



Local Anesthesia Administration for NC Dental Hygienists

CEUs: 24 hours

16 hours lecture or self-instruction

8 hours hands-on clinical

Program Format:

Due to the nature of the didactic materials, registrations will close two weeks prior to the course. Participants must attend the live, hands-on session, pass the written examination and finish all web-based, self-instruction and observational criteria to complete the program.

Live Portion: Hands-on Participation Schedule

Saturday 8 hr. clinical 8 am - 4pm

Course Fee:

\$ 1,600 - includes taxes and registration fees

*Optional Textbook (not included in fee) Handbook of Local Anesthesia by Malamed, Stanely F.

Course Dates:

October 30th

November 13th

November 20th

December 11th

Location: Greenville, NC

Register online at Down East Dental Institute – Local Anesthesia Administration for NC Dental Hygienists

For more information contact:

info@downeastdentalassociation.com

Local Anesthesia Training for NC Dental Hygienists

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NC Senate Bill 146

SECTION 2.(a) G.S. 90-221(a) reads as rewritten: "(a) "Dental hygiene" as used in this Article shall mean the performance of the following functions: Complete oral prophylaxis, application of preventive agents to oral structures, exposure and processing of radiographs, administration of medicaments prescribed by a licensed dentist, preparation of diagnostic aids, and written records of oral conditions for interpretation by the dentist, together with such other and further functions as may be permitted by rules and regulations of the Board not inconsistent herewith. Notwithstanding the provisions of G.S. 90-29(b)(6), dental hygiene shall include the administration of local anesthetics by infiltration and block techniques by dental hygienists certified pursuant to G.S. 90-225.2, if a dental hygienist conducts administration of local anesthetics under the direct supervision of a dentist licensed to practice dentistry under Article 2 of this Chapter."

§ 90-225.3. Requirements to administer local anesthetics for licensed dental hygienists; reciprocity. (a) The Board may approve a dental hygienist licensed in this State or any other state or territory to provide local anesthesia upon the dental hygienist meeting all of the following criteria:

- (1) Produces satisfactory evidence of the required education, training, and clinical qualifications to provide local anesthesia. Senate Bill 146 Session Law 2021-95 Page 5
- (2) Has been practicing dental hygiene, as defined in G.S. 90-221, under the supervision of a licensed dentist for a minimum of two years immediately preceding the date of the application.
- (3) Has successfully completed a course of study on local anesthetics offered through a school or college approved by the United States Department of Education or a Board-approved continuing education provider that includes all of the following:
 - a. A minimum of 16 lecture hours on pharmacology, physiology, equipment, block and infiltration techniques, legal issues, and medical emergencies, including systemic complications.
 - b. A minimum of eight clinical hours of instruction and experience in administering local anesthesia injections.

- c. Completion of at least 12 block and 12 infiltration injections under the direct supervision of a licensed dentist who must certify the applicant's competency.

Faculty

Trey Harris, DMD

Bobby Davis, DDS

Course Description

Today's dental hygienist must be knowledgeable in all aspects of the hygiene profession including providing local anesthesia administration to provide comfort to the dental patient. This course provides the participant with the knowledge, mechanics, and skill set to create a comfortable, efficient, and positive patient interaction through pain and anxiety management.

All aspects of local anesthesia will be discussed and studied, from neurophysiology to regional anatomy and pharmacology. These subjects will be geared all towards the clinical application of the topic with the common goal of successfully managing patients requiring local anesthesia.

Focus will be on managing periodontal patients, with emphasis on providing useful clinical tips to utilize quality local anesthesia administration.

Participants will be required to pass didactic examination before proceeding to clinical skills, where participants shall be required to successfully administer 12 nerve blocks and 12 local infiltrations. Participants will be serving as both operator and patient for clinical portions of this course.

The participant should realize that proficiency in local anesthesia administration requires repeated administration and re-education. Course materials will be given to participants to keep, as to allow for seamless transition back to their practices.

Pre-Requisites

Due the Monday prior to the course.

- Read and study textbook (listed under Optional Materials) and Course Curriculum Guide
- View, read and study all course lectures and instruction and Course Curriculum Guide
 - Participants are expected to study lecture presentations
- Complete all online course assignments

Since **you will be serving as both an operator and a patient**, we need the following paperwork submitted in compliance with DEDI policies. These forms are best submitted via email to info@downeastdentalassociation.com.

- Copy of current NC license
- Copy of current CPR/BLS card
- Copy of current OSHA and HIPPA training certificate

- Complete DEDI Medical Questionnaire and Health History Forms (**All participants are expected to practice as both a patient and an operator**)
- Copy of Local Anesthetic Participant Consent
- Copy of Marketing Form
- Copy of HepB Verification (titers are acceptable)

If prerequisites are not met by due date, participation in clinical course will be denied without reimbursement.

You must have also been practicing dental hygiene for 2 full years before you are eligible to take this course. Refer to the NC Dental Board website for more information.

Course Goals

The goals of this class are to assist the dental hygienist to become:

- 1) Knowledgeable in the use and administration of local anesthetics
- 2) Knowledgeable in the pharmacology, neurophysiology, neurochemistry and anatomy related to the administration of local anesthetics
- 3) Knowledgeable and competent in the physical and psychological evaluation of the patient prior to receiving local anesthetic or dental treatment
- 4) Knowledgeable in the side effects, complications and the management of those problems associated with local anesthetics

Course Objectives

At the conclusion of the course, participants will be trained in:

- 1) Recognition, Prevention, and Management of Medical Emergencies
- 2) Medical Assessment of the Patient
- 3) Management of Pain and Anxiety
- 4) Head and Neck Anatomy
- 5) Pharmacology of Local Anesthetics
- 6) Pharmacology of Vasoconstrictors
- 7) Armamentarium and Infection Control
- 8) Techniques of Local Anesthesia
- 9) Complications and Legal Considerations

Evaluation

Cognitive Assessment: Participants will be evaluated by quizzes and a final written examination. Required passing score is 90%.

Clinical Assessment: Participants are required to complete 12 nerve blocks, and 12 local infiltrations. These must be successful administrations with success rate of 80%

Grade Weights:

Cumulative Final: 75%

Lab activities: P = Pass

Remediation for this course will consist of a written assignment and then an oral examination with the course director. Participants not receiving a "pass" in the didactic or clinical session must remediate by participating in a remediation clinical session.

DEDI curriculum

Formal Training: 16 hr. Didactic (16 hr. web-based and self-instruction)

0.5 hr. Introduction

- A. NC Senate Bill 146
- B. Course Overview
- C. Application for Certification
- D. Effective Dates

1.5 hrs. Medical Assessment of Patient

- A. Medical History
- B. Review of Systems
- C. Pulmonary Evaluation
- D. Cardiovascular Evaluation
- E. Performing and Interpretation of Vital Signs
- F. ASA Classification
- G. Case-based Learning Session

2.5 hrs. Emergency Medical Procedures

- A. Monitoring Vital Signs
- B. Basic Life Support
- C. Emergency Equipment and Preparedness
- D. Recognition of Common Medical Emergencies and Treatment
- E. Vasodepressor Syncope

- F. Orthostatic Hypotension
- G. Adrenal Insufficiency
- H. Airway Obstruction
- I. Hyperventilation
- J. Asthma
- K. Diabetes Mellitus
- L. Cerebrovascular Accident
- M. Seizures
- N. Angina
- O. Myocardial Infarction
- P. Drug Overdose
- Q. Allergy

1 hr. Management of Pain and Anxiety

- A. Physical and Psychological Evaluation
- B. Non-pharmacologic reduction of pain and anxiety
- C. Neurophysiology
- D. Evaluation of Anesthetic Choice
- E. Analgesic Agents – Topical Anesthetics

2 hrs. Head and Neck Anatomy

- A. Muscles of Mastication
- B. Muscles of Facial Expression
- C. Facial Spaces
- D. Trigeminal Nerve and Associated Vasculature

1 hr. Pharmacology of Local Anesthesia

- A. Mechanism of Action
- B. Classification
- C. Metabolism
- D. Recommended and Maximum Doses
- E. Drug Interactions and Side effects

0.5 hr. Pharmacology of Vasoconstrictors

- A. Mechanism of Action
- B. Use with Local Anesthetics
- C. Specific Agents
- D. Toxicity
- E. Recommended and Maximum Dosages
- F. Contraindications

1 hr. Armamentarium and Infection Control

- A. The Syringe
- B. The Needle
- C. The Carpule
- D. Preparation of Armamentarium

4 hrs. Techniques of Local Anesthesia

- A. Techniques of Maxillary Anesthesia
- B. Techniques of Mandibular Anesthesia
 - 1. Basic Injection Techniques
 - 2. Anatomical Considerations
- C. Local Anesthesia Considerations

2 hrs. Complications and Legal Considerations

- A. Local Complications
- B. Systemic Complications
- C. Legal Considerations

Written Examination

8 hr. Clinical Experience

The clinical course hours will be as follows:

8 hours in the clinic providing local anesthesia consisting of documentation for all maxillary and mandibular techniques (will include a practical examination to evaluate competency to serve as clinical assessment).