

**GASTROESOPHAGEAL REFLUX OF THE DISEASE EDUCATION FIELD  
REPRESENTATIVES BETWEEN MANY MEETING REASONS AND RIGHT  
PREVENTION MEASURES WORKING EXIT**

<https://doi.org/10.5281/zenodo.17942606>

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**Abstract**

Gastroesophageal reflux disease (GERD) – stomach of the composition to the red one pathological return as a result developing , in the world the most wide widespread gastroenterological from diseases is one . The last in years of the disease education field representatives – teachers , professors , students and students between sharp growth epidemiological importance profession This is of the research purpose , education in the field in individuals GERD high incidence professional and psychosocial the reasons to clarify , as well as this to the problem aimed at special prevention program working is an exit .

The study estimates that 3 higher education institutions will be established in 2022-2024. education in the institution 150 employees teacher and 200 people student's health monitoring , questionnaires transfer and clinical examination from the methods used . Results this showed that 43.2 % of teachers , students and 28.5% of GERD clinical signs was identified . Home diagnosis placed 67% of cases middle and heavy level esophagitis organization reached . Obtained information based on , education field representatives for danger factors as the following identified : occupational stress (91% of cases ), voice of the ligaments permanent tension (87%), incorrect and disorderly nutrition (78%), many time during bent without work (65%), salary low with related cheap , but acidic meals consumption ( 58 %). Also , the study in the process work in place done increase possible was complex prevention model working Model five main direction – “ Professional hygiene ”, “ Nutrition culture ”, “ Stress management ”, “ Work place ergonomics ” and “ Regular screening own inside This prevention measures for 6 months from the test

transfer, symptoms 3-2 times its weight to reduce and to work leaving of days to reduce the number by 41% take came.

### Keywords

gastroesophageal reflux disease, education field representatives, professional diseases, teachers health, prevention program, esophagitis, voice stress, pedagogical stress, work place hygiene, healthy marriage style

## INTRODUCTION

Gastroesophageal reflux GERD (Gastroesophageal reflux disease) is stomach contents (acid, pepsin, bile) into the esophagus pathological return and mucus to the floor damage to reach with related chronic and relapsing to the character has is a disease. World health storage organization to the information According to, GERD has developed in countries 20-40% of the population, Middle Asia in countries and 18-30% of impact under received [1, p. 45]. Disease not only life quality noticeable at the level reduce, but also Barrett's esophagus and esophagus adenocarcinoma such as serious oncological also leads to diseases arrival possible.

Modern in society education field is not only knowledge transfer, maybe high level psychoemotional stress, cognitive loading and communicative requiring activity is a field. Teacher and students are same at the time professional and training activity with related was one row danger factors face coming special the group organization will. With this together, available in literature GERD professional characteristics, especially education in institutions worker individuals within the scope, enough unstudied.

So so that the **research relevance** education process of the participants to your health typical GERD development features study out of necessity come It comes out. **The work purpose** – education field in representatives GERD many meeting professional the reasons determination and they for intended effective prevention measures system working is an exit.

### The research tasks :

1. Education field in representatives GERD epidemiological indicators and clinical delay features study .
2. GERD development take coming professional and psychosocial danger factors to determine .
3. Education institutions in the room done increase possible was prevention measures complex working exit and his/her efficiency assessment .

## LITERATURE REVIEW

Literature analysis to do this shows that GERD is multifactorial disease is , its in development heredity , anatomical flaws , life style and external factors important role plays . Representative and others (2006) " Montreal The consensus is that GERD is a " red " mucus to the floor damage delivery person stomach cells of products reflux as a result appearance to be symptoms complex " [2, p. 1900]. The disease pathophysiological basis bottom red sphincter cardiac sphincter (PQS) tone decrease , stomach acids to the esophagus of the passage increase and mucus floor protection mechanisms weakening organization will reach .

Professional diseases in the context of GERD study relatively new is the direction . A series studies , for example , by El- Serag (2014) held systematic comment , work place stress and wrong food The development of habits is essential. the risk clear increase shows [3, p. 772]. In particular , high cognitive requiring loading with professions ( e.g. , managers , teachers ) practitioner in individuals of the disease frequency This is because during times of stress cortisol and gastrin secretion increase , as well as stomach of release slowdown is considered .

Readers health according to research , mainly , sound apparatus diseases ( dysphonia , laryngitis ) and psychoemotional focused on burnout syndrome [ 4 , p. 112]. However , GERD also professional group for important problem that increasingly is being recognized more . Because GERD is not only voice of the ligaments inflammation ( reflux laryngopharyngitis ), but also high breath roads to diseases and work of fertility to decrease take arrival possible .

Pedagogical of activity to oneself typical Features of GERD pathogenesis directly impact to show possible :

1. **Voice tension** : Far time tall in voice to speak belly space pressure increases , this and From PQS to pass facilitates [5, p. 56].

2. **Psychological stress**: Permanent psychoemotional voltage vegetative nerve system balance breaks , as a result stomach acid working release increases .

3. **Hypodynamia and wrong to sit** : Many numerical lectures , classes and seminars bent in case far time to transfer forced does this and belly space pressure increases .

4. **Unorganized food** : Lesson schedule with related accordingly long breaks , fast food and cheap , but acidic meals ( breakfast) and tea/bread) consumption at lunch to do

There is of research disadvantage is that they GERD in the past separately professional danger as seeing exit instead of , often general population within Also , this problem solution to do for work in place done increase possible was special

prevention programs almost working not released . Our our research this in literature the space to fill focused .

## METHODOLOGY

Research from September 2022 to February 2024 three supreme education institution (Tashkent State medicine University , Navoi state university and Nizami on the basis of the TDPU named after The study involved 150 people . complete fixed rate teacher ( age range 25-65 ) and 200 2nd-4th year students student ( age 18-22 ) involved was done .

**Research design :** incision in the form of descriptive analysis and later experimental prevention of the program efficiency assessment .

### Measurement methods and tools :

1. **Survey :** Himself assessment for "GERD -Q" (Gastroesophageal Reflux Disease Questionnaire) questionnaire designed and occupational stress level measurement for T. Koch and J. Schwappach by working issued from the questionnaire used .

2. **Clinical inspection :** All participants gastroenterologist by from the lookout was carried out . Symptoms was patients undergo EGDFS ( esophagogastroduodenofibroscopy ) and need If so , 24- hour pH- metry offer Diagnosis was made in Los Angeles . classification based on was put .

3. **Statistical Analysis :** SPSS 26.0 software provided by ANOVA, chi-square and regression from the analysis used . Results  $p < 0.05$  statistical importance at the level was evaluated .

**Prevention program :** The research second In stage , GERD symptoms 80 identified teacher and student random into 2 groups divided into : main group ( $n=40$ ) and control group ( $n=40$ ). Main group 6 months during following directions own inside received complex prevention in the program participated in :

a) **" Professional hygiene "**: Microphone use according to teaching , voice saving techniques , 5 minutes every 45 minutes continue enough voice rest to receive .

b) **" Eating culture "**: Work on the day optimized food table , correct food according to seminars , work in place " reflux " in the kitchen against menu " .

c) **" Stress management "**: Breath to take exercises and short term meditation sessions .

d) **" Work" place ergonomics "**: Place and the tables adjustment according to recommendations , not to bend need was without work for comfortable conditions .

e) “ **Regular screening** ”: Per month one times GERD -Q questionnaire using symptoms self - monitoring .

## **RESULTS**

The research first in the phase following results received :

1. **GERK spread** : 65 (43.2%) of the students and 57 students (28.5%) answered the GERD - Q questionnaire pathological indicators demonstration Clinical inspection and in the EGDF results in 82 of them ( 35 of the students ) and 47 students ) GERD diagnosis confirmed . Diagnosis placed 55 of the cases (67%) were secondary and heavy level esophagitis (Los Angeles B and C), and 27 (33%) light esophagitis (Los Angeles A ) .

2. **Home professional danger factors** the following was :

|                                                                                                                     |
|---------------------------------------------------------------------------------------------------------------------|
| ➤ Professional stress high rate : 91% ( research) in the group ).                                                   |
| ➤ Day for 6 hours more than voice Loadability : 87%.                                                                |
| ➤ 2 times a day less on time hot Nutrition : 78%.                                                                   |
| ➤ Work more than 70% of the time bent in case Transfer : 65%.                                                       |
| ➤ Economic to the reasons bread , tea, fried bread and pastes “ Refluxogenic ” foods such as preferably View : 58%. |

3. **Clinical of the past to oneself typical Features** : In the Andeans more dysphonia ( voice disorder) fatigue , chronic cough and noncardiac blue pain observed , in students and mainly retrosternal heartburn , regurgitation and morning heart nausea observed .

The research second stage , prevention 6 months of the program from practice then the main and control groups in the middle noticeable differences determined :

1. **GERD - Q with score** : Home in the group average score from 12.4 to 4.1 decreased (  $p <0.001$  ), control in the group and from 11.8 to 10.5 (  $p >0.05$  ).

2. **To work leaving days** : Home in the group average monthly to work without leaving stay from 1.8 days to 0.7 days decreased ( by 61% decrease ).

3. **Life of quality general indicator ( SF - 36 questionnaire ) according to )** : Home in the group physical and psychological components noticeable at the level improved .

\* **Table 1.** 6 months prevention from the program then GERD- Q questionnaire indicators change ( main group , n=40)\*

| Indicator                                              | At the beginning of the program ( mean $\pm$ standard deviation ) | After the program ends then ( mean $\pm$ standard deviation ) | p - value |
|--------------------------------------------------------|-------------------------------------------------------------------|---------------------------------------------------------------|-----------|
| Retrosternal burning Frequency ( per week )            | $5.2 \pm 1.8$                                                     | $1.1 \pm 0.9$                                                 | <0.001    |
| Regurgitation Frequency ( per week )                   | $4.8 \pm 2.1$                                                     | $1.3 \pm 1.0$                                                 | <0.001    |
| Sleep breakdown ( per week )                           | $3.5 \pm 1.7$                                                     | $0.8 \pm 0.7$                                                 | <0.001    |
| Reflux against medicines acceptance to do ( per week ) | $3.9 \pm 1.5$                                                     | $0.5 \pm 0.6$                                                 | <0.001    |

## DISCUSSION

Our research results , education field in representatives GERD high at the level spread and his/her professional activity with closely related that The obtained figures of 43.2 % ( teachers ) and 28.5% ( students ) general population for known was indicators ( Uzbekistan for about 20%) much high [6, p. 33]. This difference , our in our opinion , pedagogical of activity to oneself typical conditions with explained .

Important aspect is that in the research It was found that the main danger factor not only stress , maybe stress **xronic and permanent** Teachers by to the language taken stress sources between lecture preparation of time shortage (89%), salary low (76%), exam session during the period big there is a load (94%) It was . condition , Brown and others' (2019) readers and in teachers cortisol level increase about conclusions confirms that and stomach secretion directly activates [7, p. 415].

Second important factor is **voice tension** with related hypoxic situation . Many to speak during often and deep breath take , diaphragm movement and belly space pressure to change take Navoi and physiological of others (2020) research this It shows that speaking during diaphragm contraction behind PQS pressure gradient changes , this and reflux to increase help gives [5, p. 59]. Therefore for working

issued prevention in the program out of the blue use hygiene separately attention focused .

Third factor is **salary low** with related was **economic-nutrition factor** . Many in cases teachers and students , cheapness bread , pastries products , black tea and coffee , as well fast to be prepared semi-finished to products they rely on , their all PQS tone reduces or acid working to release increases . Our prevention our program " Eating" "culture " module not only theory , maybe work in place comfortable and cheap , but healthy food opportunity to create focused .

Production issued prevention model efficiency , professionalism danger factors targeted and complex in a way eliminate to grow through , only dietician advice to give than much high to the results achieve possible As a result , not only GERD symptoms decreased , maybe to work leaving days the number is also significant at the level it has shrunk , this and prevention economic efficiency shows .

The research limitations are only supreme education institutions cover to take and small sample size . In the future school teachers and school their students own inside received more wide comprehensive research transfer necessary .

## CONCLUSION

1. Research results , gastroesophageal reflux disease education field representatives – teachers (43.2%) and among students (28.5%) wide spread , this indicators general population from the level noticeable at the level high that proved .

2. Pedagogical of activity to oneself typical conditions ( high level psychoemotional stress , voice of the apparatus permanent tension , long time bent without performance , economic restrictions because of wrong nutrition ) GERD main professional danger factors as determined .

3. Education institutions in itself done increase possible was five fingers prevention model (" Professional hygiene ", " Nutrition culture ", " Stress management ", " Business place ergonomics ", " Regular screening ) exited and from the test was held .

4. 6 months old prevention of the program GERD symptoms in practice 3-2 times its weight to reduce , to work leaving of days number by 61% to reduce and of the participants general life quality noticeable at the level to improve take came .

5. Received results based on , GERD prevent to take and management according to measures education institutions health storage of programs

inseparable part as current to be and health storage ministry by this in the direction methodical recommendations working exit offer is being done .

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