Letters to the Editor

Send letters to Kenny Lin, MD, Associate Medical Editor for *AFP* Online, e-mail: afplet@aafp.org, or 11400 Tomahawk Creek Pkwy., Leawood, KS 66211-2680.

Please include your complete address, e-mail address, telephone number, and fax number. Letters should be fewer than 500 words and limited to six references and one table or figure.

Letters submitted for publication in *AFP* must not be submitted to any other publication. Possible conflicts of interest must be disclosed at time of submission. Submission of a letter will be construed as granting the American Academy of Family Physicians permission to publish the letter in any of its publications in any form. The editors may edit letters to meet style and space requirements.

Quality of Life After LASIK: The Picture Remains Hazy

Original Article: LASIK: A Primer for Family Physicians

Issue Date: January 1, 2010

Available at: http://www.aafp.org/afp/2010/0101/p42.html

TO THE EDITOR: I read the recent review article on laser-assisted in situ keratomileusis (LASIK) with interest. Although the basics of the procedure and potential adverse effects were outlined, several key aspects need to be discussed in further detail to give a more complete picture of refractive eye surgery.

The article states that LASIK appears to be safe. Those who have experienced adverse effects (e.g., decreased vision, lingering eye pain, dry eye) would likely disagree. In particular, dry eye seems to be common, with a 20 to 50 percent rate six months after surgery.[1,2] In most other areas of medicine, a 50 percent adverse effect rate would be considered unacceptable. In addition, there was no discussion of how long dryness may last, or how many patients experience permanent dryness. The reason appears to be that the answer is unknown. Because of these concerns, the U.S. Food and Drug Administration recently began a large-scale study to determine quality of life after LASIK.[3]

It is critical that patients and primary care physicians understand ophthalmologists' financial stake in the LASIK procedure. The laser costs hundreds of thousands of dollars, and many ophthalmologists own their own laser. Therefore, there is a clear financial motivation to perform more procedures. The potential for adverse effects may be downplayed, and patients may be encouraged to undergo the procedure before thoroughly exploring alternatives. To counter this financial incentive, it should be mandatory for all patients to get a second opinion from an independent ophthalmologist. In addition, ophthalmologists should be required to strongly encourage patients to try contact lenses before surgery.

Finally, we must consider the principle of primum non nocere—first, do no harm. Is LASIK surgery necessary, and do the benefits outweigh the risks? Patients may choose the procedure because the idea of eliminating glasses or contacts is appealing, but this is not an obvious medical indication, especially in light of the potential for adverse effects. According to industry statistics, more than 14 million laser vision procedures were performed in North America between 1997 and 2009.[4] A recent meta-analysis reported a 95.4 percent success rate.[5] Using these industry-accepted statistics, we can calculate that more than 600,000 Americans "failed" the procedure, a statistic combining adverse effects and poor vision quality. This should give us all reason to pause. Clearly, we need to learn more about the complications and long-term safety and effectiveness of refractive eye surgeries before they can be widely recommended.

BERT M. BIELER, MD
Cherry Hill, N.J.
E-mail: bbieler01@yahoo.com

Author disclosure: Nothing to disclose.

REFERENCES

1. Shoja MR, Besharati MR. Dry eye after LASIK for myopia: incidence and risk factors. *Eur J Ophthalmol.* 2007;17(1):1-6.
2. Sutton GL, Kim P. Laser in situ keratomileusis in 2010—a review. *Clin Experiment Ophthalmol.* 2010;38(2):192-210.
3. Mitka M. FDA focuses on quality-of-life issues for patients following LASIK surgery. *JAMA.* 2009;302(22):2420, 2422.
4. Fuerst RF. Will LASIK ever bounce back? *Review of Optometry.* October 20, 2009. http://www.revoptom.com/content/p/16190/c/16185/. Accessed August 26, 2010.
5. Solomon KD, Fernández de Castro LE, Sandoval HP, et al.; Joint LASIK Study Task Force. LASIK world literature review: quality of life and patient satisfaction. *Ophthalmology.* 2009;116(4):691-701.

IN REPLY: Dr. Bieler raises important issues regarding the safety and potential adverse effects of LASIK. To provide balanced and ▶

evidence-based recommendations for patients, family physicians should be aware of the risks and benefits of surgical procedures—particularly elective ones. It was my intention to review the existing evidence on the benefits and likely risks of LASIK.

The meta-analysis that Dr. Bieler cites reported a 95 percent satisfaction rate—not success rate—in patients who underwent LASIK.[1] Reasons for dissatisfaction included residual refractive error, halos, glare, and dry eyes. Quality of life was found to be better than that of persons who wear eyeglasses and similar to that of persons with normal, uncorrected vision.

My article reported a 20 to 40 percent rate of dry eyes six months after surgery. There is no evidence in the literature indicating how long this effect persists past that time. Some studies suggest that newer techniques are less likely to cause dry eyes, but the evidence was not strong enough to include in the article.

I agree with Dr. Bieler that the principle of primum non nocere applies, and that family physicians should help patients avoid harm by educating them about conditions we do not personally treat. The current options for nonsurgical vision correction may reduce the quality of life in persons with high degrees of myopia and astigmatism. Thick lenses, poor tolerance of contact lenses, and inability to see without eyeglasses may impede participation in certain activities. As long as patients understand the risks of refractive surgery, weigh them against the possible benefits, and choose the surgeon wisely, I believe the chance of unacceptable complications from LASIK can be reduced.

JOHN J. MESSMER, MD
Palmyra, Pa.
E-mail: jmessmer@hmc.psu.edu

Author disclosure: Nothing to disclose.

REFERENCES

1. Solomon KD, Fernández de Castro LE, Sandoval HP, et al.; Joint LASIK Study Task Force. LASIK world literature review: quality of life and patient satisfaction. *Ophthalmology.* 2009;116(4):691-701.

Case Report: Sebaceous Cell Carcinoma of the Upper Eyelid in an Older Patient

TO THE EDITOR: Sebaceous cell carcinoma of the eyelid is the fourth most common malignancy in the periocular region in the United States (basal cell carcinoma, squamous cell carcinoma, and melanoma are the leading three causes) and the second most common malignancy in China (basal cell carcinoma is the leading cause).[1,2] Diagnosis and therapy tend to be delayed because sebaceous carcinoma is often mistaken for benign entities such as chalazion, conjunctivitis, or blepharitis.[3]

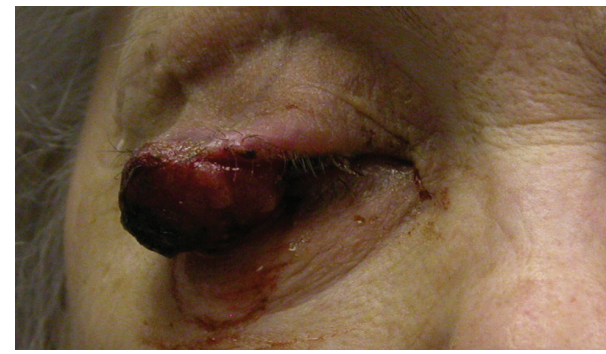

Figure. Sebaceous cell carcinoma nodule on the upper right eyelid.

A 74-year-old woman presented to her ophthalmologist with conjunctival erythema and slight tenderness of her upper eyelid. She was diagnosed with conjunctivitis and prescribed erythromycin 0.5% ophthalmic ointment. At her one-month follow-up visit, she continued to have erythema and had also developed a small tender papule. A diagnosis of chalazion was made, and the patient was instructed to continue her antibiotic ointment and to apply warm compresses four times daily to the eye. At her two-month follow-up visit, the papule had enlarged to a 2-cm nodule *(see accompanying figure)*. An excisional biopsy was performed, and pathology was consistent with a poorly differentiated invasive sebaceous carcinoma. Workup for metastases was negative. The patient underwent Mohs micrographic surgery for tumor extirpation. Oculoplastic reconstruction was performed with a tarsoconjunctival flap from the right lower lid and a free right retroauricular skin graft repair. She remained disease free at nine months.

The etiology of sebaceous gland carcinoma is idiopathic. It rarely occurs in childhood, with the highest frequency occurring in persons 60 to 79 years of age.[4] An association has been established between sebaceous carcinoma and Muir-Torre syndrome, which combines at least one sebaceous neoplasm (i.e., sebaceous adenoma, sebaceous epithelioma, or sebaceous carcinoma) and at least one visceral malignancy (usually gastrointestinal or genitourinary carcinomas).[5] Evaluation for Muir-Torre syndrome includes a rectal examination, colonoscopy or barium enema, and a first-morning urine sample for cytologic analysis.[6]

The diagnosis of sebaceous carcinoma should be considered in cases of persistence of conjunctivitis or chalazion despite appropriate therapeutic interventions.

JIYO SHIN, MD
Atlanta, Ga.
E-mail: sjyfree@gmail.com

DIAMONDIS J. PAPADOPOULOS, MD, FAAD, FAAP, FACMS, FASDS
WAYNE BLOUNT, MD, MPH
Atlanta, Ga.

Author disclosure: Nothing to disclose. ▶

REFERENCES

1. Rao NA, Hidayat AA, McLean IW, Zimmerman LE. Sebaceous carcinomas of the ocular adnexa: a clinicopathologic study of 104 cases, with five-year follow-up data. *Hum Pathol.* 1982;13(2):113-122.
2. Ni C, Searl SS, Kuo PK, Chu FR, Chong CS, Albert DM. Sebaceous cell carcinomas of the ocular adnexa. *Int Ophthalmol Clin.* 1982;22(1):23-61.
3. Kass LG, Hornblass A. Sebaceous carcinoma of the ocular adnexa. *Surv Ophthalmol.* 1989;33(6):477-490.
4. Pang P, Rodríguez-Sains RS. Ophthalmologic oncology: sebaceous carcinomas of the eyelids. *J Dermatol Surg Oncol.* 1985;11(3):260-264.
5. Barana D, van der Klift H, Wijnen J, et al. Spectrum of genetic alterations in Muir-Torre syndrome is the same as in HNPCC. *Am J Med Genet A.* 2004;125A(3):318-319.
6. Schwartz RA, Torre DP. The Muir-Torre syndrome: a 25-year retrospect. *J Am Acad Dermatol.* 1995;33(1):90-104.

Provocative Diagnostic Testing for Cervical Radiculopathy

Original Article: Cervical Radiculopathy: Nonoperative Management of Neck Pain and Radicular Symptoms

Issue Date: January 1, 2010

Available at: http://www.aafp.org/afp/2010/0101/p33.html

TO THE EDITOR: I read with interest Dr. Eubanks' article on nonoperative management of cervical radiculopathy. Because of the discomfort and expense associated with electrophysiologic and diagnostic imaging studies, it is desirable to have an accurate means to identify patients who need further evaluation.

A systematic review of six studies showed that in patients without neurologic deficits, positive results on the Spurling test, neck distraction test, and Valsalva test (each with low-moderate sensitivity and high specificity) are most useful for ruling in cervical radiculopathy, whereas a negative upper limb tension test result (high sensitivity and low specificity) is most useful for ruling it out.[1] In a blinded prospective study, positive results on the Spurling test, neck distraction test, and upper limb tension test coupled with a less than 60 degree cervical rotation toward the symptomatic side was associated with a positive likelihood ratio of 30.3 for detection of cervical radiculopathy compared with the reference standard of electromyography.[2]

In the classic Spurling test, the neck is passively hyperextended and laterally flexed toward the symptomatic side. The test is positive for cervical radiculopathy if axial loading to the top of the patient's head reproduces the characteristic pain and radicular features. A modification of the Spurling test without head compression has also been used. In the modified test, the neck is maximally extended and rotated to the symptomatic side, thus narrowing the neural foramen and possibly reproducing the patient's symptoms. Flexing and rotating the neck to the contralateral side opens the neural foramen and may improve the patient's symptoms.

One study reported that the classic Spurling test had a sensitivity of 50 percent (95% confidence interval [CI], 0.27 to 0.73) and a specificity of 86 percent (95% CI, 0.77 to −0.94). The modified test had a sensitivity of 50 percent (95% CI, 0.27 to 0.73) and a specificity of 74 percent (95% CI, 0.63 to 0.85).[2]

The neck distraction test is performed with the patient in a supine position. The examiner places one hand under the patient's chin and the other hand around the occiput, while simultaneously lifting the head and gradually applying an axial traction force of up to 10 to 15 kg. The test is positive for cervical radiculopathy if the pain is relieved with distraction force, indicating that pressure on nerve roots has been relieved. The test has been shown to have a sensitivity of 44 percent (95% CI, 0.21 to 0.67) and a specificity of 90 percent (95% CI, 0.82 to 0.98).[3]

The upper limb tension test is also performed with the patient in a supine position. The examiner places the patient's upper extremity into: (1) scapular depression; (2) shoulder abduction; (3) forearm supination with wrist and finger extension; (4) shoulder external rotation; (5) elbow extension; and (6) contralateral then ipsilateral cervical lateral flexion. The test is positive for cervical radiculopathy with reproduction or increase of symptoms with contralateral cervical side bending, or with a decrease in symptoms with ipsilateral side bending. This test has been shown to have a sensitivity of 97 percent (95% CI, 0.90 to 1.00) and a specificity of 22 percent (95% CI, 0.12 to 0.33).

DARRELL R. OVER, MD, MSc
Pine Bluff, Ark.
E-mail: dover@ahecpb.uams.edu

Author disclosure: Nothing to disclose.

REFERENCES

1. Rubinstein SM, Pool JJ, van Tulder MW, Riphagen II, de Vet HC. A systematic review of the diagnostic accuracy of provocative tests of the neck for diagnosing cervical radiculopathy. *Eur Spine J.* 2007;16(3):307-319.
2. Wainner RS, Fritz JM, Irrgang JJ, Boninger ML, Delitto A, Allison S. Reliability and diagnostic accuracy of the clinical examination and patient self-report measures for cervical radiculopathy. *Spine.* 2003;28(1):52-62.
3. Takasaki H, Hall T, Jull G, Kaneko S, Iizawa T, Ikemoto Y. The influence of cervical traction, compression, and Spurling test on cervical intervertebral foramen size. *Spine.* 2009;34(16):1658-1662. ■