

## Flexible handling parts

# Worm and starwheel can be adjusted for a different bottle diameter

**B**everage diversity is rising, bottle sizes and bottle shapes vary with the product category and target group involved. In bottling operations for still and sparkling wines, particularly, relatively small batches sometimes have to be run in multifarious container variations of round and special-shaped bottles, all in quick succession. In the small and medium output ranges as well. So it's becoming all the more important to make change-overs at the machines as easy as possible, to ensure fast make-ready and thus reduce downtimes or avoid them altogether.

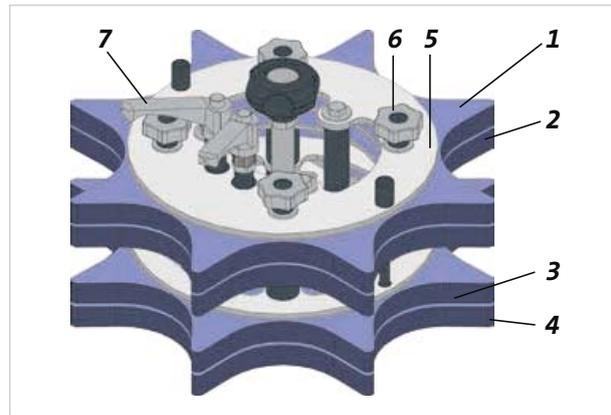
For this purpose, Kosme has progressed two development thrusts geared to making filler change-overs substantially easier. Firstly, an adjustable transport worm, through which the containers enter and leave the filler. Secondly, the starwheel can also be quickly and easily adjusted to suit a new container shape.

### Manually adjustable transport worm

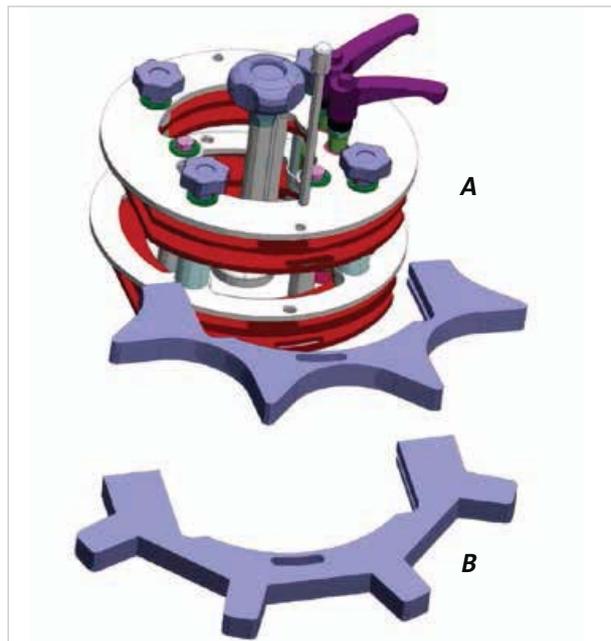
The transport worm can be height-adjusted by simple manipulation at a positioning wheel for guiding the bottles effectively. This means it's no longer necessary to replace the worm when changing over to a new bottle diameter, which would be significantly more time-consuming. The adjustable worm is available in lengths ranging from 450 to 800 millimetres for cylindrical bottles. Depending on the version involved, bottle diameters of 60 to 80 millimetres, 70 to 90 millimetres or 80 to 100 millimetres can be handled with just a single worm. The adjustable transport worm can also be retrofitted to existing fillers.

### A single starwheel for many bottle diameters

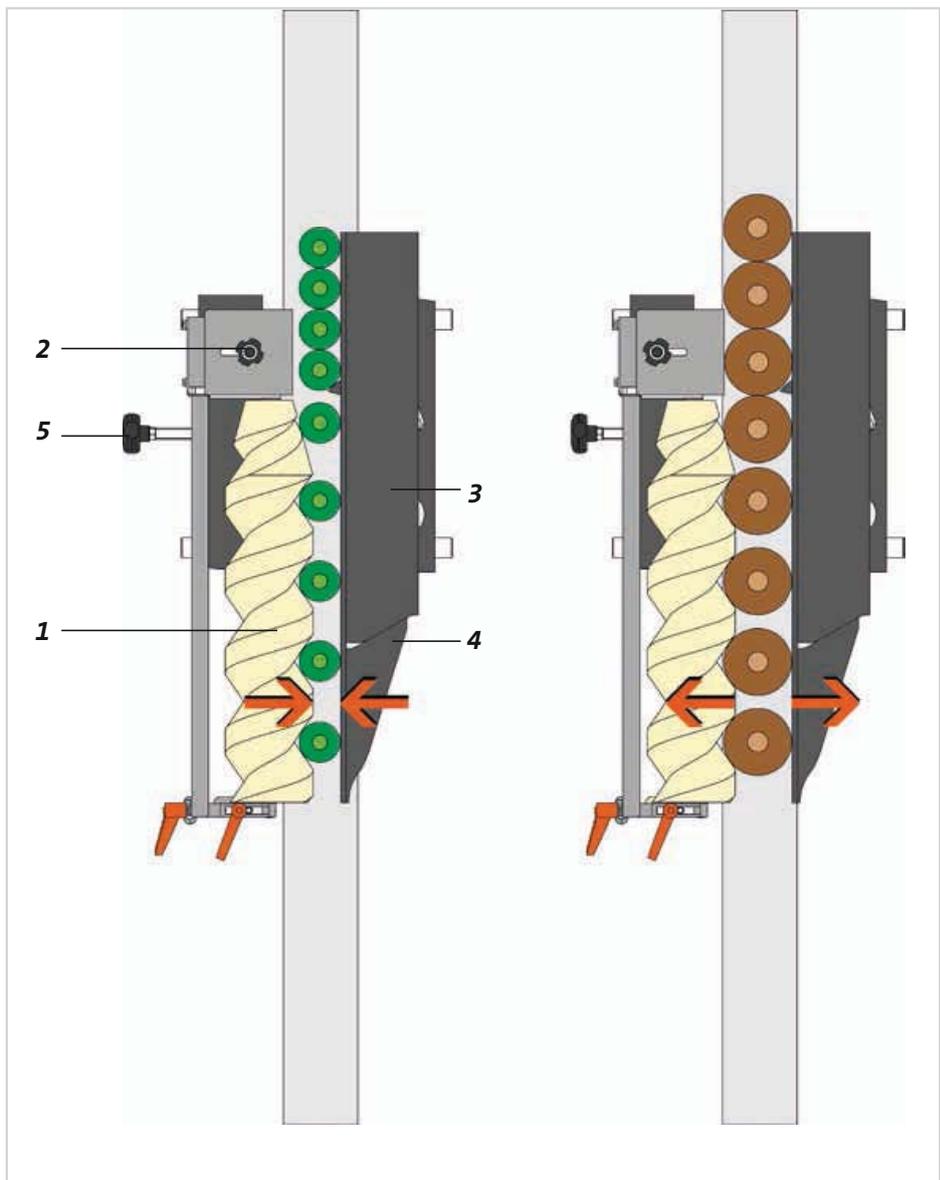
At the adjustable starwheel, Kosme has provided four starwheel disks, which are arranged on top of each other, and can be mutually repositioned so as to form smaller or larger open diameters. This enables bottle diameters from 50 to 100 ml



1. *Top part of the starwheel*
2. *Intermediate layer, top part of the starwheel*
3. *Intermediate layer, bottom part of the starwheel*
4. *Bottom part of the starwheel*
5. *Starwheel hub*
6. *Fastening screw*
7. *Adjusting lever*



- A. *Starwheel component for cylindrical containers*
- B. *Starwheel component for special-shaped containers*



- 1. Transport worm
- 2. Worm guide
- 3. Counter-guide
- 4. Contrast spring bolt
- 5. Depth regulator for worm

to be handled for cylindrical containers without replacing the starwheel. Using a simple manual adjustment to the starwheel disks, a single starwheel suffices for handling many different container diameters. The adjustable starwheel will be offered in sizes ranging from 240 to 420 millimetres in diameter. With these newly developed

products, Kosme makes life significantly easier for the operators, and upgrades the flexibility of bottling lines.

*Franco Tomba  
Krones Garda, Italy  
Tel. +39 045 62082-37*