multiple solutions regarding size and attachment of electrodes possible
- flange-centered design allows for excellent combination with other charged particle beamline components
- electrical feedthroughs for all voltages

Optional Supplementing Devices:

- power supply for lens potential
- optional control software
- can be combined with Wien filter module for optimum particle beam separation and guidance

Please do not hesitate to contact us to find a solution suitable for your special application.

EINZEL LENS



Labeled einzel lens option with standard DN100CF flange and schematic sketch of the einzel lens' operating principle in the upper right corner.

TECHNICAL DATA

| | |
|--|---|
| category | charged particle beam optics |
| pressure operating range | down to $1 \cdot 10^{-10}$ mbar |
| maximum electrode voltage | configurations up to ± 30 kV, or on customer request |
| mounting flange | DN100CF (standard), other flange dimensions and types on customer request |
| maximum bakeout temperature | 150 °C |
| approx. box size (length x width x height) | 190 mm x 152 mm x 250 mm (DN100CF flange) |