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International Council of Ophthalmology/
International Federation of Ophthalmological Societies

ICO International Clinical Guidelines

Esotropia (Initial and Follow-up Evaluation)

(Ratings: A: Most important, B: Moderately important, C: Relevant but not critical

Strength of Evidence: I: Strong, II: Substantial but lacks some of I, III: consensus of expert opinion in absence of evidence for I & II)

Initial Exam History (Key elements)

- Ocular symptoms and signs **(A:III)**
- Ocular history (date of onset and frequency of the deviation, presence or absence of diplopia) **(A:III)**
- Systemic history (review of prenatal, perinatal and postnatal medical factors) **(A:III)**
- Family history, including presence of strabismus, amblyopia, extraocular muscle surgery **(A:III)**

Initial Physical Exam (Key elements)

- Visual acuity **(A:III)**
- Ocular alignment (at distance and near) **(A:III)**
- Extraocular muscle function **(A:III)**
- Sensory parameters **(A:III)**
- Evaluation of the fundus, with attention to macular position **(A:III)**
- Cycloplegic refraction **(A:III)**

Care Management

- First prescribe corrective lenses for any clinically significant refractive error. **(A:III)**
- Consider all forms of esotropia for treatment and re-establish ocular alignment promptly. **(A:III)**

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- If optical correction does not align the eyes, then surgical correction is recommended. **(A:III)**
- Treat significant amblyopia prior to esotropia surgery to increase likelihood of binocularity. **(A:III)**

Follow-up Evaluation

- Follow-up visits should include:
 - Tolerance and side effects of therapy **(A:III)**
 - Visual acuity and/or fixation pattern with correction of refractive error **(A:III)**
 - Deviation at distance and near fixation with correction of refractive error **(A:III)**
 - Observation of A or V patterns and/or oblique dysfunctions **(A:III)**
 - Status of binocular vision **(A:III)**
- Assess hyperopia using cycloplegia at least yearly, and 4 to 6 month intervals may be necessary **(A:III)**

Esotropia Follow-up Evaluation Intervals **(A:III)**

| Age (years) | Routine Interval Follow-up (months)* |
|-------------|--------------------------------------|
| 0-1 | 1-3 |
| 1-5 | 3-6 |
| 5-10 | 6-12 |

*More frequent visits may be necessary if amblyopia is present or if there is a recent deterioration of alignment.

Patient Education

- Discuss findings with the patient when appropriate and/or parents/caregivers to enhance understanding of disorder and to recruit them in a team effort for therapy. **(A:III)**
- For adult patients, discuss advantages and disadvantages of various modes of treatment in developing a treatment plan. **(A:III)**
- Formulate treatment plans in consultation with the patient and/or family/caregivers, and the plans should be responsive to their expectations and preferences. **(A:III)**
- Discuss the potential psychological side effects with the patient and parent/caregiver as appropriate. **(A:III)**

* Adapted from the [American Academy of Ophthalmology Summary Benchmarks, November 2006 \(www.aao.org\)](http://www.aao.org)

(For more ICO International Clinical Guidelines, see www.icoph.org/guide)

Preface to the Guidelines:

International Clinical Guidelines are prepared and distributed by the International Council of Ophthalmology on behalf of the International Federation of Ophthalmological Societies.

These Guidelines are to serve a supportive and educational role for ophthalmologists worldwide. These guidelines are intended to improve the quality of eye care for patients. They have been adapted in many cases from similar documents (Benchmarks of Care) created by the American Academy of Ophthalmology based on their Preferred Practice Patterns.

While it is tempting to equate these to Standards, it is impossible and inappropriate to do so. The multiple circumstances of geography, equipment availability, patient variation and practice settings preclude a single standard.

Guidelines on the other hand are a clear statement of expectations. These include comments of the preferred level of performance assuming conditions that allow the use of optimum equipment, pharmaceuticals and/or surgical circumstances.

Thus, a basic expectation is created and if the situation is optimum, the optimum facets of diagnosis, treatment and follow up may be employed. Excellent, appropriate and successful care can also be provided where optimum conditions do not exist.

Simply following the Guidelines does not guarantee a successful outcome. It is understood that, given the uniqueness of a patient and his or her particular circumstance, physician judgment must be employed. This can result in a modification in application of a guideline in individual situations.

Medical experience has been relied upon in the preparation of these guidelines, and they are whenever possible, evidence-based. This means these Guidelines are based on the latest available scientific information. The ICO is committed to provide updates of these guidelines on a regular basis (approximately every two to three years).

(Also see the Introduction to the ICO International Clinical Guidelines at www.icoph.org/guide/guideintro.html and the list of other Guidelines at www.icoph.org/guide/guidelist.html.)