

Dr. Dale M. Gallagher, Oral and Maxillofacial Surgeon, presents

Practical Practice Pearls

For Dental and Medical Professionals

This newsletter is often published monthly and contains useful information about current pharmacology and therapeutics, pathology, techniques, and procedures used for the management of diseases and conditions of the hard and soft tissues of the face and mouth. Please contact me to be added or removed from our fax list, and/or with your comments and suggestions for "Pearl Topics". Copyright 2005 by Dale M. Gallagher, DDS, PA, 12210 Pecan Street, Austin, Texas 78727 phone: 512 258-1636; fax: 512 258-6352; email: dgallagher@jawpain.com

The Five Points of Anesthesia Safety

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Every person considering surgery should consider anesthesia at least as important as the planned surgical procedure. The primary purpose of anesthesia (which means "no feeling") is to make a person comfortable, unaware, amnesic, and/or feel no pain during a surgical procedure.

There are many types of anesthesia ranging from local anesthesia ("shots" to make the surgical site "numb"), inhalational sedation (nitrous oxide "laughing gas"), oral sedation (pills or liquid medications taken before surgery), and many other separate and combinations of anesthetic techniques. This discussion refers to what people desire and need for most oral surgical procedures in the surgeon's office: Intravenous (IV) deep sedation or general anesthesia (going to sleep).

All anesthetic techniques have risks. Simply stated, the more complicated the anesthesia, the greater the potential risks. Obviously, for any surgical procedure it is more risky to have a general anesthetic than to receive only local anesthesia, but there are many other factors that make general anesthesia the best anesthetic choice (like being asleep and unaware) for oral surgery.

Intravenous anesthesia is extremely safe when the five points (guidelines) are followed. It behooves every patient to understand these safety points and discuss them with their surgeon/anesthesiologist prior to receiving surgery!

Five Points of Anesthesia Safety:

- Patient health.**
- Short procedures**
- Well equipped office**
- Using the minimum, but adequate, medications.**
- Well trained personnel, especially the doctor.**

Patient health. Obviously, young, healthy people are safer candidates for anesthesia than elderly people. Commonly, many people use medications for a variety of purposes. Both prescription medications (for blood pressure, diabetes, heart conditions, etc.) and non-prescription medications (vitamins, dietary and herbal supplements, cold remedies, etc.) effect the body's metabolism and, hence, may interact with anesthetics. It is extremely important for the anesthesiologist to be aware of the total health, and the medications that are regularly used, of the patient-candidate for anesthesia. Short procedures. Whereas short procedures/anesthetics can very safely be performed in the office environment, longer procedures should be considered for the hospital operating room. Other factors equally considered, longer procedures (lasting greater than an hour) have a greater risk to the patient than shorter ones lasting 20 or 30 minutes. This makes sense if you consider that for long longer surgical procedures compared to shorter ones more medications are required and the patient will be obtunded longer (i.e., requiring more comprehensive monitoring and skill by the anesthesiologist).

Well equipped office. The office surgical suite should have the same monitoring and emergency equipment as a hospital operating room. And, importantly, is there redundancy (at least two) of every piece of equipment? Oxygen monitors, heart defibrillators, suction machines, lights, oxygen tanks, and other equipment can break/fail to work properly, and in an emergency this can be life-threatening. Does the office have backup equipment? Is the equipment recently inspected, readily available, and is there a plan for quickly changing it if it fails in the middle of an anesthetic-surgical procedure?

Using the minimum, but adequate, medications. This point is inseparable from the fifth, and most important point: Well trained personnel, especially the doctor. This is the bottom line: Skill and experience of the doctor. Responsibility for the other four points resides with the doctor. Period!

For the patient who is deciding about surgery and anesthesia, it behooves you to know your doctor's training and experience, and the details of the facility where you will receive your treatment. For doctors that are referring patients for any surgery, consider that it is your ethical, and possibly legal, responsibility to recommend specialists that have exemplary anesthesia skills and clinical experience.

Simply stated, anesthesia performed in the surgeon's office should be performed for short procedures, on healthy persons, and by doctors extremely well trained and experienced in anesthesia, patient physical evaluation, and the management of all potential medical-anesthesia emergencies.

Oral and maxillofacial surgeons (OMS) are very unique specialists because they are the only specialty (other than 2+ year trained medical anesthesiologists) that receive at least 2-3 full months, and for some OMS, a year or more of anesthesia training in hospital operating rooms.

Dr. Gallagher completed 2 full years of anesthesia training and became an anesthesiologist before becoming an oral and maxillofacial surgeon. During the first year of anesthesiology residency he administered hundreds of anesthetics for all kinds of surgery such as obstetrics, trauma victims, and other emergency surgery for very sick people. He directed care for patients in the intensive care unit and supervised advanced cardiopulmonary resuscitations (CPR-ACLS). When he finished the first year of anesthesia residency he thought he knew a lot about anesthesia and patient care (and he did). After he completed his *second year* of anesthesia residency-fellowship, he then realized *what he did not know* after the first year, and how important the advanced anesthesiology expertise would be for his future patients (and the peace of mind it would convey to their families).

Dr. Gallagher has safely administered general anesthesia to over 10,000 persons during the past 28+ years. Now, and every day he administers anesthesia, he is thankful and appreciates the two years of formal anesthesia training he received. When asked why he trained for two years to become an anesthesiologist prior to becoming an oral surgeon, he says: "I became an anesthesiologist because I wanted to optimally offer a full range of anxiety and pain control in the safest possible way to all my oral surgical patients."