

Recommended Components of an Eye/Vision Examination For Computer Operators

The unique characteristics and high visual demands of computer work make eye and vision problems the most frequent health related problem experienced by computer operators. Uncorrected vision conditions, poor computer design and workplace ergonomics, and a highly demanding visual task can all contribute to the development of visual symptoms.

The American Optometric Association recommends that all video display terminal operators obtain a comprehensive eye/vision examination prior to or soon after beginning computer work and periodically thereafter.

The examination should include:

1. A general systemic and ocular health history.
2. A specific patient history relating to computer use. It is recommended that the patient be prepared to provide the following information.
 - A. Type of computer work and nature of visual demands.
 - B. Number of hours, continuity and time of day for computer work.
 - C. Size and color of screen and screen characters.
 - D. Position and working distances of computer screen and other visual tasks.
 - E. General characteristics of light sources and their locations within the work area.
 - F. Nature, severity and frequency of symptoms associated with computer work.
3. Measurement of unaided and aided visual acuity at distance and appropriate near working distances.
4. Evaluation of internal and external eye health, (e.g., ophthalmoscopy, biomicroscopy, tonometry, visual fields, tear analysis, etc.)
5. Refraction at distance and near working distances.
6. Assessment of eye focusing (e.g., accommodative amplitude and facility).
7. Evaluation of eye coordination and eye movement skills (e.g., binocular vision analysis, ocular motility).

Depending on the history, signs and symptoms presented or the results of the initial examination procedures, additional testing may be indicated to effectively evaluate and diagnose specific eye or vision problems. At the completion of the examination, the patient should receive a review and discussion of the findings and recommendations for treatment. Treatment may include the design and prescription of an ophthalmic lens correction specifically for computer work, the utilization of optometric vision therapy for the correction of binocular vision and accommodative dysfunctions interfering with computer work, and/or guidance relating to preventive eye care, lighting and workstation design.