

ROP Diagnostic tips

How to make life easier?

- By
- Islam Shereen M.D., FRCS (Glasg)
- Associate Professor of Ophthalmology
- Alexandria University



EGYPTIAN
OPHTHALMOLOGICAL
SOCIETY EOS

Safe examination



Avoid hypothermia:

- Head cap
- Swaddling
- Turn off the fan or the AC



Good control of the body and the head (assistant):

- One hand supports the body
- The other embraces the head



Use a pacifier or oral sucrose

Safe examination



Proper mydriasis (>45 min before examination):

- 0.5-1% cyclopentolate
- 2.5% phenylephrine

Topical anaesthetic drops



28 or 30 diopter lens:

- Small pupil
- Larger field
- Less indentation is needed

Speculum insertion

- Use an **infant** lid speculum
- Insert **one blade** of the speculum, use it to **lift that lid** then insert the other blade



Strong Bell's phenomenon; no problem



- Move the **speculum** upward



- Use the **indenter** to move the eye downwards



Posterior pole examination

- Keep your **head directly above** the baby's eye
- Hold the lens close to the eye then start pulling it away
- Keep a **pivoting finger** on the baby's head
- Stand tall, avoid the temptation to come closer

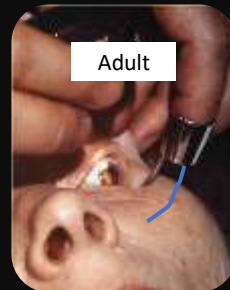
Zone II examination

- Stand **opposite** to the examined eye
- Bend the knees slightly to see more peripherally
- Focus on the **superio-temporal** or the **inferio-temporal** retina (site of the vascular arcades)



Zone III examination; Indentation

- Minimize the indentation **force** and **power**
- Use a small indenter, muscle hook or a scoop
- Use the second instrument as a **rotator** rather than an indenter
- Keep a straight line between the head, pupil and indentation
- Finally, insert the condensing lens
- Rotate the head slightly if needed



In small very sick babies

- Discuss the safety with the attending neonatologist
- Avoid prolonged examination
- Examine the **posterior pole quickly** for excluding plus disease & A-ROP



Examining the babies in the NICU

- Ask about the **local infection control regulations** of the unit
- **'Where Can I Do A Hand Wash, please?'** would be a good start



Examination in the incubator



Examination in the incubator



Examination in the incubator



Examination in the incubator



Examination in the incubator



Too much lines and tubes!!



- **Nasogastric tube NGT:**
 - not a problem if moved or taken off
- **Pulse oximeter sensor:**
 - Attached to a pulsating area
- **Peripheral line:**
 - Handle with care
- **Oxygen tube**

Nasal CPAP



Endotracheal tube (ETT), mechanical ventilation



Long line



Thank
you ♡