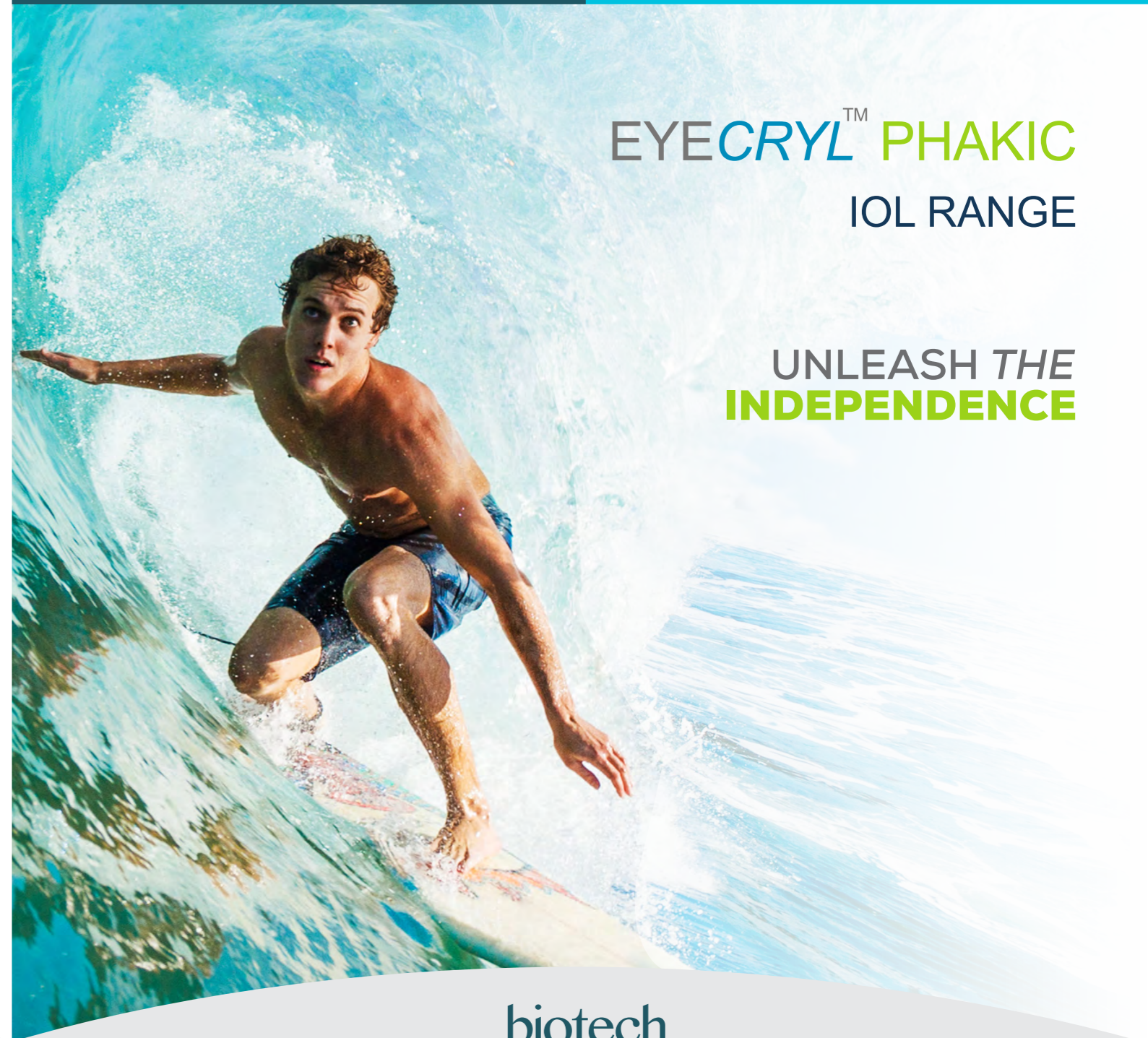




**TECNOIMAGEN**  
www.tecnoimagen.com.ar | 0810 333 8273



EYECRYL™ PHAKIC  
IOL RANGE

UNLEASH *THE*  
**INDEPENDENCE**



# EYECRYL™ PHAKIC

## IOLs Range



The word "Phakic" describes the state of the eye that still has its natural (crystalline) IOL intact.

EYECRYL™ PHAKIC range of IOLs are posterior chamber phakic IOLs, manufactured from hydrophilic material having aspheric optic with Zero Spherical Aberration. EYECRYL™ PHAKIC range of IOLs are indicated in phakic adults for treatment of low to high Myopia. The eye's natural IOL is not removed, so patient can retain their pre-existing ability to focus objects at various distances.

EYECRYL™ PHAKIC range of IOLs provide clearer & sharper vision by making your patient's life more joyful. Patients can experience great enhancement in vision immediately after the implantation of EYECRYL™ PHAKIC range of IOLs. The ease of implantation and the post-operative stability makes it stand out in the segment of Phakic IOLs.

### Indications

- Patients having stable Myopic error
- LASIK / PRK rejects, high Myopia, thin Cornea, dry eye etc.
- Stabilized central Keratoconus
- Post Radial Keratotomy
- EYECRYL™ PHAKIC TORIC is indicated in phakic adults having low to high myopia with co-existing astigmatism



## Contra-indications

- ACD < 2.8 mm (from Endothelium)
- Progressive refractive error
- Corneal / Endothelial pathology
- Retinal pathology
- Glaucoma
- Narrow AC angle
- Uveitis
- Cataract or capsular opacification
- Progressive Keratoconus
- Other ocular pathologies
- Previous ocular surgeries
- Age < 18 years

## Features of EYECRYL™ PHAKIC IOL

- Peripheral Iridectomy not required
- Excellent positional stability
- Higher patient comfort & satisfaction
- Predictable outcomes
- Low to High Myopic correction
- Aspheric optic with zero aberration
- Proven EYECRYL platform

## Features of EYECRYL™ PHAKIC TORIC IOL

(In addition to features of EYECRYL™ PHAKIC IOL)

- Excellent rotational stability
- Wide range of astigmatic correction
- Predictable outcomes



## Advantages of EYECRYL™ PHAKIC IOL

- Excellent refractive results
- Excellent stability of refraction
- Fast visual recovery
- Sharp vision with excellent contrast sensitivity in all lighting conditions
- Familiar surgical technique for Anterior Segment surgeons
- Reversibility
- Can be implanted through 2.8 mm incision size

## EYECRYL™ PHAKIC TORIC IOL

(In addition to features of EYECRYL™ PHAKIC IOL)

- Excellent astigmatic correction
- More ease in placement of IOL with visible toric axis marks on periphery of optic



## Increased patient comfort

As a part of innovative design, there is a hole in the center part of EYECRYL™ PHAKIC range of IOLs. The size of hole facilitates natural passage for Aqueous Humor. So, there is no increase in Intra-ocular pressure, which eliminates the requirement of YAG/Surgical Peripheral Iridectomy (PI). The optimized hole size does not affect the visual performance of IOL and smooth edges of hole reduce chances of occurrence of glare and halos. Thus, patient's comfort level is increased with reduction in surgery time.

## Thin corneas, not a problem

EYECRYL™ PHAKIC range of IOLs can be implanted in patients with thin corneas and dry eyes - which are contra-indications for LASIK procedures.

## Reversible Procedure

Implantation of the EYECRYL™ PHAKIC range of IOLs is done without altering the shape of Cornea, keeping the structural integrity of the eye intact. EYECRYL™ PHAKIC range of IOLs can also be removed easily, if/when required.

## Excellent Positional Stability

EYECRYL™ PHAKIC range of IOLs with orientation marks helps to implant the IOL behind the Iris in the right orientation. The distance of natural Crystalline Lens and Endothelium from IOL is optimum with precise white-to-white measurements & phakic calculator results.

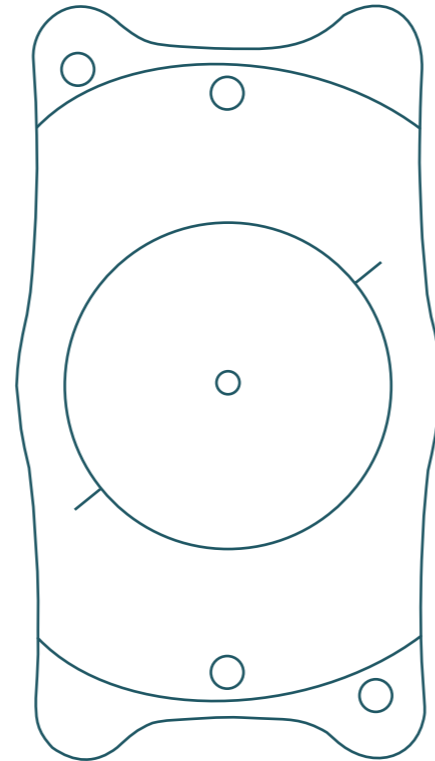
# EYECRYL™ PHAKIC TORIC

PHAKIC TORIC ASPHERIC IOL

## SPECIFICATIONS

MATERIAL	Hydrophilic Acrylic CQ UV
OPTIC TYPE	Toric Aspheric
OPTIC SIZE	4.65 mm to 5.50 mm
OVERALL SIZE	12.0 mm to 13.5 mm
REFRACTIVE INDEX	1.461
DIOPTR RANGE	0 D to -23.0 D (with 0.5D step)
CYLINDER POWER RANGE	0.5D to 5.0D (in 0.5D step)
IMPLANTATION SITE	Posterior Chamber
STERILIZATION	Steam

Model	PC120T	PC125T	PC130T	PC130T
Size (mm)	12.00 mm	12.50 mm	13.00 mm	13.50 mm



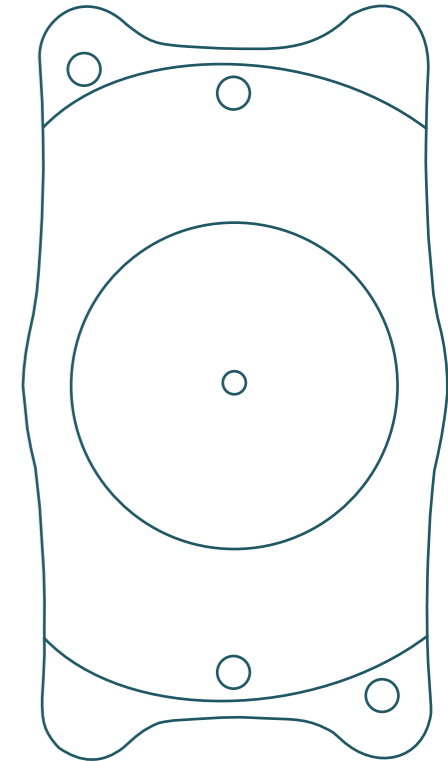
# EYECRYL™ PHAKIC

PHAKIC ASPHERIC IOL

## SPECIFICATIONS

MATERIAL	Hydrophilic Acrylic CQ UV
OPTIC TYPE	Aspheric
OPTIC SIZE	4.65 mm to 5.50 mm
OVERALL SIZE	12.0 mm to 13.5 mm
REFRACTIVE INDEX	1.461
DIOPTR RANGE	0 D to -23.0 D (with 0.5D step)
IMPLANTATION SITE	Posterior Chamber
STERILIZATION	Steam

Model	PKC120NH	PKC125NH	PKC130NH	PKC130NH
Size (mm)	12.00 mm	12.50 mm	13.00 mm	13.50 mm

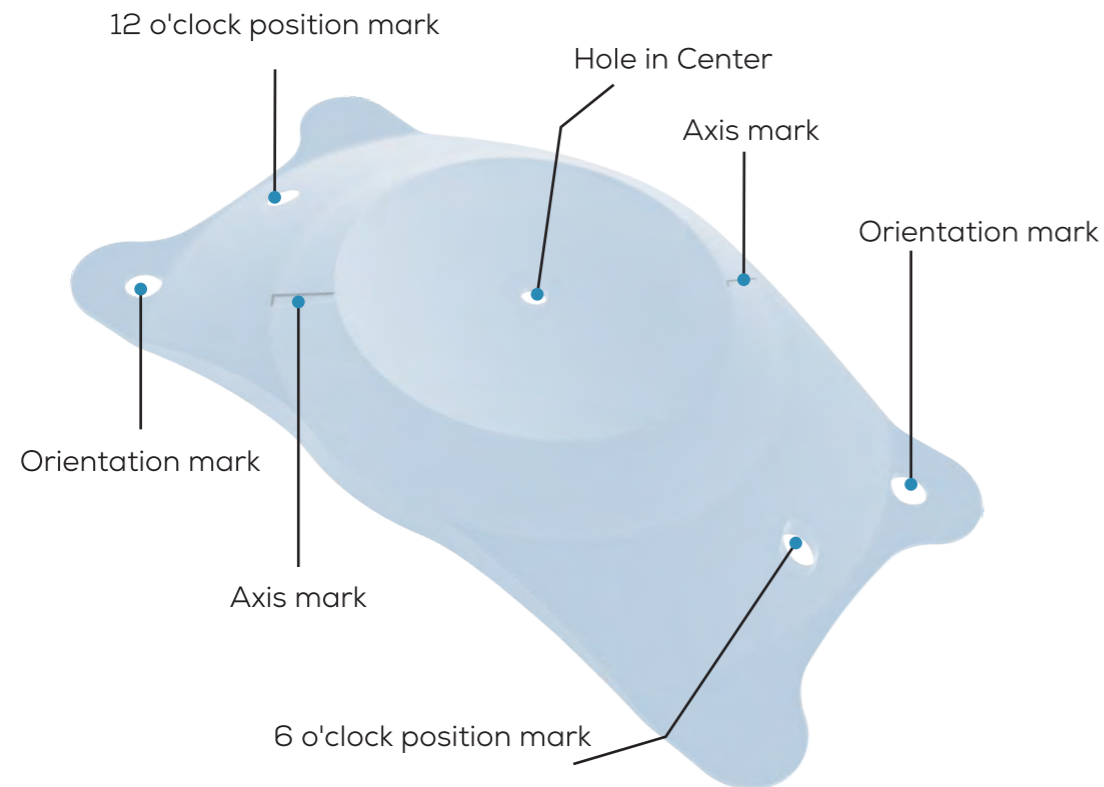


## Hole in Center & Aqueous Fluid Passage

- Eliminates need of PI
- Maintains normal aqueous flow
- Increases surgeon's efficiency
- Eliminates chance of Glaucoma
- Facilitates easy OVD removal

## Orientation Marks

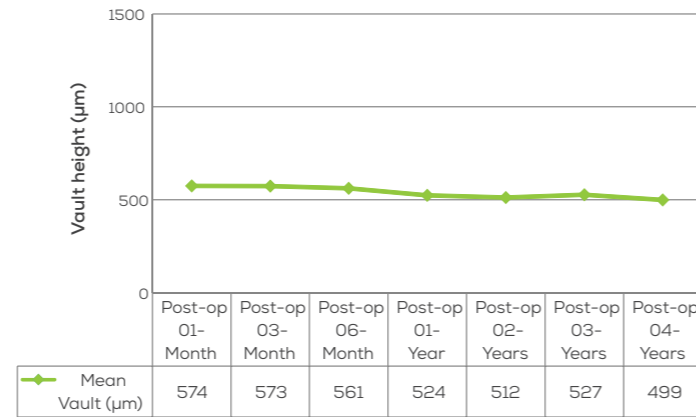
- Two orientation marks are given on leading left & trailing right corners
- These marks clearly indicate unfolding of IOL in right manner inside the eye



## Clinical Results <sup>1</sup>(n=36)

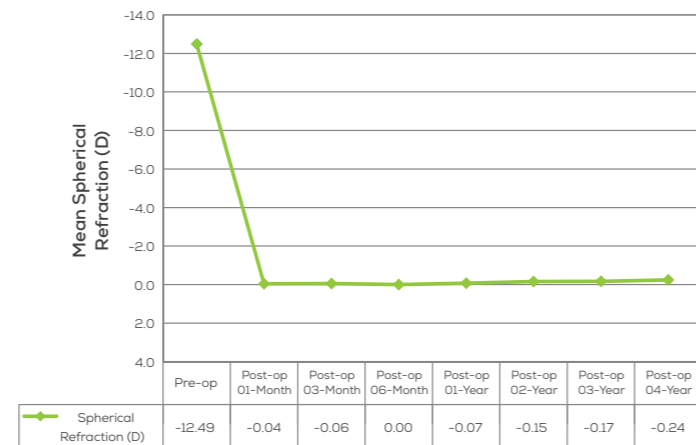
### Vault

- Study report shows stable vault during the follow up and at the end of 4 years.



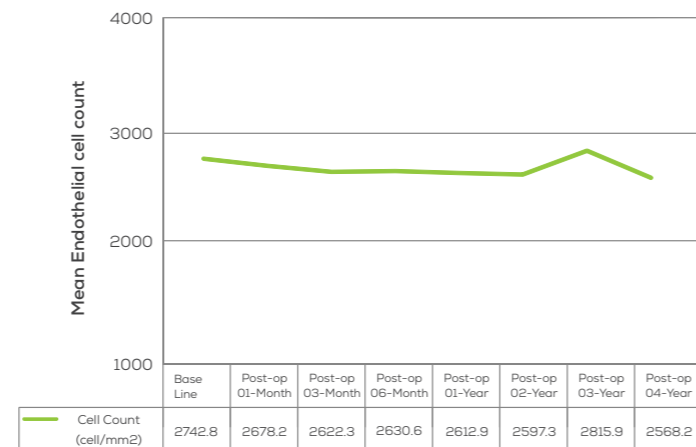
### Spherical Refraction

- Mean spherical refraction after 4 years of implantation shows excellent predictability and stability of the IOL in the eye along with the efficacy to treat wide range of Myopia.
- All patients are found within -0.25 D at post 4 years examination.



### Endothelial cell count

- The graph shows the stable Endothelial cell count for 4 years of clinical study.
- The Results show the implantation of the EYECRYL PHAKIC range of IOLs doesn't have remarkable impact on endothelial cell loss over the period of time.



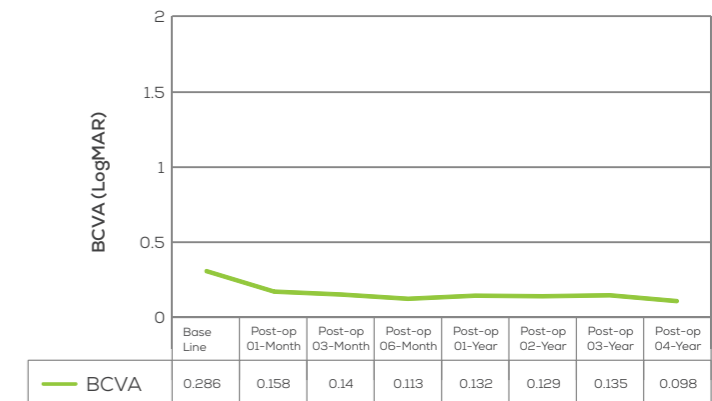
### Uncorrected Visual Acuity

- The results show good improvement in the uncorrected visual acuity after implantation of EYECRYL PHAKIC Range of IOLs.
- The graph also shows the stability of the uncorrected visual acuity over the period of time.
- All patients are found with uncorrected visual acuity within 0.275 Log MAR value at post 4 years follow up.



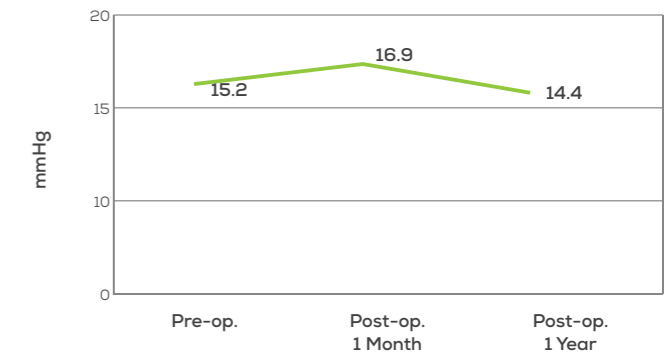
### Corrected Visual Acuity

- The results show clear improvement in the corrected visual acuity after implantation of EYECRYL PHAKIC range of IOLs.
- The corrected visual acuity is improved with time period of 4 years in the study.
- All patients are found with corrected visual acuity within 0.098 Log MAR value at post of 4 years examination.



### IOP

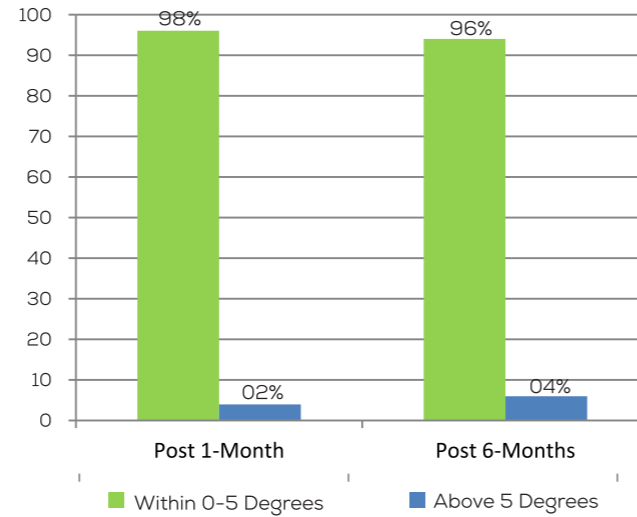
- Post - operative IOP remains stable and within permissible limits, without IP.



## Clinical Results <sup>1</sup>(n=36)

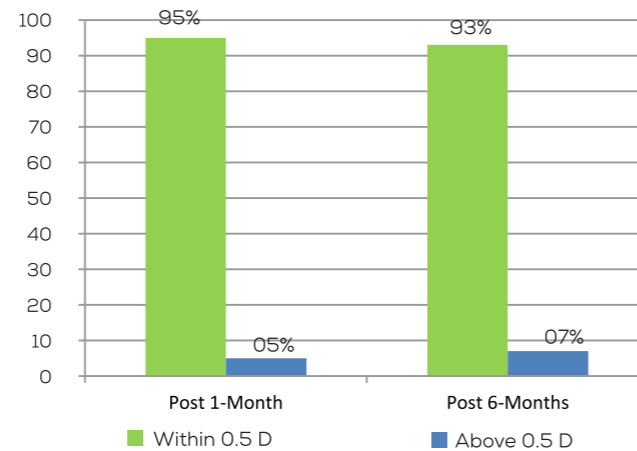
### Rotational Stability

EYECRYL™ PHAKIC TORIC IOL exhibits excellent rotational stability due to optimum overall size and accuracy shown by EYECRYL™ PHAKIC calculator.



### Cylindrical Correction

With EYECRYL™ PHAKIC TORIC version, 93% patients had achieved excellent cylindrical correction and post-op cylinder was within 0.50D at post 6 months examination.





## Selection of Suitable Model & Diopter

- Simple & easy online calculator is available – [www.biotechcalculators.com](http://www.biotechcalculators.com)
- Steps to follow:
  1. Register yourself for the first time
  2. Enter required pre-operative data of patient
  3. Select one suitable option from suggested 5 options depending upon requirement.

## EYECRYL™ PHAKIC CALCULATOR

Online EYECRYL™ PHAKIC Calculator gives recommendations for EYECRYL™ PHAKIC IOL model with dioptric power options, according to the pre-operative data. It also provides EYECRYL™ PHAKIC TORIC model recommendation, cylindrical power and intended axis of IOL placement in the eye.

[www.biotechcalculators.com](http://www.biotechcalculators.com)



## Steps for using EYECRYL™ PHAKIC Calculator

- Registration
- Confirmation for login detail (User ID and Password) will be mailed to registered mail ID
- Login with your ID, Password
- Selection of EYECRYL™ PHAKIC
- Enter patient's pre-operative data
- Choose appropriate EYECRYL™ PHAKIC IOL diopter / EYECRYL™ PHAKIC TORIC IOL diopter and cylinder
- Print the final output page
- User can check selected lens stock availability online

## Required data for Calculator

- Patient's Name
- Patient's Birthdate
- Patient ID number
- Surgery date
- Left Eye/Right Eye
- Flat K & Axis of Flat K
- Steep K & Axis of Steep K
- White to White Distance (mm)
- Anterior Chamber Depth (mm) from Endothelium
- Corneal Thickness (mm)
- Pre-operative Sphere (D)
- Pre-operative Cylinder (D) with Axis

## Calculation Result

- Recommended IOL Model with size
- Selected IOL Power options (Sphere and Cylinder)
- Expected Post-operative Refraction (Sphere and Cylinder)
- Instructions for rotational positioning of IOL (in case of PHAKIC TORIC version)

Note: EYECRYL™ PHAKIC calculator is neither intended to be used for final diagnosis nor as a substitute for surgeon expertise.

## Calculation result page



### Result Page

Calculation ID: 2020 12345

#### Patient Details

Patient's Name:    
Patient's ID:   
Eye:  OD (Right)

#### Doctor Details

Doctor's Name:  Date:   
Doctor's ID:

#### Calculation Details

IOL Model  IOL Model Size(in mm):   
Recommended:  
IOL Power Selected(in D):  
Sphere:  Cylinder:  Axis:   
Expected Post-Operative Residual:  
Sphere:  Cylinder:  Axis:

#### Pre-Operative Data

K1:  @   
K2:  @   
Pre-Operative Sphere (in D):   
Pre-Operative Cylinder (in D):  @   
Corneal Thickness (in mm):   
Back Vertex Distance (in mm):   
White to White Distance (in mm) (Manual):   
Anterior Chamber Depth (in mm):



# Calculation result pages



EYECRYL™ PHAKIC TORIC

Phakic Toric Aspheric IOL

## Result Page

Calculation ID: 202014690

### Patient Details

Patient's Name:

Patient's ID:

Eye:

### Doctor Details

Doctor's Name:

Doctor's ID:

Date:

### Calculation Details

IOL Model Recommended:  IOL Model Size(in mm):

IOL Power Selected(in D):  
 Sphere:  Cylinder:  Axis:  Spherical Equivalent:

Expected PostOperative Sphere:  
 Sphere:  Cylinder:  Axis:

### Pre-Operative Data

K1:  @  Corneal Thickness (in mm):

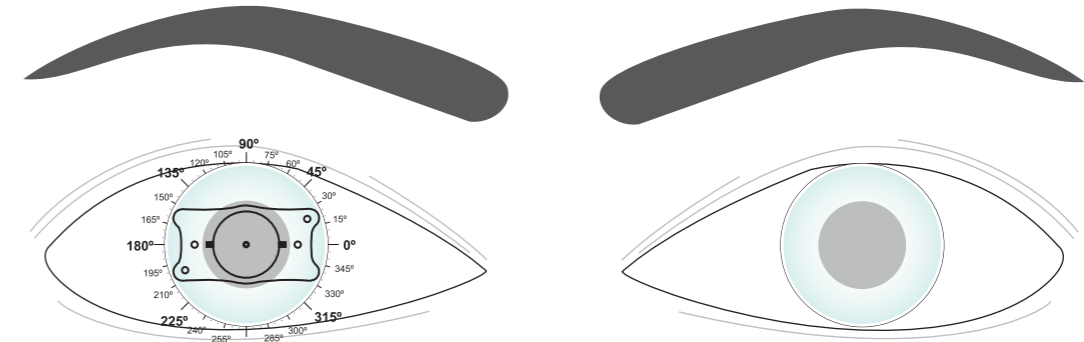
K2:  @  Back Vertex Distance (in mm):

Pre-Operative Sphere (in D):  White to White Distance (in mm)(Manual):

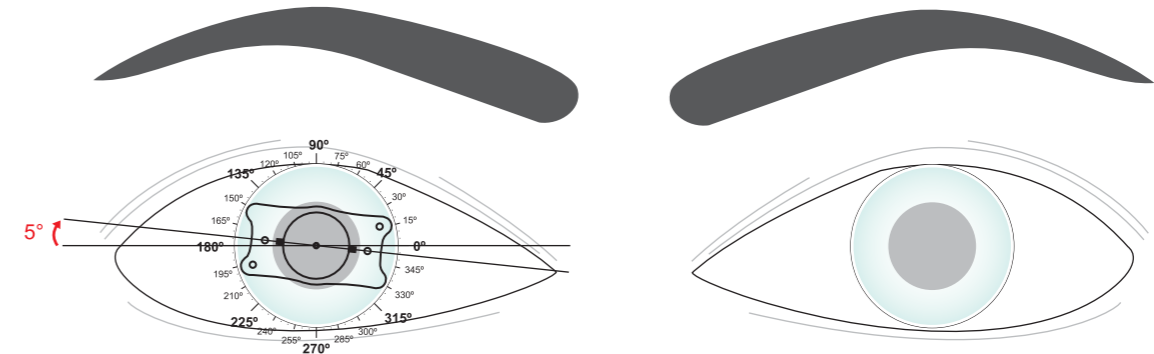
Pre-Operative Cylinder (in D):  @  Anterior Chamber Depth (in mm):

### Instructions for Rotational Positioning of Lens

Step I: Implant Lens Horizontally,



Step II: Now align toric axis marks on the lens optic with 175 degree pre-marked axis on the cornea.



<b>Patient</b>	Mr ABC		
<b>Eye</b>	OD (Right)		
<b>Lens Model</b>	PC125T (12.5)		
	<b>Sphere</b>	<b>Cylinder</b>	<b>Axis</b>
<b>Lens Label Data</b>	-16.5 D	2 D	0°
<b>Lens Selected Data</b>	-16.5 D	2 D	175°
<b>Expected Post-Operative Residual</b>	-0.33 D	0.09 D	175°
<b>Rotation</b>	5° Clockwise		



## Pre-operative measurements

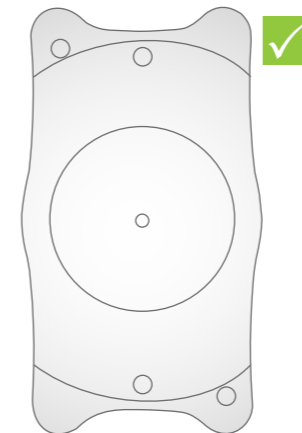
- Subjective refraction
- Endothelial Cell Density (ECD) measurement should be performed pre-operatively to determine if candidate meets the minimum ECD requirement based upon age and ACD.
- Sizing of the EYECRYL™ PHAKIC range of IOLs depends on measurement of white-to-white and Anterior Chamber Depth (ACD). So, these measurements must be precise to achieve predictable surgical outcomes.
- Intra-ocular pressure (IOP) should be checked pre and post-operatively.

## Loading Technique

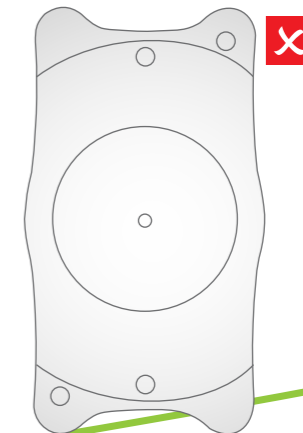
- Very easy & similar to hydrophilic / hydrophobic IOL loading technique ensures surgeon's comfortness
- Great time saving
- Follow steps mentioned in "Instructions for Use" (given in IOL box), for loading & Implantation of EYECRYL™ PHAKIC IOL
- In addition to "Instructions for Use", please follow calculation result page, for loading, implantation & axis placement of EYECRYL™ PHAKIC TORIC IOL.

## Correct Position of Orientation Marks

Leading Left...  
Trailing Right...



Leading Right...  
Trailing Left...



### Reference:

1. Dr. Alper Agca, Dr.; "Clinical Study Report- "THE RETROSPECTIVE STUDY TO EVALUATE THE LONG TERM EFFICACY, SAFETY AND REFRACTIVE OUTCOME OF PATIENT SUFFERING FROM MYOPIA AND IMPLANTED WITH PHAKIC IOL"-2020.