Prevalence of Voice Disorders in Teachers

STATISTICS
SUE B. HUME, PH.D., CCC/SLP
AND ALLISON WEGMAN, M.S., CCC/SLP

CONTRIBUTING RISK FACTORS
Inappropriate phonatory patterns secondary to phonatory overload
Age and number of years teaching (16 years and age 40)
High number of students in classroom
Prior voice problems
Environmental noise
Gastroesophageal reflux

STUDENTS PREPARING FOR CAREERS AS TEACHERS
Ohlsson (et al 2011) reported presence of voice disorders in approximately 20% of beginning student teachers.
Identified the following significant risk factors for voice problems in beginning teachers:
Vocal fold problems in childhood and adulthood
Frequent throat infections
Airborne allergies
Smoking
Hearing problems
Previous work as teacher
Vocally demanding hobbies
Previous speech therapy or voice training.

There was a clear association between the number of potential vocal risk factors and the number of voice symptoms.

COMMON PATHOLOGIES IN VOCAL PERFORMERS
Acute/Chronic Laryngitis
NODULES
Contact Ulcers/Granulomas
Laryngeal Mysitria
GERD/LPR
Need For Preventative Programs

UTHSC’S CURRENT PROGRAM
Communication Screening is required for all students entering teacher training programs. Screenings are conducted by graduate students under supervision.
Screenings are conducted in the following areas:
Hearing
Articulation
Voice

PROPOSED SCREENING AND PREVENTION PROGRAM
Modeled after a previous program at UT Knoxville to prevent vocal problems in theatrte students.
Goal is prevention of vocal disorders in future teachers through education and training.
Program will be conducted by graduate students under supervision.

PROGRAM COMPONENTS
Survey of Vocal and General Health Habits
Perceptual/Acoustic Voice Screening
Pre/Post Program Evaluation

EDUCATION PROGRAM
Vocal Anatomy and Physiology
Vocal Hygiene
Environmental Manipulation
Easy Onsets, Tone Focus, Resonance Balance
Periodic Monitoring

ADVANTAGES
Prevention of future vocal problems
Provide clinical hours and experience for graduate students in speech pathology


93% of teachers in one study had never received any guidance or professional training in prevention of dysphonia

1. 57.7% of teachers have voice disorders
2. 3.5% of teachers have vocal cord nodules
3. 1.7% of teachers have vocal cord polyps
4. 1.2% of teachers have vocal fold hemorrhages
5. 0.8% of teachers have vocal fold ulcerations

Prevalence of Vocal Disorders in Teachers

Percentage of Teachers Seeking Medical Care for Voice Disorders

Percentage of Teachers Missed Work Caused by Voice Disorders

Amount spent annually on sick leave and treatment of voice disorders of teachers

3.5% of teachers have vocal cord nodules
4.1% of teachers have vocal cord polyps
5.2% of teachers have vocal fold hemorrhages
6.3% of teachers have vocal fold ulcerations

Kindergarten and elementary education teachers reported more voice symptoms than middle or high school teachers

Department of Audiology & Speech Pathology
Prevalence of Voice Disorders in Teachers

93% of teachers

Other potentially detrimental habits of college students:
Irregular sleep and meal schedules
Overuse of voce at sport and sorority events
Excessive caffeine and alcohol intake

23% of teachers have absent days caused by voice disorders

Teaching Staff

Prevalence of Voice Disorders in Teachers

$2.5 BILLION
Amount spent annually on sick leave and treatment of voice disorders of teachers

The University of Tennessee Health Science Center
Department of Audiology & Speech Pathology