

IATS Contact Lens Fitting

Buddy Russell, FCLSA, C.O.M.T.
Emory University Eye Center



Contact Lens Options

- Rigid Gas Permeable lens
- Silicone elastomer lens
- Soft hydrophilic lens
- Soft silicone-hydrogel lens



Emory University

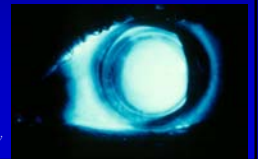
Oxygen Permeability

<i>Material</i>	<i>DK</i>
• GP	28 – 163
• SCL	9 - 18
• Silsoft	340
• Silicone – hydrogel	110 – 175
- Si – H now available	up to +20.00 82

Emory University

Silicone Elastomer Advantages

- very high gas exchange
- EW capability
- ease of fitting
- low lens loss rate



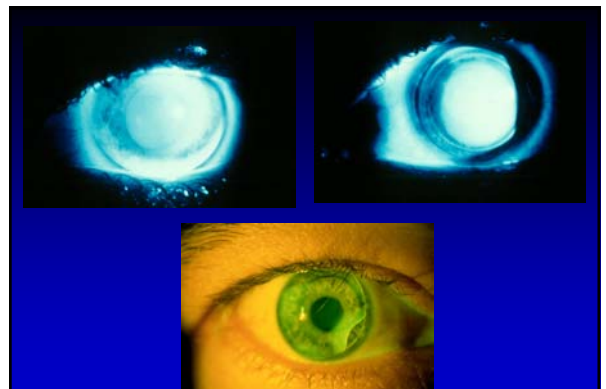
Emory University

Silicone Elastomer Disadvantages

- limited parameters
- steepest BC is 7.5mm (45.00D.)
- surface breakdown
- high cost
- difficult removal



Emory University



Emory University

PEDIATRIC APHAKIA

ADVANTAGES / DISADVANTAGES

RGP

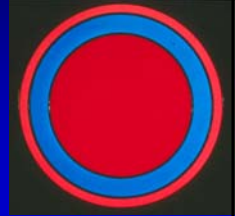
- UNLIMITED PARAMETERS
- HIGH DK
- INCREASED TEAR EXCHANGE
- EASE OF CARE
- MORE CHALLENGING TO FIT
- LENS LOSS



Emory University

GP DESIGN

- POSTERIOR OPTIC ZONE
- ANTERIOR OPTIC ZONE
- AEL
- DIAMETER CHANGES
- EXTRAPOLATE



Emory University

AXIAL EDGE LIFT

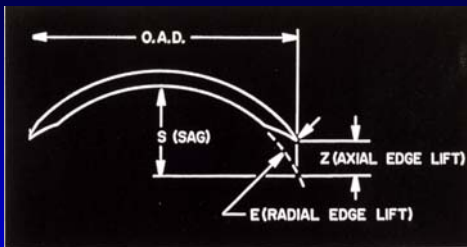


FIG. 1: DIAGRAM SHOWING THE DIFFERENCE BETWEEN AXIAL EDGE LIFT AND RADIAL EDGE LIFT. THE DOTTED LINE REPRESENTS THE CONTINUATION OF THE BASE CURVE.



Emory University

GP PEDIATRIC APHAKIC DESIGN

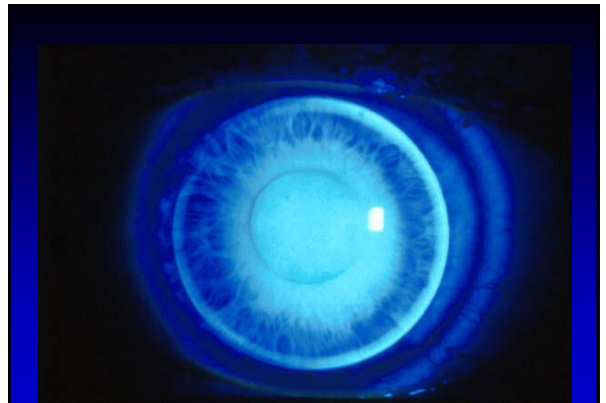
- APPROVED PROPRIETARY DESIGN
- 3 AEL VALUES
 - STAR A (FLAT)
 - STAR C (MEDIUM)
 - STAR E (STEEP)
- LIMIT CT .50mm (ADJUST FRONT OZ)
- HIGH DK
 - BXO (DK 100)
 - BXO 2 (DK 141)
 - Menicon (DK163)



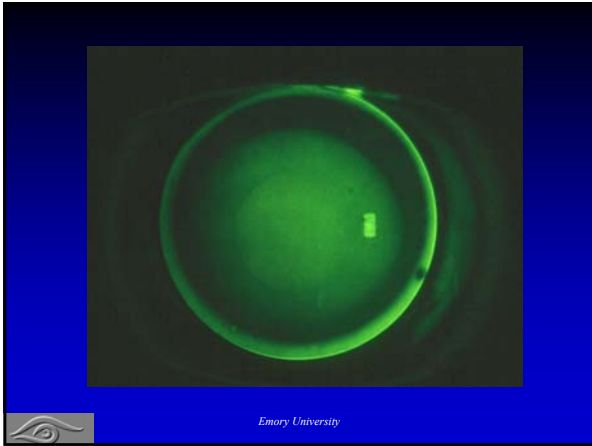
Emory University



Emory University




Emory University

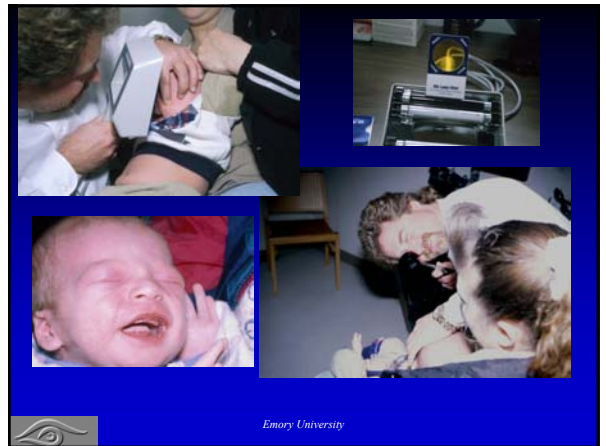
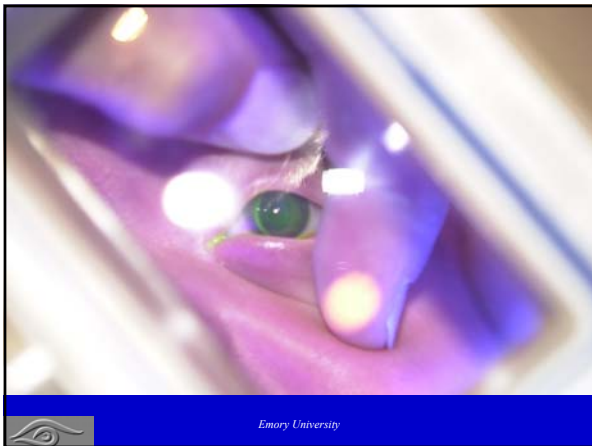
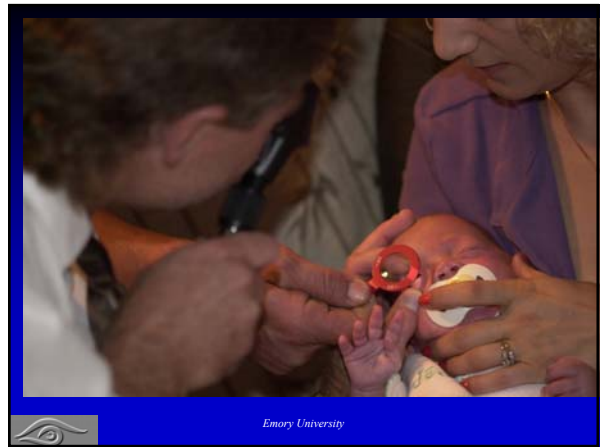
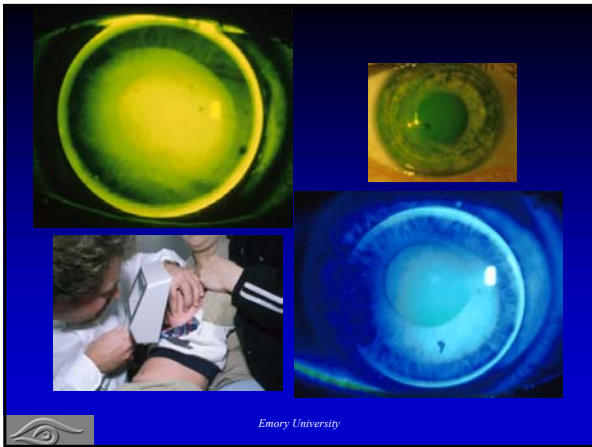


EVALUATIONS

- JUST OBSERVE DURING HX
- JUST WATCH WITHOUT TOUCHING
- WHEN TO STOP
- TAKE A BREAK
- BE QUICK
- WHEN TO OPEN LIDS



Emory University



Final Lens Power IATS Protocol

- Contact lenses will be overcorrected by 2 diopters until two years of age
- After age two, the eye will be corrected for emmetropia, using spectacles with a +3.00D segmented bifocal add



Emory University

LENS CHOICE

- MAKE BEST CHOICE UNBIASED
 - NOT BASED ON **YOUR** "COMFORT ZONE"
 - WHAT IS BEST FOR THIS CASE



Emory University