

Hydro-K Fitting Guide

It is essential to use the Hydro-K soft fitting set.

FITTING PROCEDURE

- Full refraction and eye examination.
- Keratometry/Topography – trial lens selection can be based on keratometry readings (Ks) and topography (as a combination or separately) or from inspection of the corneal profile from the side, depending on the lens type and the severity of the keratoconus. Mild keratoconus with a central cone can be fitted based on Ks, but Keratometry readings will be of limited use if the cornea is distorted, often there can be a large difference in Ks. The average K can be used as a starting point for the base curve of the initial trial lens. In the case of severe cones central Ks may be of little use.
- Select the initial trial lens from the fitting set according to the below recommendation.

K Readings (mm)	Select BOZR (mm)	Total Diameter (mm)	Choice of Power in fitting set (D)
Less than 6.00	8.00	14.50	-14.00 and -12.00
6.00 to 6.50	8.20	14.50	-10.00 and -8.00
6.50 to 6.80	8.40	14.50	-6.00 and -4.00
6.80 to 7.20	8.60	14.50	-2.00 and Plano

- Insert trial lens and allow to settle for 5-10 minutes.

- Carry out an over-refraction and order an exchange lens if required.
- If there is rotation and a sphero-cylindrical over-refraction with a different axis, it may be necessary to contact us to assist with calculations.
- If the lens is not stable, then the overall diameter can be increased, or the radius can be steepened to improve the fit - please see fitting examples.

Modality

Hydro-K lenses are designed to last up to 12 months. The lenses may need to be replaced more frequently due to the patient's wear and care, this is at the discretion of the practitioner.

Care

Hydrogen peroxide systems and multipurpose systems may be used.

Lens Fit

Good Fit

- Comfortable.
- Central position.
- If bubbles form under lens on insertion, these should settle within 2-3 minutes.
- Vertical movement of approximately 1.00mm after a blink.
- Good recovery on push-up test.
- Orientation marks should be vertical.

Flat Fit

- May give poor centration.
- Can cause discomfort.
- Excessive movement on blink – greater than 1.00mm.
- Lens drops significantly on upward gaze.
- If excessive movement but good centration, allow to settle for longer.

If lens displays any of the above characteristics, try a steeper base curve (if available).

Steep Fit

- Less than 0.5mm movement with blink.
- Large bubbles may be evident.
- Lens rotating.
- Resists push up test.

If lens displays as any of the above characteristics, try a flatter base curve (if available).

When a good fit is achieved, allow the lens to settle for 20-25 minutes and then carry out an over-refraction to establish the sphere, cylinder and axis required. Assess the position of the toric markings and measure the direction and angle of rotation.

Order a lens stating:

- The base curve and the power of the ideal fit trial lens used.
- The over-refraction result and the direction of the orientation mark.
- Back vertex distance for the over-refraction.

If no cylinder is found, then please order the HydroLens – see Hydro Range fitting guide

Good fit - Primary Position



Good fit - Nasal Position



Steep fit - Primary Position



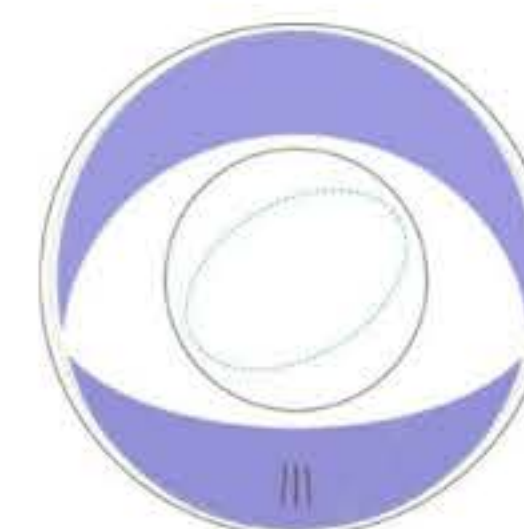
Steep fit - Nasal Position



Flat fit - Primary Position



Flat fit - Nasal Position



Toric markings on the inferior part of the lens 15° apart. Central line should sit at 6 o'clock”