Complete Summary

GUIDELINE TITLE

Eye.

BIBLIOGRAPHIC SOURCE(S)

Work Loss Data Institute. Eye. Corpus Christi (TX): Work Loss Data Institute; 2008. 57 p. [85 references]

GUIDELINE STATUS

This is the current release of the guideline.

This guideline updates a previous version: Work Loss Data Institute. Eye. Corpus Christi (TX): Work Loss Data Institute; 2007 Apr 27. 56 p.

The Official Disability Guidelines product line, including ODG Treatment in Workers Comp, is updated annually, as it has been since the first release in 1996.

COMPLETE SUMMARY CONTENT

SCOPE

METHODOLOGY - including Rating Scheme and Cost Analysis RECOMMENDATIONS
EVIDENCE SUPPORTING THE RECOMMENDATIONS
BENEFITS/HARMS OF IMPLEMENTING THE GUIDELINE RECOMMENDATIONS IMPLEMENTATION OF THE GUIDELINE
INSTITUTE OF MEDICINE (IOM) NATIONAL HEALTHCARE QUALITY REPORT CATEGORIES

IDENTIFYING INFORMATION AND AVAILABILITY DISCLAIMER

SCOPE

DISEASE/CONDITION(S)

Work-related eye injuries

GUIDELINE CATEGORY

Diagnosis Evaluation Management Treatment

CLINICAL SPECIALTY

Emergency Medicine Family Practice Internal Medicine Ophthalmology Surgery

INTENDED USERS

Advanced Practice Nurses Health Care Providers Health Plans Nurses Physician Assistants Physicians

GUIDELINE OBJECTIVE(S)

To offer evidence-based step-by-step decision protocols for the assessment and treatment of workers' compensation conditions

TARGET POPULATION

Workers with occupational eye injuries

INTERVENTIONS AND PRACTICES CONSIDERED

The following interventions/procedures were considered and recommended as indicated in the original guideline document:

- 1. Activity restrictions/work modifications
- 2. Amniotic membrane transplantation
- 3. Antibiotic therapy for acute bacterial conjunctivitis
- 4. Bandage contact lens
- 5. Breaks (in data entry operators)
- 6. Computed tomography (CT) in addition to other diagnostic tools
- 7. Emergency eye wash products, including Diphoterine and Previn
- 8. Fibrin alue
- 9. Intravitreal antibiotics
- 10. Ophthalmic consultation (original guideline document includes indications for urgent consultation)
- 11. Ophthalmic vasoconstrictor
- 12. Protection methods for eyes under general anesthesia
- 13. Surgery for orbital floor fractures
- 14. Surgical treatment for hyphema
- 15. Tetanus toxoid
- 16. Topical nonsteroidal anti-inflammatory drugs (NSAIDs) including diclofenac and ketorolac
- 17. Ultrasound
- 18. X-ray for serious eye injuries

The following interventions/procedures are under study and are not specifically recommended:

Topical aminocaproic acid (for hyphema)

The following interventions were considered, but are not recommended:

- 1. Magnetic resonance imaging (MRI) if patients have, or are suspected to have, metallic foreign bodies in the eye
- 2. Patching
- 3. Surgery for optic neuropathy

MAJOR OUTCOMES CONSIDERED

Effectiveness of treatments of eye injuries

METHODOLOGY

METHODS USED TO COLLECT/SELECT EVIDENCE

Hand-searches of Published Literature (Primary Sources) Searches of Electronic Databases

DESCRIPTION OF METHODS USED TO COLLECT/SELECT THE EVIDENCE

Work Loss Data Institute (WLDI) conducted a comprehensive medical literature review (now ongoing) with preference given to high quality systematic reviews, meta-analyses, and clinical trials published since 1993, plus existing nationally recognized treatment quidelines from the leading specialty societies. WLDI primarily searched MEDLINE and the Cochrane Library. In addition, WLDI also reviewed other relevant treatment guidelines, including those in the National Guideline Clearinghouse, as well as state guidelines and proprietary guidelines maintained in the WLDI quideline library. These quidelines were also used to suggest references or search terms that may otherwise have been missed. In addition, WLDI also searched other databases, including MD Consult, eMedicine, CINAHL, and conference proceedings in occupational health (i.e., American College of Occupational and Environmental Medicine [ACOEM]) and disability evaluation (i.e., American Academy of Disability Evaluating Physicians [AADEP], American Board of Independent Medical Examiners [ABIME]). Search terms and questions were diagnosis, treatment, symptom, sign, and/or body-part driven, generated based on new or previously indexed existing evidence, treatment parameters and experience.

In searching the medical literature, answers to the following questions were sought: (1) If the diagnostic criteria for a given condition have changed since 1993, what are the new diagnostic criteria? (2) What occupational exposures or activities are associated causally with the condition? (3) What are the most effective methods and approaches for the early identification and diagnosis of the condition? (4) What historical information, clinical examination findings or ancillary test results (such as laboratory or x-ray studies) are of value in determining whether a condition was caused by the patient's employment? (5)

What are the most effective methods and approaches for treating the condition? (6) What are the specific indications, if any, for surgery as a means of treating the condition? (7) What are the relative benefits and harms of the various surgical and non-surgical interventions that may be used to treat the condition? (8) What is the relationship, if any, between a patient's age, gender, socioeconomic status and/or racial or ethnic grouping and specific treatment outcomes for the condition? (9) What instruments or techniques, if any, accurately assess functional limitations in an individual with the condition? (10) What is the natural history of the disorder? (11) Prior to treatment, what are the typical functional limitations for an individual with the condition? (12) Following treatment, what are the typical functional limitations for an individual with the condition? (13) Following treatment, what are the most cost-effective methods for preventing the recurrence of signs or symptoms of the condition, and how does this vary depending upon patient-specific matters such as underlying health problems?

Criteria for Selecting the Evidence

Preference was given to evidence that met the following criteria: (1) The article was written in the English language, and the article had any of the following attributes: (2) It was a systematic review of the relevant medical literature, or (3) The article reported a controlled trial – randomized or controlled, or (4) The article reports a cohort study, whether prospective or retrospective, or (5) The article reports a case control series involving at least 25 subjects, in which the assessment of outcome was determined by a person or entity independent from the persons or institution that performed the intervention the outcome of which is being assessed.

More information about the selection of evidence is available in "Appendix. ODG Treatment in Workers' Comp. Methodology description using the AGREE instrument" (see "Availability of Companion Documents" field).

NUMBER OF SOURCE DOCUMENTS

Not stated

METHODS USED TO ASSESS THE QUALITY AND STRENGTH OF THE EVIDENCE

Weighting According to a Rating Scheme (Scheme Given)

RATING SCHEME FOR THE STRENGTH OF THE EVIDENCE

Ranking by Type of Evidence

- 1. Systematic Review/Meta-Analysis
- 2. Controlled Trial-Randomized (RCT) or Controlled
- 3. Cohort Study-Prospective or Retrospective
- 4. Case Series
- 5. Unstructured Review
- 6. Nationally Recognized Treatment Guideline (from www.quideline.gov)
- 7. State Treatment Guideline

- 8. Other Treatment Guideline
- 9. Textbook
- 10. Conference Proceedings/Presentation Slides
- 11. Case Reports and Descriptions

Ranking by Quality within Type of Evidence

- a. High Quality
- b. Medium Quality
- c. Low Quality

METHODS USED TO ANALYZE THE EVIDENCE

Review of Published Meta-Analyses Systematic Review

DESCRIPTION OF THE METHODS USED TO ANALYZE THE EVIDENCE

The Work Loss Data Institute (WLDI) reviewed each article that was relevant to answering the question at issue, with priority given to those that met the following criteria: (1) The article was written in the English language, and the article had any of the following attributes: (2) It was a systematic review of the relevant medical literature, or (3) The article reported a controlled trial – randomized or controlled, or (4) The article reported a cohort study, whether prospective or retrospective, or (5) The article reported a case control series involving at least 10 subjects, in which the assessment of outcome was determined by a person or entity independent from the persons or institution that performed the intervention the outcome of which is being assessed.

Especially when articles on a specific topic that met the above criteria were limited in number and quality, WLDI also reviewed other articles that did not meet the above criteria, but the evidence was ranked alphanumerically (see the Rating Scheme of the Strength of Evidence field) so that the quality of evidence could be clearly determined when making decisions about what to recommend in the Guidelines. Articles with a Ranking by Type of Evidence of Case Reports and Case Series were not used in the evidence base for the Guidelines. These articles were not included because of their low quality (i.e., they tend to be anecdotal descriptions of what happened with no attempt to control for variables that might affect outcome). Not all the evidence provided by WLDI was eventually listed in the bibliography of the published Guidelines. Only the higher quality references were listed. The criteria for inclusion was a final ranking of 1a to 4b (the original inclusion criteria suggested the methodology subgroup), or if the Ranking by Type of Evidence was 5 to 10, the quality ranking should be an "a."

METHODS USED TO FORMULATE THE RECOMMENDATIONS

Not stated

RATING SCHEME FOR THE STRENGTH OF THE RECOMMENDATIONS

Not applicable

COST ANALYSIS

A formal cost analysis was not performed and published cost analyses were not reviewed.

METHOD OF GUIDELINE VALIDATION

External Peer Review

DESCRIPTION OF METHOD OF GUIDELINE VALIDATION

Prior to publication, select organizations and individuals making up a cross-section of medical specialties and typical end-users externally reviewed the guideline.

RECOMMENDATIONS

MAJOR RECOMMENDATIONS

Initial Diagnosis

Eye injuries in the workplace are common and can be very serious, although when proper preventive techniques are practiced (such as personal protective equipment in an industrial setting and computer-related ergonomic training in an office environment), most injuries can be avoided. Eye complaints account for approximately 4% of workers' compensation claims.

Common Hazards

- Dust, concrete, and metal particles
- Falling or shifting debris, building materials, glass
- Smoke, noxious/poisonous gases
- Chemicals (acids, bases, fuels, solvents, lime, wet or dry cement powder)
- Welding light and electrical arc
- Thermal hazards and fires
- Bloodborne pathogens (hepatitis or human immunodeficiency virus [HIV]) from blood, body fluids, human remains

Common Injuries

- Corneal abrasions and conjunctivitis (red eyes)
- Concrete or metal particles or slivers embedded in the eye
- Chemical splash or burn
- Welder's flashburn
- Eyeball laceration
- Facial contusion and black eye
- Bloodborne pathogen exposure from blood or other body fluids or human remains

Initial Evaluation

The most common initial complaints are of blurred vision, red eye, or visual fatigue. More serious conditions, such as corneal perforation, chemical splash, or welding burns are usually directly incident-related and require immediate, emergency attention or referral. Examination for red flags (signs or symptoms of a potentially serious condition) is the first step in any initial evaluation. Always check visual acuity, peripheral vision, and extra-ocular movements.

Presumptive Diagnosis and Initial Therapy

The patient may present with complaints of:

Red Eye: Red eye is often a sign of a subconjunctival hemorrhage, which will usually heal on its own. A corneal abrasion, foreign body, allergy, or dry eyes, all of which may also be indicated by an itching or burning of the eye, could also cause red eye.

Ask the patient

- To explain the symptoms and how they are affecting his or her vision
- To explain any past history involving red eye or any other eye related problems, as well as any other medical problems such as diabetes or high blood pressure
- To indicate what triggered the onset of symptoms
- To explain what makes the problem worse or better

The eye should be tested for visual acuity, as well as examined with a penlight or transilluminator for irregularities of the corneal surface. Look for noticeable symptoms such as irregularity of the pupils, including uneven dilation or slow reactivity, and lid malfunction.

The following symptoms present with red eye should be considered red flags for immediate referral: severe pain, photophobia, reduced vision, colored halos around point of light in the patient's vision, ciliary flush, high intraocular pressure, corneal epithelial disruption, corneal opacity, proptosis, a smaller pupil in the problem eye, or shallow anterior chamber depth.

In the absence of red flags, contact lenses should be removed and the irritated eye may be treated with topical non-steroidal anti-inflammatory drugs non-steroidal or non-prescription analgesics to relieve discomfort until symptoms resolve within 48–72 hours.

Blurred Vision: Blurred vision, whether central or peripheral, can last from a few seconds to over 24 hours to a lifetime of gradual loss.

Short term blurred vision that heals itself within a few hours could be the result of a migraine headache, transient ischemic attack (occurs when blood supply to the brain is interrupted), or papilledema (optic disc swelling secondary to high intracranial pressure).

Painless loss lasting over days or weeks could be the result of cataracts, vitreous hemorrhage, or retinal detachment, while painful loss could occur from acute

angle-closure glaucoma, optic neuritis (pain with eye movements), uveitis, or corneal hydrops (keratoconus).

Long term, gradual change is most likely nearsightedness or farsightedness.

Unless the blurred vision appears to be a temporary result of too much intense close-up work (see visual fatigue), referral to a specialist is recommended.

Visual Fatigue: Visual fatigue usually occurs because of intensive use of the eyes, and is especially prevalent in visual display terminal workers. Rest breaks for the eye are temporary solutions, but for long-term prevention and treatment, the cases should be managed with good visual ergonomics and proper vision care.

Some Common Work-Related Eye Injuries

Foreign Body in Eye

Symptoms include:

- Sharp pain, burning, irritation, tearing, and redness
- Patient feels something in the eye when moving the eye around while it is closed
- Scratching sensation when blinking
- · Blurred vision or vision loss
- Bleeding into the white part of the eye (can be either a conjunctival hemorrhage or a subconjunctival hemorrhage)
- Hyphema blood layering in front of the iris and behind the cornea (could be a sign of a more serious injury)

Medical Treatment for Foreign Body in Eye

- For corneal abrasions, treat with an antibiotic ointment and/or antibiotic eye drops and pain medicine.
- Subconjunctival hemorrhage usually heals on its own in one to two weeks. Artificial tears may ease the irritation.
- Damage to the iris, the lens, or the retina requires immediate evaluation by an ophthalmologist and may or may not require surgery.
- A ruptured eyeball requires surgery by an ophthalmologist.
- If no other injury is noted, hyphema requires close follow-up care with an ophthalmologist.
- Removal of a metal object may require follow-up treatment of a rust ring.

Chemical Burns

Chemical burns fall into one of three categories: alkali, acid, and neutral irritants.

- Alkali burns are the most dangerous. Alkalis (chemicals that have a high pH)
 penetrate the surface of the eye and can cause severe injury. Common alkali
 substances include lye, cement, lime, and ammonia.
- Acid burns result from chemicals with a low pH and tend to be less severe than alkali burns. The exception is a hydrofluoric acid burn, which is as

dangerous as an alkali burn. Acids usually damage the very front of the eye. Common acids causing eye burns include sulfuric acid, sulfurous acid (such as acid from an automobile battery), hydrochloric acid, nitric acid, acetic acid, chromic acid, and hydrofluoric acid.

 Neutral irritants tend to cause more discomfort to the eye than actual damage. Many household detergents fall into this category. Pepper spray is also an irritant. It can cause significant pain but usually does not affect vision and rarely causes any damage to the eye.

Medical Treatment for Chemical Burns

Wash the eye with at least 1 liter of fluid and, if necessary, test the pH of your eye and continue washing until the pH returns to normal. Administration of topical anesthetic eye drops to numb the eye and make washing less painful may be helpful. Wipe or irrigate away any solid foreign material in your eye. Your tetanus immunization status may be determined and updated.

- Minor burns prescribe antibiotic eye drops and oral pain medications. Dilating eye drops may also be administered.
- Significant burns may require admission to the hospital.

An ophthalmologist should evaluate the affected eye(s) within 24 hours after treatment.

Serious damage still reported at follow-up could require a corneal transplant or surgical reconstruction. Injury increases the risk of glaucoma, a boost in pressure in the eye. Several medications effectively treat this condition.

Medications for Chemical Burns

- Topical antibiotics in the form of eye drops or ointments to reduce risk of infection while healing.
- Topical steroids to reduce inflammation and to facilitate healing early in the recovery period after a chemical injury. These medications should be used judiciously, because they can cause long-term complications, such as infections and glaucoma.
- Other medications used to support corneal repair include topical citrate and ascorbate drops, oral antibiotics (e.g., tetracycline, doxycycline), and oral vitamin C.
- Glaucoma medications may be used temporarily to control the pressure.
- Pain medications and dilating eye drops are often also used to control pain and to aid recovery.

Surgery for Chemical Burns

Surgical measures are usually not undertaken early after chemical injuries.

- When severe, chemical injuries may necessitate surgery to the eyelids and the ocular surface.
- If the cornea becomes opaque (or cloudy) following a chemical injury, a corneal transplant may be required.

• Chemical injuries, especially from alkaline substances, can cause cataracts and glaucoma, which may require later surgical intervention.

Ultraviolet (UV) Burns (Welder's Flashburn)

The most common form of radiation burn is due to unprotected welding. "Arc eye" presents several hours after exposure with painful, weeping eyes. Excessive exposure to sunlight (e.g., snow blindness, tanning booths) is another common cause.

Symptoms include: Pain (mild to very severe), bloodshot eyes, light sensitivity, watery eyes, blurred vision, and the feeling of having something in the eye.

Medical Treatment for UV Burns

Mild flash burns heal in a few days. There usually is no lasting eye damage.

If treatment is required, it may include:

- Atropine drops to relax the eye muscles and ease pain
- Dressing cover the eye(s) with a padded dressing
- Antibiotics drops or ointment prescribed for use at home to stop infection
- Follow-up in 24 to 48 hours to check on healing

Thermal Burns

Thermal injuries most often result from direct contact with a hot object. Although these burns can affect a large ocular surface area, they are usually superficial. Symptoms are similar to a corneal abrasion and may include tearing, photophobia, or a foreign body sensation.

Medical Treatment for Thermal Burns

The treatment of isolated thermal corneal burns is usually similar to the treatment of corneal abrasions.

- Remove the offending agents, which may require lid eversion to remove debris. Irrigation also aids in debris removal as well as to cool the surface.
- Treat intraocular inflammation.
- When the lids are burned, cool saline compresses are needed, and adequate lubrications for the globe are important. The burned eyelashes and eschar may need to be removed.

Facial Contusion and Black Eye

Symptoms: Pain, swelling and discoloration, as well as some blurry vision and difficulty opening the eye.

Initial Treatment for Black Eye

Ice, pain relievers (avoid aspirin because it can predispose to bleeding), rest, and protection of the injured area

Signs of a more serious injury may include:

- Double vision
- Loss of sight
- Loss of consciousness
- Inability to move the eye
- Blood or clear fluid from the nose or the ears
- Blood on the surface of the eye itself
- Persistent headache

Surgery

Surgery is rarely a consideration for work-related eye complaints. In the absence of red flags, occupational physicians or primary care providers can safely treat most eye-related complaints. Most conservative treatment (such as non-steroidal anti-inflammatory ophthalmic drugs or non-prescription analgesics to relieve discomfort) for standard eye complaints including superficial foreign bodies, corneal abrasions, conjunctivitis, and ultraviolet radiation damage, will lead to healing within 48–72 hours. Return to modified work should be encouraged as the condition permits. If there is no sign of improvement after 48–72 hours, referral to a specialist is recommended.

Official Disability Guidelines (ODG) Return-To-Work Pathways - Open Wound of Eyeball

Modified work: 1 day

Regular work, loss of binocular-visual acuity, based on Department of

Transportation (DOT) rules: 14 days

ODG Return-To-Work Pathways - Corneal Abrasion

Medical treatment not required: 0 days

With eye patch, modified work: 0 days

With eye patch, regular work: 1 day

ODG Return-To-Work Pathways - Corneal Ulcer

Medical treatment not required: 0 days

Simple, one eye: 1 day

Simple, two eyes: 6 days

Dendritic: 14 days

ODG Return-To-Work Pathways - Acute Conjunctivitis

Modified work: 0 days

Regular work: 1 to 2 days

ODG Return-To-Work Pathways - Other and Unspecified Conjunctivitis

0 days

Viral, until cleared: 5 days

ODG Return-To-Work Pathways - Superficial Injury of Eye

Medical treatment not required: 0 days

With eye patch: 1 day

ODG Return-To-Work Pathways - Contusion of Eye

Superficial contusions: 0 days

Injury to eyeball without associated intraocular injury: 10 days

ODG Return-To-Work Pathways - Nystagmus and Other Irregular Eye Movements

0 days

ODG Return-To-Work Pathways - Disorders of Vitreous Body

Without surgery: 0 to 1 days

Vitrectomy, clerical/modified work: 21 days

Vitrectomy, manual work: 56 days

ODG Return-To-Work Pathways - Myopia

With glasses or contacts: 0 days

With laser correction: 2 days

With radial keratotomy (RK): 3 days

ODG Return-To-Work Pathways - Astigmatism

0 days

ODG Return-To-Work Pathways - Strabismic Amblyopia/Blurred Vision

0 days

ODG Return-To-Work Pathways - Subjective Visual Disturbances

0 days

ODG Return-To-Work Pathways - Color Vision Deficiencies

0 days except for certain occupations (e.g., pilots, electricians, jewelers, artists)

ODG Return-To-Work Pathways - Foreign Body

Slit lamp removal of ocular foreign body: 0 to 1 days

ODG Return-To-Work Pathways - Dry Eye

0 days

(See *ODG Capabilities & Activity Modifications for Restricted Work* under "Work" in the Procedure Summary of the original guideline document)

CLINICAL ALGORITHM(S)

None provided

EVIDENCE SUPPORTING THE RECOMMENDATIONS

TYPE OF EVIDENCE SUPPORTING THE RECOMMENDATIONS

During the comprehensive medical literature review, preference was given to high quality systematic reviews, meta-analyses, and clinical trials over the past ten years, plus existing nationally recognized treatment guidelines from the leading specialty societies.

The heart of each Work Loss Data Institute guideline is the Procedure Summary (see the original guideline document), which provides a concise synopsis of effectiveness, if any, of each treatment method based on existing medical evidence. Each summary and subsequent recommendation is hyper-linked into the studies on which they are based, in abstract form, which have been ranked, highlighted and indexed.

BENEFITS/HARMS OF IMPLEMENTING THE GUIDELINE RECOMMENDATIONS

POTENTIAL BENEFITS

These guidelines unite evidence-based protocols for medical treatment with normative expectations for disability duration. They also bridge the interests of the many professional groups involved in diagnosing and treating work-related eye injuries.

POTENTIAL HARMS

- Topical steroids should be used judiciously, because they can cause long-term complications, such as infections and glaucoma.
- Topical nonsteroidal anti-inflammatory drugs (NSAIDs) should be used with caution and under close monitoring, and the treatment should be promptly discontinued if corneal epithelial defects develop or worsen during treatment.
- Post-operative lid malposition can occur in a small percentage of cases following surgery for orbital floor fractures accomplished through transconjunctival and subciliary incisions.
- Patients with narrow angle glaucoma should not use ophthalmic vasoconstrictors except under the advice and supervision of a doctor. All users may experience temporary pupil enlargement.

IMPLEMENTATION OF THE GUIDELINE

DESCRIPTION OF IMPLEMENTATION STRATEGY

An implementation strategy was not provided.

IMPLEMENTATION TOOLS

Patient Resources

For information about <u>availability</u>, see the "Availability of Companion Documents" and "Patient Resources" fields below.

INSTITUTE OF MEDICINE (IOM) NATIONAL HEALTHCARE QUALITY REPORT CATEGORIES

IOM CARE NEED

Getting Better

IOM DOMAIN

Effectiveness Patient-centeredness

IDENTIFYING INFORMATION AND AVAILABILITY

BIBLIOGRAPHIC SOURCE(S)

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ADAPTATION

Not applicable: The guideline was not adapted from another source.

DATE RELEASED

2004 (revised 2008 Jan 3)

GUIDELINE DEVELOPER(S)

Work Loss Data Institute - Public For Profit Organization

SOURCE(S) OF FUNDING

Not stated

GUIDELINE COMMITTEE

Not stated

COMPOSITION OF GROUP THAT AUTHORED THE GUIDELINE

Editor-in-Chief, Philip L. Denniston, Jr. and Senior Medical Editor, Charles W. Kennedy, Jr., MD, together pilot the group of approximately 80 members. See the ODG *Treatment in Workers Comp* Editorial Advisory Board.

FINANCIAL DISCLOSURES/CONFLICTS OF INTEREST

There are no conflicts of interest among the guideline development members.

GUIDELINE STATUS

This is the current release of the guideline.

This guideline updates a previous version: Work Loss Data Institute. Eye. Corpus Christi (TX): Work Loss Data Institute; 2007 Apr 27. 56 p.

The Official Disability Guidelines product line, including ODG Treatment in Workers Comp, is updated annually, as it has been since the first release in 1996.

GUIDELINE AVAILABILITY

Electronic copies: Available to subscribers from the <u>Work Loss Data Institute Web</u> <u>site</u>.

Print copies: Available from the Work Loss Data Institute, 169 Saxony Road, Suite 210, Encinitas, CA 92024; Phone: 800-488-5548, 760-753-9995; www.worklossdata.com.

AVAILABILITY OF COMPANION DOCUMENTS

The following are available:

- Background information on the development of the Official Disability
 Guidelines of the Work Loss Data Institute is available from the Work Loss
 Data Institute Web site.
- Appendix A. ODG Treatment in Workers' Comp. Methodology description using the AGREE instrument. Available to subscribers from the <u>Work Loss Data</u> <u>Institute Web site</u>.

PATIENT RESOURCES

The following is available:

Appendix B. ODG Treatment in Workers' Comp. Patient information resources.
 2008.

Electronic copies: Available to subscribers from the <u>Work Loss Data Institute Web</u> site.

Print copies: Available from the Work Loss Data Institute, 169 Saxony Road, Suite 210, Encinitas, CA 92024; Phone: 800-488-5548, 760-753-9995; www.worklossdata.com.

Please note: This patient information is intended to provide health professionals with information to share with their patients to help them better understand their health and their diagnosed disorders. By providing access to this patient information, it is not the intention of NGC to provide specific medical advice for particular patients. Rather we urge patients and their representatives to review this material and then to consult with a licensed health professional for evaluation of treatment options suitable for them as well as for diagnosis and answers to their personal medical questions. This patient information has been derived and prepared from a guideline for health care professionals included on NGC by the authors or publishers of that original guideline. The patient information is not reviewed by NGC to establish whether or not it accurately reflects the original guideline's content.

NGC STATUS

This NGC summary was completed by ECRI on April 4, 2005. This NGC summary was updated by ECRI on January 18, 2006, November 9, 2006, March 29, 2007, and August 17, 2007. This NGC summary was updated by ECRI Institute on December 19, 2008.

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