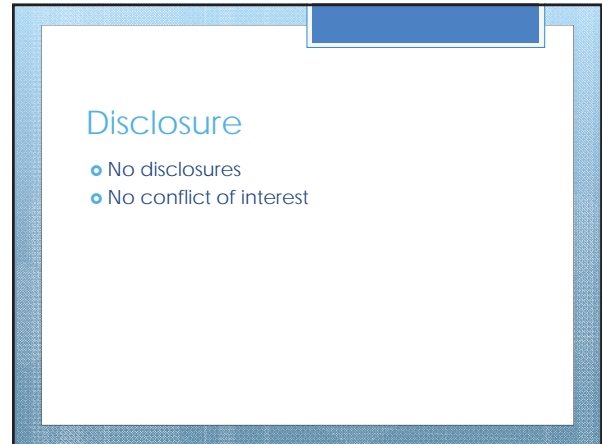


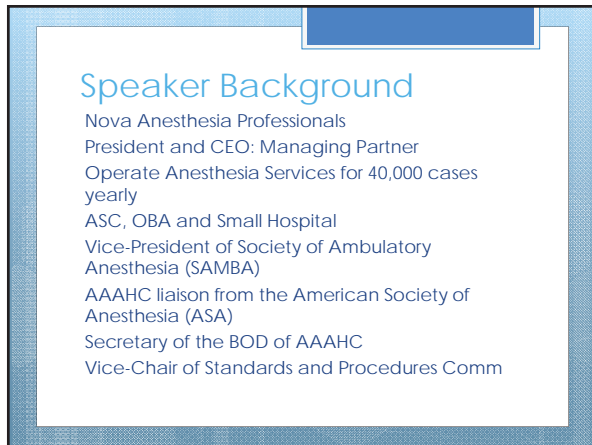
OBA Pearls and Pitfalls

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Managing Partner  
Nova Anesthesia Professionals



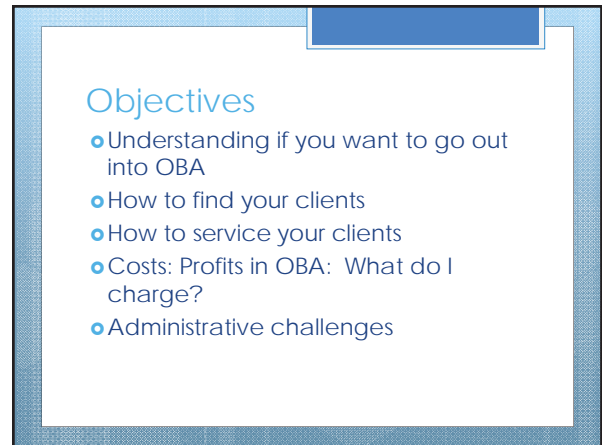
### Disclosure

- No disclosures
- No conflict of interest



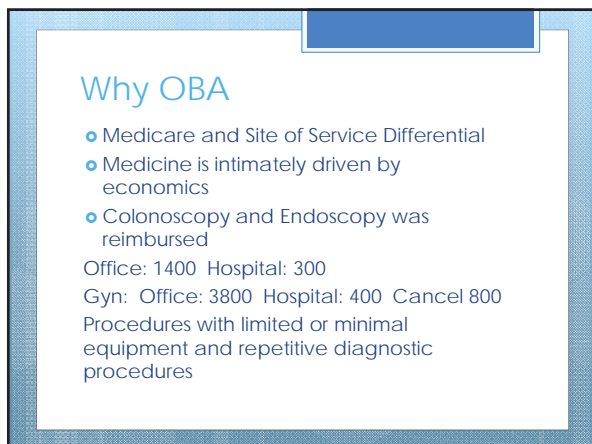
### Speaker Background

Nova Anesthesia Professionals  
President and CEO: Managing Partner  
Operate Anesthesia Services for 40,000 cases yearly  
ASC, OBA and Small Hospital  
Vice-President of Society of Ambulatory Anesthesia (SAMBA)  
AAAHC liaison from the American Society of Anesthesia (ASA)  
Secretary of the BOD of AAAHC  
Vice-Chair of Standards and Procedures Comm



### Objectives

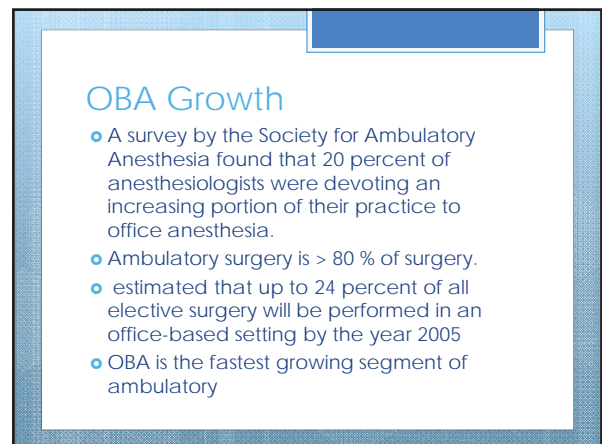
- Understanding if you want to go out into OBA
- How to find your clients
- How to service your clients
- Costs: Profits in OBA: What do I charge?
- Administrative challenges



### Why OBA

- Medicare and Site of Service Differential
- Medicine is intimately driven by economics
- Colonoscopy and Endoscopy was reimbursed

Office: 1400 Hospital: 300  
Gyn: Office: 3800 Hospital: 400 Cancel 800  
Procedures with limited or minimal equipment and repetitive diagnostic procedures



### OBA Growth

- A survey by the Society for Ambulatory Anesthesia found that 20 percent of anesthesiologists were devoting an increasing portion of their practice to office anesthesia.
- Ambulatory surgery is > 80 % of surgery.
- estimated that up to 24 percent of all elective surgery will be performed in an office-based setting by the year 2005
- OBA is the fastest growing segment of ambulatory

## Who is drawn to OBA

- Risk takers
- Lifestyle
- Control of day to day work
- Marry business and medicine
- Understand and keep up with the Medical Climate

## OBA Infrastructure

- Putting your infrastructure in place is the key to success and safety in OBA
- Many articles in past (Florida) on the lack of safety in the office.
- Most studies were poorly controlled and biased
- Data collected was retrospective
- Data skewed numbers and then were media sensationalized
- Many mistakes were made, many could have been prevented due to appropriate peri-operative infrastructure and preparedness

## The Necessary Elements

Anesthesia Delivery in any location should include critical elements of safety and medical care

- Facility safety
- Practice, practioner and procedure selection
- Appropriate equipment and supplies
- Patient selection
- Patient and practice expectations
- Post procedure follow-up and communication
- Quality of Care review

## What will your space look like?



## What will your space look like?



## What will your space look like?



## Facility Safety

- Ensure the elements of safety in your anesthetizing location
- Is the room large enough? If you are on the 2<sup>nd</sup> and greater floors, how will you get out in an emergency?
- What will you do if the power goes out? Back-up generator? How long do your monitors and suction last on back up batteries? Enough power outlets? Lighting? Counter work space?
- Is there easy phone access? How long does it take 911 to respond? What staff are ready to help you?
- Can you admit the patient to the nearest hospital?

## Facility Safety

- Three scenarios to have an emergency plan for. Organize your response down to the details. Educate the "helpers" in the location as to their role. Update the plan as necessary (review yearly)
  - Fire
  - Cardiac arrest
  - Electrical failure
  - Intra-op crisis i.e. MH, difficult airway, surgical event
- Locally-appropriate natural emergencies

## Equipment and Supplies

- On the truly mobile platforms, you have to ensure **everything** you need will be there. **Do not** begin with anything missing.
- Monitors, medications, disposable supplies, oxygen, suction, "crash cart" supplies.
- How will you get it there and who will safeguard its working condition and outdates of drugs etc.

## Do I need an anesthesia machine?

- Streamline your needs
- Source of positive pressure ventilation
- Oxygen source that is plentiful and flow is controlled
- If you have a machine, need O2 source that is 50 psi regulated
- Many dental piped systems can be adapted for positive pressure
- Require suction: Plug in or battery powered



## Setting Up a Mobile Practice Two Types

- The Stationary Practice with Monitors and Carts on Premises
- The Completely Mobile Practice for Sporadic Clients



### Practioners, Practices, Procedures

- Who will you do what with?
- Research your surgical colleagues and observe their surgical skills. Network with the medical community to evaluate the experience or lack thereof of your surgical partners.
- Begin each relationship safely with less aggressive procedures until you are sure of success and patient safety.
- You may vary your criteria depending on facility (free standing ASC, attached to hospital, in a strip mall) and the ability and experience of the practioner.

### Physician and Practice Selection

- Know your surgeon and their skills
- Check their licensure, run national data bank and check their reputation in the area
- Remember we enable every surgeon to do more

### How do you get business?

- Network with local docs, within your practice, local medical society
- Network with corporate entities
- Marketing
- RFP submission and process
- Be ready to provide service

### Contracting

- Have and Negotiate a Contract
- What will be your obligations and what will be theirs
- How will payment be structured and collected
- Who will bring what and who will be responsible for it financially
- How will communication between you (your office) and them work.
- Know who your competition is

### Calculating what to charge?

- Know your value and your costs
- Know the relative charge of your competition ie other groups and other providers such as CRNA's
- Be ready to explain the cost effectiveness of your service

### Processes for Patient Evaluation and Selection

- First patient encounter is in the surgeons office. In-service and regularly educate the surgeon and surgical office staff as to your selection criteria and your flow plan for patient selection. Help them understand who you will send to the hospital and why.
- Familiarize them with your testing charts so they can begin ordering appropriate tests immediately.
- Encourage as much pre-op time to collect information as possible. They should schedule the patient and communicate the information with your office ASAP.

### Patient Selection

- Set up selection criteria by acuity and practice
- Not every site can do all the same patients
- Periop support services may differ within your sites and pts selection must be selective to site support services
- DISCUSS PT SELECTION with Surgeon
- UPDATE SURGEON and SITE regularly
- ASA I, II and stable III
- Obviously no one who needs blood, major resuscitation, invasive monitors or pain that cannot be controlled

### Procedure Selection

- Legalities in your state
- Usually no invasion of major body cavities
- Surgeon should have privileges to do procedure in nearby hospital
- Surgeon should be able to transfer pt to nearby hospital
- If Dentist, have a transfer agreement in place

### Patient Evaluation and Selection

**PRE-PROCEDURE TESTING RECOMMENDATIONS FOR OFFICE BASED ANESTHESIA**  
 (These tests may be needed for administration of anesthesia and are not intended to limit those required by surgeons for issues specific to their surgical management)

- **For healthy individuals under the age of 50, with no** comorbid conditions, undergoing minimally invasive procedures (cataracts, GI, Dental, diagnostic imaging, minor GYN, urological procedures) : NO specific preoperative tests are indicated. Patients must have current history and physical.
- **Testing for asymptomatic patients for moderately invasive surgery** (Liposuction, Facelifts, Breast Augmentations, Laparoscopy, Arthroscopy, and other plastic and cosmetic procedures.)

TEST	MALE	FEMALE
Hgb/Hct	50 and older	>Age 12
EKG (within 1 yr.)	If metabolic equivalent score <5 and comorbid disease	
Beta HCG	N/A	Child Bearing Age*

\*Pregnancy tests are offered to patients if they think they could be pregnant and if LMP shows missed periods.

## Patient Evaluation and Selection

For patients over the age of 50 a history and physical within the past 6 months by a primary physician is recommended. For patients with comorbid conditions (e.g. HTN, CAD, DM) a recent history and physical is needed to establish that the patient's comorbid conditions are at their maximal medical management for undergoing an elective procedure with anesthesia. Testing would be selected to identifies changes in health. Patients with comorbid conditions (HTN, CAD, DM, Pulmonary disease) may require additional testing within 1 month or interval as indicated, and it will need to be disease specific.

TEST	DISEASE
<ul style="list-style-type: none"> <li>o EKG</li> <li>o Glucose</li> <li>o Electrolytes</li> <li>o BUN/Cr</li> <li>o CXR</li> </ul>	HTN, CAD, CVD, DM, Arrhythmias  Diabetic: can be serum or glucometer reading on  Patients on diuretics Renal disease If indicated by primary MD for advanced pulmonary disease

## Patient Evaluation and Selection

- o Provide patient questionnaire's and demographic collection forms that the office or patient may fax in.
- o If no information is available "cold call" patients to begin collection of historical medical data.
- o Nursing staff trained to obtain anesthesia relevant medical information.
- o Aim to avoid all last minute cancellations and schedule gaps.
- o Send pre and post procedure (consent) information out to the patient well in advance prior to the surgical date.

## Lessons Learned

- o Is OBA for everyone?
- o NO
- o It is not for:
  - o People who think it is easy or do not want to work hard at work
  - o People with lacking social skills ability
  - o People who are poor communicators
  - o People who are not comfortable without "safety net" of people
- o The new graduate

## Lessons Learned

- o In OBA you and your infrastructure keep it safe.
- o Most studies/reports that highlight adverse outcomes are based on
  - o improper patient selection,
  - o delay in diagnosis,
  - o delay in transfer to acute care,
  - o inappropriate skill set for task
- o Inadequate equipment and supplies

## Lessons Learned

Original contribution

### A survey evaluating the training of anesthesiology residents in office-based anesthesia

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Received 5 November 2005; revised 28 February 2006; accepted 1 March 2006

## OBA Training

- o A 14-question survey was sent to the 134 listed members of the Society of Academic Anesthesia Chairs/Association of Anesthesiology Program Directors to elicit the current status of educational endeavors and clinical exposure of anesthesiology residents to this type of practice.
- o Main Results: There were 95 respondents (72%). Fifteen (15.8%) academic anesthesiology programs
- o provide OBA services in the community and two (2.1%) of the academic programs provide clinical exposure to their residents.
- o Conclusions: Residents are receiving minimal, if any, exposure to OBA during their training.

## OBA Data

- We report two years of data from multiple (7) OBS practices across the country. **37,669 OBA cases**
- Members of the 2008 and 2009 SAMBA OBA retrospectively collected 2008 data for their practice. 2009 data was collected immediately retrospectively. Data collected included: type of surgery, type of anesthesia, type of airway utilized (ETT, supraglottic airway, none) and primary anesthetic agent.
- Results: Data was collected from seven practices over 2 years and included 37,669 cases. 83% of cases were performed with deep sedation/general anesthesia without an airway device. Only 6% of cases required intubation

## OBA Data

### Complications

• Cancellations	1,205	3.2%
• Cardiovascular complaints	290	0.77%
• Common postop sequela	183	0.49%
• Postop N/V after discharge	149	0.4%
• Nausea/vomiting in PACU	100	0.27%
• Unplanned intubations	31	0.08%
• Laryngospasms	25	0.07%
• Unplanned admissions	24	0.07%

## OBA Data

- **Extremely Rare Complications (<0.05%)**
- Reversal of narcotics and/or benzodiazepines 17
- Bronchospasms 13
- Prolonged PACU stays 11
- Patients returned to the OR 5
- Medication errors 6
- Aspirations 4
- Dental injury 3
- Wrong site surgery 2
- Discharged without escort 2
- Deaths 0

## OBA Data

- Overall complication rates were very low with cancellations being most frequent.
- Minor complication rates were all below 1%.
- Unplanned admission rates were 0.08%.
- 6 incidents of medication error, four aspirations, two wrong site surgeries, and two patients discharged without escort. No deaths were reported.

## Lessons Learned

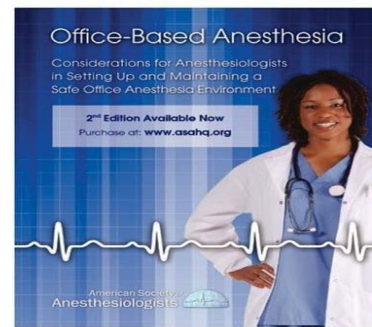
- Ambulatory is the fastest growing segment of anesthesia services
- Within Ambulatory, OBA is the fastest growing segment
- You cannot ignore the growth of this segment
- It allows for the ultimate in control of your work schedule and your patient care environment
- It is the most work of all the anesthesia fields as it is anesthesia and the running of an anesthesia department from nuts to bolts
- It allows you to CHOSE who you work with!

## Bibliography

- Vila H, Desai MS, Miguel RV. Office-Based Anesthesia. In: Twersky RS, Philip BK, eds. *Handbook of Ambulator y Anesthesia*, 2nd ed. New York: Springer Science + Business Media, LLC,2008:283-324.
- 2008 Revision of Office Based Guidelines Twersky, R. Philip, B. et al. *Considerations for Setting Up and Maintaining a Safe Office Anesthesia Environment*. 2008 2nd edition and revision, original 2000 ASA publication.

## Bibliography

- Hausman L, Rosenblatt M: Office Based Anesthesia; in: Barash PG, Cullen BF, & Stoelting RK (eds):
- Clinical Anesthesia, 6<sup>th</sup> ed. J.B. Lippincott Company, Philadelphia, PA 2008. Pages: 1345-57
- Steele SM, Nielsen KC, Klein SM (eds): Ambulatory Anesthesia & Perioperative Analgesia. McGraw-Hill Companies, Inc., 2005. Pages: 345-355
- Shapiro FE (ed): Manual of Office-Based Anesthesia Procedures. Lippincott Williams & Wilkins. 2007



## Questions ?

