Resource Column

Web Sites that Address Epidural Anesthesia for Childbirth

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Abstract

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Epidural analgesia has become a popular way to reduce pain during labor. Because epidural use is not limited to women who plan its use, but extends to some who originally planned a nonmedicated birth, it is important for the childbirth educator to provide information on this topic to all women. In this column, the authors provide examples of Web sites that address epidural anesthesia. Web sites for professionals and consumers are included. Encouraging the use of such resources by expectant parents can provide them with good information and allow the class time on this topic to be that of clarification.

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Epidural analgesia has become the method of choice for many women for pain relief during labor, even among some women who attend classes to prepare for a non-medicated birth. The use of epidurals has increased dramatically in the United States during the past two decades, with rates as high as 80% to 90% in some institutions. While much of the past research on the use of epidurals during childbirth has focused on maternal and neonatal safety, recent research has examined side effects (Mayberry, Strange, Suplee, & Gennaro, 2003). In order for women to make an informed choice regarding epidurals, they should be given a complete picture that includes potential side effects.

Epidurals are associated with increased rates of operative vaginal delivery, prolonged labor, fetal malposition, and intrapartum fever. Many experts have studied the relationship between epidural usage and cesarean

deliveries. Although no concrete evidence supports the claim that epidurals increase the risk of cesarean delivery, observational studies indicate a correlation between early administration of epidural analgesia and cesarean delivery. Evidence supports the claim that epidurals increase the duration of both the first and second stages of labor (Leeman, Fontaine, King, Klein, & Ratcliffe, 2003). Thus, a thorough coverage of epidural use is an important aspect of childbirth education classes.

This column highlights Web sites that address the pros and cons of epidural use during childbirth. Web sites are divided by their appropriateness for health-care providers and consumers. Despite viewing hundreds of sites, there seems to be a shortage on sites that *fully* explain epidural use in terms that, for example, young adolescents would be able to understand. Information on epidurals is often missing on many sites about birthing, or not enough detailed information is given to enable the woman to make an informed decision. The sites listed here represent some of the best Web sites on the topic.

Web Resources for Professionals

Journal Articles Available Online

Leeman, L., Fontaine, P., King, V., Klein, M. C., & Ratcliffe, S. (2003). The nature and management of labor pain: Part II. Pharmacologic pain relief [Electronic version]. *American Family Physician*, 68(6), 1115–1120.

- <http://www.aafp.org/afp/20030915/1115.html>

This Web page links to a two-part published article from the journal of the American Academy of Family Physicians. The article covers a 2001 evidence-based symposium on the nature and management of labor pain sponsored by the Maternity Association in New York City. Part I covers nonmedication support for labor pain. The above link connects to Part II, which focuses on the use of opioids, epidurals, nitrous oxide, and paracervical block. The effects of epidurals on labor and health outcomes for mother and infant are discussed, and a chart is provided to give a visual breakdown of the information. This Web page is suitable for professionals, due to the medically oriented language. It offers a good, detailed summary of what was discussed at the symposium. The above page also provides a link to Part I of this two-part article. Together, they are valu-

able reading for childbirth educators. The site also provides a link to a patient handout on the subject.

Leighton, B. (2002). The effects of epidural analgesia on labor, maternal, and neonatal outcomes: A systematic review. *American Journal of Obstetrics and Gynecology*, 186, S69–S77.

- <http://dx.doi.org> (then enter the DOI number: 10.1067/mob.2002.121813) (Note: A fee is required to view this site if accessed from a computer that is not registered as having an online subscription to this journal. Hospitals or university libraries that carry medical journals would most likely have such a subscription.)

This Web site is Science Direct, which is a link to an article published in the *American Journal of Obstetrics and Gynecology*. To view the whole article, click on the right-hand side entitled “PDF (85K).” The text is dense and detailed and best suited for health-care providers. The article provides an overview of studies that were conducted on the side effects of epidurals and the interventions that were used to manage the side effects. Table 1 outlines the various researchers, treatment groups, side effects, and outcomes. Table 2 outlines the comparison between epidurals and narcotic analgesia on the incidence of oxytocin augmentation. The tables provide a good visual breakdown of detailed information of the studies and their findings.

Lieberman, E. (1999). No free lunch on labor day: The risks and benefits of epidural analgesia during labor. *Journal of Nurse-Midwifery*, 44, 394–398.

- <http://dx.doi.org> (then enter the DOI number: 10.1016/s0091-2182(99)00057-9) (Note: A fee is required to view this site if accessed from a computer that is not registered as having an online subscription.)

This Web site is also Science Direct, which is a link to an article published in the *Journal of Nurse-Midwifery*. To view the whole article, click on the right-hand side entitled “PDF (173K).” The article was based on a paper that was presented at the 126th annual meeting of the American Public Health Association. The article presents results from several studies that examined the association of epidurals with intrapartum fever, cesarean delivery, and rate of delivery. It also discusses the influence of prenatal planning on epidural use. Several tables and figures are used to help explain the information. Interestingly, the article includes information on

the percentage of epidurals administered in relation to the size of the labor and delivery unit and the type of health-care provider used.

Mahlmeister, L. (2003). Nursing responsibilities in preventing, preparing for, and managing epidural emergencies. *Journal of Perinatal and Neonatal Nursing*, 17, 19–32.

- http://www.nursingcenter.com/library/JournalArticle.asp?Article_ID=407524

This Web site is a link to an article published in the *Journal of Perinatal and Neonatal Nursing*. The article reviews complications of obstetric epidurals and provides a table that outlines nursing actions when complications arise. A second table outlines contraindications of epidural use, and a dermatome model is added to illustrate the different levels of motor and sensory blockades. It clearly explains which levels indicate medical emergencies. The article concludes with a section on how to prepare for possible epidural emergencies. It has a table of contents, which can be downloaded and printed. References and a link to the journal are also provided.

Web Resources for Consumers

American Pregnancy Association (APA): Epidural Anesthesia

- <http://www.americanpregnancy.org/labornbirth/epidural.html>

The American Pregnancy Association promotes reproductive and pregnancy wellness. Their Web site is comprehensive and easy to navigate and provides a table of contents that allows one to go to a specific section. The site clearly explains what an epidural is, how it is given, and the pros and cons of epidurals. It also features a “FAQ” section and contraindications of epidural use. The site provides a toll-free telephone number and a link to e-mail questions.

Childbirth.org: Patients’ Guide to Local and Regional Anesthesia

- <http://www.childbirth.org/articles/labor/painrelief.html>

This Web site is a section of Childbirth.org, a comprehensive Web site that provides a wealth of information about pregnancy, childbirth, and caring for an infant. The site provides a detailed menu that makes it easy to navigate. Selecting “Labor” from the homepage takes you to a list of topics, including “Pain Relief in Labor,” which provides a comprehensive list of topics related to epidurals as well as other strategies to control and cope with labor pain.

The general Web site provides information on birth plans, including samples. This site is particularly useful for first-time mothers and pregnant adolescents to understand the process of childbirth and to plan for the birth process and care-giving of the infant. A section on birth stories might help the pregnant adolescent gain new insight. Older adolescents will find this site easy to understand.

Maternity Center Association: How Will I Cope with Labor Pain?

- <http://www.maternitywise.org/mw/topics/pain/options6.html>

This site is easy to read and understand. It explains how labor pain is different from other pain, and what labor pain is like. A link to different pain-coping options explains the various options available. Each link provides further information. A “Tips and Tools” link provides particularly useful information. The viewer can download a pain medications preference scale. This tool was designed to help clarify feelings about pain and pain relief in childbirth. The tool helps a woman determine her preference on labor-pain options.

References

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Eternity in a Child's Eyes

But if one feels the need of something grand, something infinite, something that makes one feel aware of God, one need not go far to find it. I think I see something deeper, more infinite, more eternal than the ocean in the expression of the eyes of a little baby when it wakes in the morning, and coos or laughs because it sees the sun shining on its cradle. If there is a "ray from on high," perhaps one can find it there.

—Vincent van Gogh
Letter to Theo, #242