### Alert
- Watch for apnoeas and abdominal distension following administration. Lower concentration solutions and regimens minimising number of additional drops are recommended.

### Indication
Induction of mydriasis and cycloplegia for diagnostic and therapeutic ophthalmic procedures.

### Action
Anticholinergic drug that produces pupillary dilatation by inhibiting the sphincter pupillae muscle and paralysis of accommodation.

### Drug Type
Antimuscarinic.

### Trade Name
- Minims Tropicamide Eye Drops
- Mydriacyl Eye drops

### Presentation
- Minims Tropicamide Eye Drops 0.5%, 1.0% solution.
- Mydriacyl Eye drops 0.5%, 1.0% 15 mL (multidose—excipients benzalkonium chloride 0.01%, sodium chloride, disodium edetate, hydrochloric acid and/or sodium hydroxide, purified water).

### Dosage/Interval
Use in combination with phenylephrine 2.5% with or without cyclopentolate 0.5%.

**REGIMEN 1:**
- Phenylephrine 2.5% + cyclopentolate 0.5% + tropicamide 0.5% eye drops [1-4].
- Instil one drop of each agent (5 minutes apart) into each eye 60 minutes prior to examination.
- Repeat if pupillary dilatation inadequate.
- Perform examination 60 to 120 minutes after instillation.

**REGIMEN 2:**
- Phenylephrine 2.5% + tropicamide 0.5% eye drops [5-7].
- Instil one drop of each agent (5 minutes apart) into each eye 60 minutes prior to examination.
- Repeat if pupillary dilatation inadequate.
- Perform examination 60 to 120 minutes after instillation.

Dark irides may require additional drops.

### Maximum daily dose
- REGIMEN 1: 3 drops of each agent.
- REGIMEN 2: 4 drops of each agent.

### Route
Topical instillation into the eyes from the container or use a microdrop (5–7 microL) cannula.

### Administration
Apply pressure to the lacrimal sac during and for 60 seconds after instillation of eye drop to minimise systemic absorption. Wipe away excess medication. Consider withholding feeds for four hours from administration of the last drops to reduce incidence of feed intolerance.

### Monitoring
- Blood pressure, heart rate, oxygen saturation in infants with bronchopulmonary dysplasia or at risk of apnoea.
- Signs of ileus.

### Contraindications
Necrotising enterocolitis (NEC) at the time of examination.

### Precautions
- Bronchopulmonary dysplasia.
- Severe neurological impairment—may increase risk of seizures.
- Feeding intolerance.
- Lower concentration solutions and regimens minimising number of additional drops are recommended to minimise toxicity.

### Drug Interactions
Cyclopentolate, phenylephrine, tetracaine (amethocaine)

### Adverse Reactions
- Feeding intolerance, abdominal distension and increased gastric residuals.
- Apnoea, transient bradycardia (especially infants on respiratory support).
- Stinging or burning of eye.
- Rarely dry mouth, urinary retention, fever, tachycardia, vasodilatation, restlessness, agitation, seizures.

### Compatibility
- Phenylephrine, cyclopentolate, tetracaine (amethocaine)

### Incompatibility
- No information.
Tropicamide
Newborn Use Only

Stability
Discard immediately after use.

Storage
Store in refrigerator at 2°C to 8°C. Do not freeze. Protect from light.

Special Comments
Without lacrimal sac occlusion, approximately 80% of each drop may pass through the nasolacrimal system and be available for rapid systemic absorption by the nasal mucosa. Consider withholding feeds for four hours from administration of the last drops. Used in conjunction with topical anaesthetic, e.g. tetracaine (amethocaine).

Evidence summary
Refer to full version.

References
Refer to full version.

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