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**L. T. S. S. Wickramatunga, T. P. Geekiyanage, N. A. H. C. Thilakarathna**

*Scientific supervisor: Ph. D. associate professor L. P. Mamchits*

*Educational Establishment  
«Gomel State Medical University»  
Gomel, Republic of Belarus*

## **JUXTAPOSITION OF PUBLIC AWARENESS ABOUT CHOLERA IN SRI LANKA AND BELARUS**

### ***Introduction***

Cholera is an intestinal infection caused by *Vibrio cholerae*, resulting in profuse watery “rice water stool” diarrhea.

This can be an endemic, epidemic or a pandemic disease depending on the disease spread and the control. Initiation and maintenance of epidemic or pandemic disease are caused by poor sanitation with assistance of human migration and seasonal warming of coastal waters [1, 5].

The disease is transmitted through fecal-oral spread of the organism through person-to-person contact or through contaminated water and food [1].

Cholera spread is common in places with poor sanitation, crowding, war and famine. Common locations include the parts of Africa, south Asia, and Latin America [2].

The subsequent loss of fluid volume causes a drop in blood pressure and circulatory shock. If the patient remains untreated, they become progressively weaker, sometimes to the point of death, within 12–24 hour of the onset of symptoms. If the patient survives, then the infection usually lasts 1–5 days [3, 4].

Cholera is a type of diarrheal diseases with a global importance and included in the WHO Communicable Disease Surveillance and Response (CSR) list [1].

### ***Goal***

To evaluate the public awareness about Cholera among the population in a country where it has been already eradicated: Belarus and in a country which is having a high risk for an epidemic: Sri Lanka.

### ***Materials and methods of research***

A detailed questionnaire was distributed among 58 citizens of Sri Lanka and 55 citizens of Belarus. The questionnaire included general details such as age, profession, gender and the direct questions asking about the source of infection, method of transmission, countries with high prevalence, symptoms, whether Cholera can be treated successfully or not, possible preventive measures and the availability of vaccination program for the prevention.

### ***The results of the research and their discussion***

Among all the responses by citizens of Sri Lanka, 72.4 % were in the age range of 35 and above, 8.6 % in the age range of 25–35 and 19 % were in the age range of 18–24 while 53.3 % were female and 46.7 % were male.

Among all the responses by citizens of Belarus, 75 % were in the age range of 18–24 and 25 % were in the 25–35 age range where 62.5 % were females and 37.5 % were males.

Out of the total Sri Lankan citizens, only 7.6 % are fully aware of the disease, 63.8 % have awareness up to a certain extent, and 28.3 % are not aware at all. When comparing this with the Belarusian citizens: 25 % is having complete awareness, 25 % having awareness up to a certain extent and 50 % not aware at all.

According to the awareness about the source of infection of the citizens in Sri Lanka: 84.8 % say that this is spread by the contaminated water, 51.4 % – by contaminated food, 28.6 % – by using public utilities, 19 % – by infected people, 11.4 % – by asymptomatic carriers. According to the citizens of Belarus, 62.5 % – by contaminated water, 25 % – by contaminated food, 12.5 % – by asymptomatic carriers. The information is presented in figure 1.

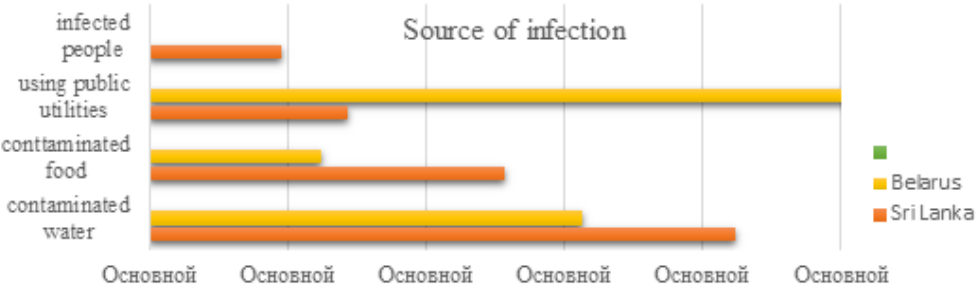


Figure 1 – Knowledge on the source of infection in both countries

Method of transmission according to the citizens of Sri Lanka: 58.1 % – Fecal oral transmission, 14.3 % – contact, 7.6 % – airborne and according to the citizens of Belarus: 75 % – fecal oral transmission, 12.5 % – contact, 12.5 % – airborne. The information is presented in the figure 2.

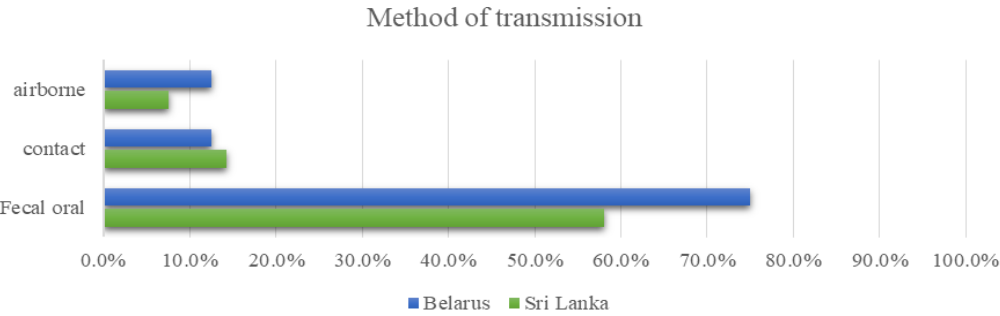


Figure 2 – Knowledge on the method of transmission in the both countries

Symptoms of the disease according to the citizens of Sri Lanka: 74.3 % – Diarrhea with rice water stool, 36.2 % – restlessness, 38.1 % – thirst, 67.6 % – vomiting, 23.8 % – cramps and according to the citizens of Belarus: 75 % – Diarrhea with rice water stool, 25 % – restlessness, 12.5 % – thirst, 75 % – vomiting, 12.5 % – cramps.

The modes of prevention of cholera according to the citizens of Sri Lanka: 87.3 % – using boiled and filtered water, 63.7 % – washing and adequate cooking of food, 64.7 % – good hand hygiene, 56.9 % – good sanitation and those according to the citizens of Belarus: 87.5 % – using boiled and filtered water, 100 % – washing and adequate cooking of food, 100 % – good hand hygiene, 100 % – good sanitation. The information is presented in the figure 3.

Out of the total number of citizens of Sri Lanka who underwent the survey, 27.6 % think that there is a vaccination program to prevent cholera, 22.9 % think that there is no such a program and 49.5 % are not aware about the presence or absence of such a program. Out of the total number of citizens of Belarus who underwent the survey, 62.5% think that there is a vaccination program and 37.5 % are not aware about the presence or absence of such a program.

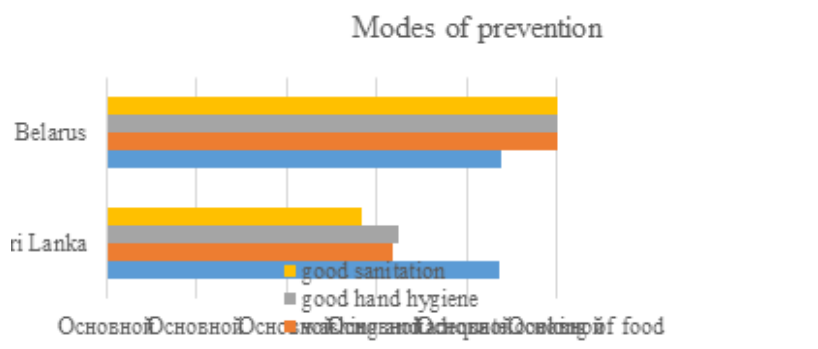


Figure 3 – Knowledge on the modes of prevention in both countries

### Conclusions

Awareness of the population about a disease is a key factor to control the disease in that particular country. The public awareness about cholera in Belarus is statistically better than that in Sri Lanka. This might have probably assisted the health sector to control the spread of Cholera in Belarus and eradicate the disease. Sri Lanka is still having a high risk of cholera spread due to its high temperature climate as well as the lesser public awareness about the disease.

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**A. Zeeshan**

*Supervisor: Dr. A. Pervez, senior lecturer V. I. Maiseenko*

*Educational Establishment  
«Gomel State Medical University»  
Gomel, Republic of Belarus*

## DEVELOPMENT OF TB AND RETROSPECTIVE ANALYTICAL STUDY AND THEIR EFFECTS IN PREVENTING AND REDUCING THE SEVERITY OF PNEUMONIA SARS COV-2

### Introduction

The research was conducted on 7820 patients in total (3121 normal out of 7820 scan) during their admission in TB medical institutions and record data of SARS CoV-2 patients in the department of internal medicine at Govt. Medical Hospital KOTA, Rajasthan INDIA [1] including patients from Gomel state govt. TB hospital Gomel, BELARUS in total 3026 patients were used in research excluding healed or asymptomatic patients.