

California State University, Fresno
Department of Communicative Disorders and Deaf Studies

CSD 216 – Seminar in Voice Disorders

**DEPARTMENT OF COMMUNICATIVE DISORDERS AND DEAF STUDIES’
MISSION STATEMENT**

The mission statement of the Department of Communicative Disorders and Deaf Studies at CSUF is to disseminate knowledge and to train professionals in speech-language pathology, audiology, deaf education, and interpreting who will provide quality service to the public. The Department will accomplish this mission by providing a stimulating learning environment for enhancing personal and educational development, promoting understanding of people with various cultures, and offering opportunities for research and scholarship in communicative disorders and deaf studies.

COURSE DESCRIPTION

The purpose of CSD 216 is to provide students with the opportunity for advanced study in the area of voice disorders. This course will include a comprehensive examination of current methodologies for the diagnosis and treatment of childhood and adult vocal pathologies. It will also include a comprehensive review of the anatomy, physiology and neurology associated with voice production.

COURSE GOALS AND OBJECTIVES

Following successful completion of this course students will demonstrate:

1. An understanding of the risk factors and etiologies associated with voice disorders through written descriptions, the development of appropriate case history questions, the development of a “vocal hygiene program”, and written examinations requiring them to do so.
2. The ability to identify specific voice disorders given the acoustic properties of the voice and physical characteristics of the vocal folds through participation in class discussions, written examinations requiring them to do so, and completion of a lab assignment requiring them to review at least five disorders in the Video Library.
3. An understanding of the components of a thorough voice assessment including the gathering of Case History information; clinical tasks used to assess loudness, pitch, quality and resonance; the use of instrumentation such as the CSL; and laryngoscopy, through class participation and the successful completion of Lab Assignments requiring them to do so.
4. The ability to accurately identify appropriate interventions given a specific voice disorder, including voice disorders associated with gender identity and expression (e.g., puberphonia and gender reassignment), through written exams and/or class presentations for assigned “facilitating techniques”.

5. An understanding of recent literature and evidence-based practice regarding the assessment and treatment of voice disorders through successful completion of a literature review, annotated bibliography, and/or well-supported research paper on an assigned voice topic.

BLACKBOARD

The syllabus, course outline, laryngeal illustrations and other important class information will be posted on the CSUF Blackboard. To access this information, please go to <http://blackboard.csufresno.edu> or access it through the “My Fresno State” web site by selecting the “Digital Campus” option. You will need to log in using your Fresno State e-mail name and password. If you have trouble logging in, you can still access the information utilizing the “guest access” option. If you have difficulty, or have questions regarding use of the Blackboard, contact the Digital Campus Office at 278-6892, or e-mail them at digitalcampus@listserv.csufresno.edu

REQUIRED TEXTS AND READINGS

Stemple, J., Glaze, L., & Klaben, B. (2010). *Clinical Voice Pathology: Theory and Management* (4th ed.) San Diego: Plural Publishing [ISBN# 978-1-59756-348-2]

ATTENDANCE POLICY

Regular attendance is mandatory. It is important to realize that missing one class is equivalent to missing an entire week’s worth of classes. As graduate students, you understand that this is not acceptable. Poor attendance or tardiness may result in a deduction of up to 50 points from your class total. This course covers complex subject matter that may not be explained clearly in the reading materials alone. Having said this, it is understood that serious and compelling situations do arise whereby an absence may become necessary. Following such an excused absence, it is the student’s responsibility to obtain the class information from another student.

COURSE REQUIREMENTS

Your grade will be based on 3 or 4 examinations, a paper (annotated bibliography) and lab assignments. The annotated bibliography is worth 50 points and the lab assignments are worth 10 points. Exams will likely be worth 50 to 100 points. The total number of points for the class will be determined later, depending on whether I split it into 3 or 4 exams. This will be finalized as the class goes forward. Class participation will also be considered at the time grades are assigned.

GRADING CRITERIA

The total number of points earned on the three tests, lab and paper will be summed. The final grade will be assigned according to the following criteria:

90-100% = A

80-89% = B

70-79% = C

60-69% = D

0 -59% = F

ANNOTATED BIBLIOGRAPHY

You will complete an annotated bibliography on a specific voice disorder that you select. The annotated bibliography will contain a minimum of 10 references. The references you select should be research-based articles from peer reviewed journals. Look for articles that explore areas related to the assessment and treatment of your disorder. The content of an annotated bibliography will be reviewed in class. Assignments need to be neatly typed, using APA (6th ed.) format. Annotated bibliographies are due on _____ – no late assignments will be accepted.

STROBOSCOPY AND CSL ASSIGNMENTS = TBA

ADDITIONAL REQUIREMENTS

In accordance with procedures of CSUF, withdrawing from one or more classes after the second week of instruction can only be done for serious and compelling reasons. A serious and compelling reason typically includes a medical, emotional or other highly extenuating circumstance that precludes completion of the class.

All tests must be taken at the assigned time. Make up tests will only be given in cases of extreme emergency with a documented legal or medical excuse. Tape recording lectures is permissible.

CHEATING AND PLAGIARISM: “Cheating is the actual or attempted practice of fraudulent or deceptive acts for the purpose of improving one’s grade or obtaining course credit; such acts also include assisting another student to do so. Typically, such acts occur in relation to exams. However, it is the intent of this definition that the term ‘cheating’ not be limited to exam situations only, but that it includes any and all actions by a student that are intended to gain an unearned academic advantage by fraudulent or deceptive means. Plagiarism is a specific form of cheating which consists of the misuse of published and/or unpublished works of others by misrepresenting the material so used

as one's own work." Penalties for cheating and plagiarism range from a no credit or F on a particular assignment, an F for the course, to expulsion from the University. *Because the instructor cannot objectively determine a student's intentions, he/she will consider student behavior that is consistent with cheating or plagiarism to be cheating or plagiarism. It is the student's responsibility to avoid any suspicious behaviors.*

CIVILITY AND DISRUPTIVE CLASSROOM BEHAVIOR: "The classroom is a special environment in which students and faculty come together to promote learning and growth." Students are expected to treat the instructor and each other with civility, common courtesy and respect. Student conduct which disrupts the learning process shall not be tolerated and may lead to disciplinary action and/or removal from class. The use of pagers, telephones, or other devices that are disruptive during class is prohibited; such devices must be turned off during class.

REGARDING SPECIAL NEEDS: If you have special needs as addressed by the Americans with Disabilities Act (ADA), please contact me immediately. It is the responsibility of students with disabilities to identify themselves to the university and to the instructor. Upon identifying themselves to the instructor and the university, students will receive reasonable accommodations for learning and evaluation. For more information, contact Services to Students with Disabilities in Madden Library 1049 (278-2811).

Tentative Course Schedule

_____ Review Syllabus

Lecture: Unit I: *Introduction*

Unit II: *Anatomy & Physiology*

Readings: Stemple, Glaze, & Klaben, ch. 1 & 2

_____ Lecture: Unit II: *Anatomy & Physiology (cont.)*

Readings: Stemple, Glaze, & Klaben, ch. 2

_____ **Exam #1** exam on Units I – II

Lecture: Unit III: *Etiologic Correlates*

Begin Unit IV: *Pathologies of the Laryngeal Mechanism*

Readings: Stemple, Glaze, & Klaben, ch. 3 & 4

____ Lecture: Unit IV: *Pathologies of the Laryngeal Mechanism*

Readings: Stemple, Glaze, & Klaben, ch.

____ Lecture: “ ” “ ” Lab #1 (8:20-9:00)

____ Lecture: “ ” “ ” Lab #2 (8:20-9:00)

____ **Visit to CCENT**

____ **Exam #2** – Units III & IV

Lecture: Unit V: Assessment Lab #3

____ Lecture: Unit V: Assessment Lab #4

Readings: Stemple, Glaze, & Klaben, ch. 5

____ Lecture: Unit V: Assessment Lab #5

Readings: Stemple, Glaze, & Klaben, ch. 5 & 6

____ Lecture: Unit VI: Treatment Lab #6

Readings: Stemple, Glaze, & Klaben, ch. 7

____ Lecture: Unit VI: Treatment Lab #7

Readings: Stemple, Glaze, & Klaben, ch. 7

____ **Cadaver Lab**

Annotated Bibliographies Due

____ Lecture: Unit VI: Treatment

Readings: Stemple, Glaze, & Klaben, ch. 7

____ Lecture: Unit VI: Treatment

Readings: Stemple, Glaze, & Klaben, ch. 7 & 8

____ Lecture: Unit VII: Laryngectomy Rehab

Readings: Stemple, Glaze, & Klaben, ch. 9

_____ **Final Exam to cover Units V, VI, and VII**

The following supporting documents are attached:

- 1. Class presentations for Facilitating Techniques assignment**
- 2. Two exams containing specific questions relative to this area – the questions associated specifically with this topic are highlighted.**

CDDS 216**CLASS PRESENTATION for Facilitating Techniques**

You will be assigned one of the Facilitating Techniques listed below. Please develop a 10 minute presentation in which you will teach this technique to the class. Your presentation should include: an explanation of the technique, which clients or voice disorders you might use it with, a demonstration (where applicable), and any information regarding the efficacy of the strategy.

1. Auditory Feedback
2. Change of Loudness
3. Chant Talk
4. Chewing
5. Counseling (Explanation of the Problem)
6. Digital Manipulation
7. Elimination of Abuses
8. Establishing a New Pitch
9. Focus
10. Glottal Attack Changes
11. Glottal Fry
12. Head Positioning
13. Heirarchy Analysis
14. Inhalation Phonation
15. Laryngeal Massage
16. Masking
17. Nasal/Glide Stimulation
18. Open-Mouth Approach
19. Pitch Inflections
20. Relaxation

21. Respiration Training
22. Tongue Protrusion /i/
23. Visual Feedback
24. Yawn-Sigh

CSD 216: Exam 2**Name:****Matching (2 points each)**

- | | |
|--|--|
| <p>_____ 1. any alteration in “normal voice”</p> <p>_____ 2. “double voice”</p> <p>_____ 3. a ruptured blood vessel</p> <p>_____ 4. occurs during phonation and results in steady
fluctuations in pitch and loudness</p> <p>_____ 5. no phonation or “whisper phonation”</p> <p>_____ 6. a benign lesion, causing smooth, white patches on
the vocal folds</p> <p>_____ 7. a line or groove running down the vocal fold(s)</p> <p>_____ 8. difficulty breathing</p> <p>_____ 9. vocal fold thickening that extends along the entire
fold</p> <p>_____ 10. soft, fluid filled lesions usually located at the
margin of

the anterior-to-middle third of the vocal folds</p> | <p>_____ 11. a lower motor
neuron impairment at the
neuromuscular junction,
associated with rapid
muscle fatigue, including
vocal fatigue</p> <p>_____ 12. a fibrous tissue
overgrowth that narrows
the airway</p> <p>_____ 13. a mass of blood
capillaries that appear as
small, long-standing blood
blisters</p> <p>_____ 14. the sensation of
a “lump in the throat”</p> <p>_____ 15. a congenital,
pediatric laryngeal
abnormality
associated with a soft,
flexible, omega-shaped
epiglottis</p> |
|--|--|

- A. Dyspnea
- B. Hemorrhage
- C. Essential Tremor
- D. Aphonia
- E. Polypoid Deneration
- F. Laryngomalacia
- G. Virilization
- H. Parkinson's Disease
- I. Ectasia
- J. Globus
- K. Cyst
- L. Stridor
- M. Subglottic stenosis
- N. Sulcus Vocalis
- O. Varix
- P. Leukoplakia
- Q. Myasthenia Gravis
- R. Hematoma
- S. Hemangioma
- T. Polyps
- U. Hyperkeratosis
- V. Diplophonia
- W. Huntingtons Chorea
- X. Dysphonia
- Y. Spastic Dysphonia
- Z. Nodules

Fill-Ins

1. _____ is defined as the involvement of too much muscle force and physical effort in the systems of respiration, phonation and resonance.
2. A disorder characterized by adduction during inhalation, stridor, and “triggers” such as physical activity or peppermint is _____.
3. _____ results from severe overadduction of the vocal folds. The voice sounds “strained and strangled”.
4. A therapeutic technique used for ventricular phonation because it requires vibration of the true folds to produce is _____.
5. Hard glottal attacks are an example of vocal misuse behavior and are often heard in patients with posterior vocal fold lesions such as _____.
6. A preschooler presenting with sudden hoarseness and inhalatory stridor should be referred for an E.N.T. consult because he or she may have a serious condition such as _____.
7. A voice disorder characterized by the use of falsetto or upper pitch range in post-adolescent males and a weak, thin, juvenile voice in females is _____.
8. Inflammation of the vocal fold mucosa causing mild to severe dysphonia; usually associated with an upper airway infection or vocal abuse/trauma is called _____.
9. & 10. Two additive lesions that increase the mass and stiffness of the folds, and may be considered pre-cancerous are _____ and _____.

True / False

- _____ 1. A vocal fold paralysis is named for what the folds can do.
- _____ 2. Ventricular dysphonia occurs only when the false vocal folds vibrate by themselves; in the absence of true fold vibration.
- _____ 3. Early symptoms of Spastic Dysphonia occur both in volitional voice productions and in activities such as crying, laughing and singing.
- _____ 4. An essential tremor will worsen as vowel prolongation increases in duration.
- _____ 5. Presbyphonia is often associated with vocal folds that appear bowed.
- _____ 6. The majority of voice disorders are due to neurologic damage.
- _____ 7. Vocal Fold Thickening is often a precursor to Nodules.
- _____ 8. Voice disorders associated with identity conflicts or psychosexual conflicts generally respond well to voice therapy.
- _____ 9. According to your text and course outline, prevalence estimates of voice disorders in the general population range from 3% to 10%.
- _____ 10. Contact ulcers are the most common benign vocal fold lesion.

- _____ 11. Vocal fold injections have been very successful in providing a long-term solution (improved adduction) in patients with unilateral vocal fold paralysis.
- _____ 12. With a “psychogenic conversion aphonia”, vegetative vocal acts such as laughing or coughing are usually not affected.
- _____ 13. To be diagnosed as a “psychogenic voice disorder”, the onset of the voice symptoms must be clearly associated with the onset of a verified psychological or psychiatric disturbance.
- _____ 14. When working with gender re-assignment patients, hormone therapy may be effective for elevating pitch, but not for lowering pitch.
- _____ 15. Unilateral vocal fold paresis is a potential contributor to the development of ventricular phonation.

Listing and Short Answers

1. Vocal misuse/abuse, LPR, and intubation trauma are ALL listed as possible etiologies for which laryngeal pathologies? (list 2

as possible, followed by voice therapy.

b) initiate voice therapy, but wait 6 to 12 months before doing anything permanent.

Why?

Match the vocal fold pathology with the video image.

- | | |
|-------------------------------|------------------------------|
| A. contact ulcer(s) | H. left vocal fold paralysis |
| B. vocal nodule(s) | I. granuloma |
| C. hemorrhage | J. hyperkeratosis |
| D. papilloma | K. sulcus vocalis |
| E. sessile polyp | L. carcinoma |
| F. pedunculated polyp | M. web |
| G. right vocal fold paralysis | N. polypoid degeneration |

1. _____ 2. _____ 3. _____ 4. _____

5. _____ 6. _____ 7. _____ 8. _____

CSD 216

Name: _____

EXAM #3

True / False

- _____ 1. If done properly, the effectiveness of digital manipulation can be determined immediately.
- _____ 2. When working with gender reassignment patients, hormone therapy may be effective for elevating pitch, but not for lowering pitch.
- _____ 3. Therapy for functional aphonia often results in a total return of functional voice in as little as 1 to 3 sessions.
- _____ 4. The primary treatment choice for papilloma is voice therapy.
- _____ 5. Vocal fold cysts generally require surgical excision.
- _____ 6. Once phonation is re-established in a functionally aphonic patient, they often experience relapses of their aphonia requiring future “booster therapy” sessions.
- _____ 7. Functional dysphonia often results in reactive tissue changes such as nodules or polyps.
- _____ 8. Total laryngectomy completely separates the airway and the digestive tract.
- _____ 9. Speech therapy should never be undertaken for treatment of hypernasality unless there is clear evidence that the patient is able to achieve velopharyngeal closure during a non-speech task.
- _____ 10. Glottal fry requires decreased airflow, increased subglottic pressure and vocal

fold tension.

_____ 11. Activities designed to improve velopharyngeal (VP) closure on tasks such as sucking, blowing and velar elevation exercises, have been found to strengthen the VP mechanism for improved speech production.

_____ 12. Pitch change often results in improved vocal quality.

_____ 14. Thyroplasty is the current treatment of choice for spastic dysphonia.

_____ 15. In order to be effective for treatment of VPI, visual biofeedback therapy must be frequent (at least 3 times a week) and intensive.

_____ 16. Empirical research supports the efficacy of vocal hygiene therapy alone for the treatment and prevention of voice disorders.

Fill-ins

1. A Facilitating Technique that was described as being great for patients with vocal hyperfunction who speak with clenched teeth and reduced mandibular movement is

_____.

2. The Facilitating Technique that is used to help relax the vocal folds and is also often used during the assessment as an “index of vocal fold relaxation” is

_____.

3. The Facilitating Technique that is often used for aphonia or ventricular phonation

because it requires true fold vibration to produce is _____.

4. A Facilitating Technique that focuses on moving resonance more forward and/or up

into the facial mask is _____.

5. The Facilitating Technique(s) used to “find” a voice in patients with functional aphonia

is/are _____.

6. After a vocal fold trauma or vocal fold surgery, patients may be told not to use any

phonation at all for several days. This is called _____.

7. _____ are systematic exercises designed to decompensate maladaptive vocal behaviors by regaining balance among airflow, muscle activity, and supraglottic tone placement.

8. _____ is a holistic voice therapy program which facilitates voice production involving oral vibratory sensations in the context of easy phonation.

9. _____ is a holistic voice therapy program based on the principles of myoelastic-aerodynamic theory.

10. The term _____ refers to voice characterized by excessive nasal resonance.

11. The term _____ refers to voice characterized by a lack of nasal resonance.

12. The term _____ refers to audible unvoiced air escaping through the nose.

13. When non-nasal sounds around nasal sounds become nasalized this is called

14. Most cancers of the larynx are of what type? (circle the correct answer)

oat cell carcinoma

squamous cell carcinoma

verrucous carcinoma

Listing, and Short Answers

1. As discussed in your text, list 5 components of a comprehensive vocal hygiene program.

1)

2)

3)

4)

5)

2. Discuss the current ruling on the status of SLP's doing endoscopy. Be specific.

3. *Name and describe* the empirically supported treatment technique for use with Parkinson's Disease patients.

8. List and describe the four alaryngeal speech options that we covered in class (I am not including “ultra-voice” as a separate option).

9. List and describe/discuss the 5 types of treatment for VPI that we discussed in class.

10. Select **one** of the cases below to respond to:

1. List and describe the components of a complete voice evaluation for an adult who comes in with complaints of a “hoarse voice” and “vocal fatigue”.
2. List and describe the components of a complete voice evaluation for a school-aged child who presents with mild resonance abnormalities.
3. List and describe the components of a complete voice evaluation for an adolescent or adult client who presents with a voice that is not representative of his/her age or gender.