

Ministry of Health of Ukraine  
Ukrainian Medical Stomatological Academy

APPROVED  
at a meeting of the department  
disaster medicine  
and military medicine  
«\_\_\_\_» \_\_\_\_\_ 2020  
protocol № 2 from 28.08.2020



Head of Department

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**Methodical instructions  
for independent work of students  
during preparation for a practical (seminar) lesson  
and in class**

Academic discipline	<b>Training of reserve officers</b>
Module № 2	Essentials of Civil and Combat Medical Support
Topic of the lesson	The basis of civil protection of the population. The concept of quarantine and observation.
Course	2
Faculty	foreign students training specialty "Medicine", "Stomatology".

### 1. **Relevance of the topic:**

In areas of catastrophes and natural disasters, places of temporary location of the evacuated population, there may be a favorable situation in terms of sanitation and epidemiology, which contributes to the emergence and spread among various contingents of mass infectious diseases. In some cases, the deterioration of the epidemic situation is of paramount importance for the population of the region. In such situations, it is necessary to carry out a set of sanitary and hygienic and anti-epidemic measures. There is an "explosion" of infectious diseases and only then follows the so-called "tail" of the epidemic, which will further cause infection of those who came into contact with patients.

### 2. **Specific objectives:**

- know how to determine the boundaries of the epidemiological center,
- know what the potential danger of human infection depends on,
- know which infectious diseases are the most dangerous.
- learn to properly implement emergency and specific prevention measures. -know the use of modern technologies of psychological influence to neutralize the negative impact on the population in emergencies.

Competences and learning outcomes, the formation of which is facilitated by the discipline (the relationship with the normative content of training of higher education, formulated in terms of learning outcomes in the Standard).

In accordance with the requirements of the standard, the discipline provides students with the acquisition of competencies:

-integral: The ability to solve typical and complex specialized problems and practical problems in professional activities in the field of health care, or in the learning process, which involves research and / or innovation and is characterized by complexity and uncertainty of conditions and requirements. The ability of the individual to organize an integrated humanitarian educational space, the formation of a single image of culture or a holistic picture of the world.

-general: The ability to apply knowledge in practical situations. Ability to exercise self-regulation, lead a healthy lifestyle, ability to adapt and act in a new situation. Ability to choose a communication strategy; ability to work in a team; interpersonal skills. Ability to abstract thinking, analysis and synthesis, the ability to learn and be modernly trained. Definiteness and perseverance in terms of tasks and responsibilities.

-special (professional, subject): Ability to carry out medical and evacuation measures. Ability to determine the tactics of emergency medical care. Emergency care skills. Skills to perform medical manipulations..

### 3. **Basic knowledge, abilities, skills necessary for studying the topic (interdisciplinary integration):**

Name of previous disciplines	Acquired skills
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<p><b>1. The history of medicine.</b></p> <p><b>2. Civil protection.</b></p> <p><b>3. The basics of law.</b></p> <p><b>4. Human anatomy, normal physiology.</b></p> <p><b>5. General hygiene and ecology.</b></p> <p><b>6. Internal diseases.</b></p>	<p>1. Know the role of domestic scientists in the development and organization of emergency medicine.</p> <p>2. Basic measures to protect the population and territories in case of emergency.</p> <p>3. To be able to use general legal principles to explain the actions and actions of a doctor in the event of an emergency.</p> <p>4. The structure and physiological basis of the functioning of human organs and systems. Determine the severity and location of the lesion.</p> <p>5. To justify the need for optimal interaction between humans and the environment in order to maintain health.</p> <p>6. To be able to assess the general condition of the patient, to examine and sort the victims according to severity.</p>
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**4. Tasks for independent work in preparation for the lesson and in the lesson.**

1. The concept of quarantine and observance.
2. Carrying out emergency and specific prophylaxis measures.
3. The anti-epidemic regime.
4. Planning the activities, forces and means of psychological support units.
5. Timely application of psychoprophylactic methods.
6. Use of modern technologies of psychological impact to neutralize the negative impact on the population in emergency situations.

**4.1. The list of basic terms, parameters, characteristics that a student must learn in preparation for the lesson:**

Term	Definition
A complex of anti-epidemic measures in case of emergency	a system of measures aimed at preventing the occurrence of infectious diseases among people and their localization and elimination in case of occurrence among the population.
Epidemic measures	these are scientifically based recommendations, the implementation of which allows to prevent infectious diseases among certain population groups, to eliminate or significantly reduce infectious diseases.

Restrictive measures	a system of state measures, which includes regime, administrative, anti-epidemic, sanitary and treatment-and-prophylactic measures aimed at localization and elimination of epidemic foci.
Emergency prevention	A set of medical measures taken in relation to people who are infected with a causative agent of dangerous infectious diseases to prevent the development of an infectious process in them.
Psychological prevention	purposeful systematic work of a psychologist together with the heads of units of the civil protection system to prevent negative phenomena (among the population and personnel), identifying a group of increased psychological attention (at different stages) and conducting psycho-correctional work with it.
Unity and simplicity of psychological impact	all activities that will be carried out by specialists should be brought to the victims in a language they can understand, without using specific terminology and should be aimed at achieving the main goal.

#### 4.2. Theoretical questions to the lesson:

- 1.The concept of quarantine and observation.
- 2.The events of emergency and specific prevention. 3.Precipitancy mode.
- 4.Planning, forces and means of departments of psychological support.
- 5.Timely application of psycho-prophylactic methods.
- 6.The use of modern technologies of psychological impact to neutralize the negative impact on the population in emergency situations.

#### 4.3. Practical work (tasks) that run in class:

1. Implementation of emergency prevention.
- 2.The implementation of specific prevention.
- 3.Planning of activity of divisions psychological support. 4.The application and use of modern technologies of psychological influence.

The contents of the topic:

The concept of sanitary-hygienic and anti-epidemic actions in the foci of emergencies. Sanitary-hygienic and anti-epidemic security of the population in the event of emergencies - a complex of organizational, socio-economic, sanitary-technical, economic, medical, and other activities aimed at supporting sanitary wellbeing of the population, maintaining human health, preventing the occurrence among them of

infectious diseases and their control and elimination of the appearance of outbreaks of infectious diseases.

Organizational, socio-economic, sanitary-technical, economic, medical and other measures should be both medical and non-medical forces and means.

Medical forces and means of sanitary-hygienic security of the population during emergencies include:

- 1) outpatient clinics;
- 2) centers emergency medical care;
- 3) medical and healthcare institutions, who arrived in the disaster area;
- 4) medical units (brigade of emergency medical aid in various fields);
- 5) institutions and formation of the sanitary epidemiological services (BMS, SES, etc.);
- 6) scientific and medical institutions.

To the non-medical assets and capabilities include:

- territorial and regional administrative bodies;
- extraordinary anti-epidemic Commission;
- economic organs and institutions, enterprises and organizations;
- rescue teams of the various ministries and agencies;
- division of internal Affairs, EMERCOM, MO;
- the population itself.

Following are the basic principles of carrying out a complex of sanitary-hygienic and anti-epidemic measures in case of emergency:

- a unified approach to organization of sanitary-hygienic and anti-epidemic measures;
- compliance of the content and scope of measures carried out, the sanitary condition in the disaster area;
- participation of all parts of health in the organization and carrying out actions for liquidation of epidemic foci;
- constant interaction service of medicine of accidents with other services, ministries and agencies in the liquidation of sanitary and epidemiological consequences of disasters.

Sanitary-hygienic and anti-epidemic measures in disaster areas should be directed to: the source of the pathogen - diagnostic, isolation, and treatment of regime-restrictive measures;

- the mechanism of transmission - sanitation, disinfection and disinfection;
- friendliness of the body - immunization, emergency prevention.

The complex of sanitary-hygienic measures in the event of emergencies - system of sanitary-technical, economic, medical and other measures which provides support for the sanitary welfare of the population, the normal conditions of his life.

The main purpose of sanitary measures in emergencies, the protection of the health and human life and the prevention of infectious diseases.

Hygiene measures in the foci of disasters is aimed at the prevention and elimination of conditions conducive to the spread of pathogens, and neutralization identified and possible factors in the transmission of pathogens.

In the event of emergencies for the entire population trapped in extreme situations, a prerequisite is strict implementation of the rules of personal and collective hygiene. If the personal hygiene depends on each individual person, in the enforcement of collective norms and rules of hygiene involved, both the population and local authorities, in particular GSMK. The main here is:

- compliance with the conditions of the people who left their permanent premises;
- arrangement of food, water, bath and Laundry service;
- avoidance of harmful factors of the environment (contamination of air, territory, water, food sdyav, PB, BS, and negative effects of hypothermia and overheating of the body).

In this respect, GSMK must adhere to the following main areas of work:

◆ promotion in everyday life hygiene knowledge, norms and rules of behavior;  
◆ conduct sanitary investigations (examination) water and food; ◆ control over all objects that have hygienic importance, which destroyed and damaged in the hearth of the disaster, and those that continue to operate, which include:

- water supply and sanitation;
- objects of food industry, public catering and trade;
- enterprises and public utilities;
- children of preschool and school institutions;
- a damaged piece housing;
- places of a congestion of people (cinemas, theatres, clubs, dancing, etc.);
- transport;
- treatment-and-prophylactic institutions which admitted the victims from the source of the disaster;
- the temporary resettlement of evacuees;
- resettlement sites, the rescuers and builders, arrived in the disaster area;
- industrial facilities that could potentially become sources of secondary lesions (APB, RW, etc.).

In the event of failure of the existing water supply facilities and networks of sanitary-epidemiological service jointly with the interested organizations taking steps to provide the population with quality drinking water. GSMK:

- participates in the selection of water supply source;
- gives permission for the use of transport for distribution of water;
- coordinates designated washing and disinfection of transport;
- monitors chlorine residuals in water quality and bacteriological.

In case of damage of sewage systems, waste water intake into open waters are defined emergency measures on carrying out of repair works and the termination of discharge of untreated sewage. Depending on the degree of danger is determined by the amount of restrictive measures (e.g., prohibition of swimming in river, lake).

Based on the analysis and evaluation of data on sanitary-hygienic state of the food industry, public catering and trade, the measures for prevention of food poisoning and acute intestinal diseases.

Daily control over the sanitary condition of the housing stock, the temporary resettlement of evacuees, rescuers and builders, completeness and timeliness of sanitary cleaning of settlements, for the maintenance and safe operation of landfills and the like. It is extremely important to quality preventive, current and final disinfection. If there are zoonotic diseases in the event of a threat of their occurrence, farm or domestic animals, depending on their value and degree of danger, are either destroyed or subject to immediate treatment. If there are rodents, deratization is carried out.

In order to prevent some infections (plague, epidemic typhus, encephalitis, a number of hemorrhagic fevers, etc.), pest control is performed.

The Sanitary and Epidemiological Service agrees with the local authorities on issues related to the collection and burial of dead animals, as well as the burial of human corpses.

The organization of sanitary and hygienic measures in places of temporary resettlement of the population, rescuers and builders is of great preventive importance.

Organization of anti-epidemic measures in the foci of emergencies.

In practical terms the sanitary-hygienic and anti-epidemic measures are closely interrelated and interdependent. The complex of anti-epidemic actions at occurrence of emergency situations - system of measures aimed at the prevention of infectious diseases among people and their localization and elimination in case of occurrence in the General population.

Anti-epidemic measures is scientifically grounded recommendations, implementation of which allows to prevent infectious diseases among certain groups of the population, to eliminate or substantially reduce incidence of infectious disease.

Conducting anti-epidemic measures is based on the following basic principles:

- the type of the causative agent and mechanism of transmission;
- timely, accurate and continuous assessment of the epidemiological situation in the area of emergency;
- selection and implementation of necessary anti-epidemic measures and evaluation of their effectiveness.

When setting the type of pathogen and mechanism of infection it is necessary to remember that the source is the infected human or animal. This allows you to plan and purposefully carry out the necessary in this situation, anti-epidemic activities. Key among these are:

- emergency isolation of infectious patient;
- limit contact of people with each other;
- disinfection, deratization activities;
- emergency nonspecific prophylaxis;
- sanitation and others.

When spread among the population of a particular infectious disease should be provided with adequate means. Along with their conduct is a set of activities which is called

"proteobacteria protection of the population" - a system of knowledge and practices on prevention of infectious diseases and their spread among the population.

For events at proteobacterial protection required timely, accurate and continuous assessment of the epidemiological situation in the area of emergency. It is achieved by using the following methods: epidemiological survey of the territory and objects;

- epidemiological monitoring of the health status of people;  
sanitary-epidemiological reconnaissance of the territory CHS.

An epidemiological survey of the territory and objects is conducted to identify the causes and conditions of occurrence of infectious diseases with the subsequent justification of actions for localization and elimination of the arisen epidemic foci.

The center of bacteriological contamination there are settlements (places of temporary accommodation of the population) exposed to infection with bacterial agents. Its boundaries are the boundaries of these settlements.

In this case, an Extraordinary anti-epidemic Commission (chpk), which are:

- approval of a plan of liquidation of the hearth;
- the timing of introduction and removal of restrictive and security measures;
- providing administrative, consultative and methodological assistance services;
- hearing the report of the responsible persons about the state of work to eliminate outbreak;
- adjustment plan eliminate the source depending on the situation.

For a more differentiated approach to the implementation of these measures create specialized services:

- administrative;
- anti-epidemic;
- quarantine;
- treatment and prevention;
- logistical support.

Chpk creates a staff on elimination of bacteriological contamination. Its membership mainly consists of the chiefs of the services and the specialist consultants for this infection among employees of the sanitary-epidemiological services, medical and scientific institutions. Epidemiological surveillance of the health status of people is a systematic generation of information on the health status of the population in the area of emergency.

The organization of regime-restrictive measures in epidemic outbreaks.

In the General system of measures on localization and elimination of foci of infectious diseases, great importance is the regime-restrictive measures.

Regime-restrictive measures - public events, including custodial, administrative, epidemiological, sanitary and prophylactic measures, directed on localization and liquidation of epidemic foci. To of regime-restrictive measures would include quarantine and observation.



Quarantine is entered by the decision of the extraordinary anti-epidemic Commission (chpk). It is administered in case of diseases "quarantine" ("the Convention") infections (plague, cholera, natural pox, yellow fever) or in case of mass diseases other OOI: melodos, glanders, anthrax, typhus, psittacosis, tularemia, most hemorrhagic fevers etc.

Among the especially dangerous infections, in addition to "quarantine" referred more than a hundred different infectious diseases. There are two approaches to the definition of "dangerous infections". In the first approach, to OOI belong to infectious diseases, which are capable of epidemic spread, covering a large number of people and (or) are extremely severe and lead to high mortality and disability of the patient. Another approach to the inclusion in the group of OOI based on the potential danger of the pathogen specific infection: pathogenicity, mechanisms of transmission and prevention, availability and accessibility of effective means and methods of prevention and treatment.

According to these criteria, all pathogens (micro-organisms) are divided into four groups of pathogenicity.

Agents of the first group represent a high individual and community risk. They are able to cause severe disease in humans and (or) animals, which are not curable and can spread easily between humans or be transmitted from animals, directly or indirectly, (plague, natural smallpox, hemorrhagic fever).

Agents of the second group represent a high individual but low social danger. They are able to cause severe infectious diseases, but can not spread from one person to another or there are effective means of prevention and treatment (brucellosis, tularemia, histoplasmosis, etc.).

Agents of the third group are a moderate individual and limited public danger (typhoid fever, virus hepatitis, etc.).

Agents of the fourth group represent low individual and community risk. Given the above criteria, especially dangerous infections are those infectious diseases whose pathogens are assigned to the first and second groups of pathogenicity.

The use of quarantine is accompanied by the introduction of an observational regime in all administrative territories adjacent to the quarantine zone. The observational regimen is also introduced in case of occurrence of diseases for low-contagious infectious diseases.

The quarantine includes:

1. armed guards (the environment) of the organization, that is, all settlements and all the quarantine zones;
2. strict control over entry and exit of the population, the removal of the property from the quarantine zone;
3. the prohibition of passage through quarantine of vehicles and stops, railway and water transport in the case of transit outside of specially defined places;
4. the organization of observation and carrying out observation of persons in the hearth retiring and beyond;

5. the restriction of communication between separate groups of the population;
6. the establishment of anti-epidemic regime for the population, transportation, trade network and public catering establishments, objects of a national economy depending on the epidemiological situation, but the kind that ensures their continuous operation;
7. providing the population with food and industrial commodities in compliance with anti-epidemic regime;
8. strict anti-epidemic regime of work of medical institutions;
9. the implementation of the decontamination of the environment, production and sanitation of the population;
10. all the food facilities on the special processing mode, which guarantees the harmlessness of the product;
11. implementation of emergency and specific prevention;
12. fast active detection of infectious patients, their isolation and hospitalization;
13. control over strict observance of the rules of quarantine;
14. sanitary-educational work.

In the case of the introduction of health monitoring provides:

- restrict entry, exit and transit of all types of transport on the territory in which the observation is introduced;
- conduct disinfection of environmental objects;
- active early detection of infectious patients, their isolation and hospitalization;
- introduction of emergency and specific prevention;
- implementation according to the testimony of the sanitary treatment of the affected population;
- reinforcement of medical control for implementation of sanitary-hygienic and anti-epidemic measures;
- strengthening of veterinary-bacteriological control infestation of farm animals and animal products;
- the introduction of anti-epidemic mode of operation of medical institutions. The environment of the hearth is started by establishing internal and external posts. Internal protection is provided by the staff of the Ministry of internal Affairs, establishing posts on the main highways and the guard posts in medical institutions.

The external borders of the quarantine zone, carry troops or military part of the Ministry of defense located outside the quarantine zone. To control the entry of people, the entry of a vehicle, delivery of products outside of the quarantine zone, railway stations, motorways, sea and river ports, airports service the external environment exhibited transmission, in which forces and means of health authorities takes place sanitary control points (SCP).

In the UPC is assigned:

- to verify the identity of passing observation;
- verification of the certificates of vaccinations (if necessary) among those who arrived in the quarantine zone;

- medical surveillance of persons accompanying cargo, transport crews, etc.;
- control over the sanitary condition of railway, sea and river stations;
- medical surveillance of the personnel of the checkpoint in the area of its operation;
- identifying infectious patients among persons leaving the quarantine zone and those who enter it and their isolation.

The lifting of quarantine or restrictive action is implemented after the expiry of the incubation period of the disease, which is calculated from the time of isolation of the last patient and conduct final disinfection in the outbreak of the disease.

To reduce contacts between people in the cells carried out to isolation of the population.

At industrial facilities working under quarantine, implemented anti-epidemic mode of operation, comprising:

- ensuring the protection of workers and employees from exposure to bacterial agents;
- timely detection of infectious patients, their immediate isolation and establishment of monitoring individuals who are in contact with patients;
- implementation of measures for decontamination of the environment and industrial premises;
- ensuring timely conduct among the employees of preventive measures (prevention, vaccination ...);
- conduct decontamination of products before removal from the quarantine zone and with the issuance of the relevant documents about their safety;
- compliance by the employees of the established sanitary-hygienic and anti-epidemic rules.

Rebuilt the work of medical institutions, in particular centres and polyclinics. All medical care is approaching the population or transferred to enterprises, institutions and organizations. The district principle of maintenance of the population persists, however, medical areas are divided into microsections with population of 1000-2000 people. On microcastle works team

- one doctor;
- two nurses;
- two disinfectants;
- several persons of sanitary from the local population or members of the sanitary squad.

For carrying out of household detours and challenges of the brigade shall be provided with transport. It works with observance anti-epidemic regime and should be provided with protective clothing in accordance with the character of the organization. For active early identification of patients the main form of work is household (apartment) rounds, which are conducted by teams of microcastle. The staff team works under the guidance of a doctor. Before going to the station crew is training on the epidemiology, clinic and symptoms of certain infections and the rules of conduct in the hearth. Sanitary druzhinnitsy and sanitary asset work in cells under the direction of nurses. Door-to-door (door) rounds are held at least twice a day. Nurse gets another microcystic for work,

determines the sanitary (sanitary) specific objects (streets, houses, apartments) and monitors their work. Team members make lists of people living in a particular area, conduct thermometry, the results of which are included in a special journal. If you find sick, it is misleading to the average health worker or doctor team. Patients are isolated and then sent to the hospitalization. In the room of the patient, conduct disinfection. Patients who have a fever, hospitalization in makeshift offices. For persons who had contact with patients, established surveillance for a period of maximum incubation period of the disease. If you want to hold an emergency prevention. One brigade of 10 hours of work can examine by household walkovers 200-300 yards (apartments).

At the end of the day the doctors fill out the reporting form, where it is noted:

- total number of residents in microcastle;
- the number of persons who have held thermometry;
- the number of patients detected individuals with fever of uncertain etiology;
- the number of hospitalized persons;
- the number of patients who left the house (cause);
- if carried out emergency prevention - the number of persons who received medicines.

In health units and health centres of enterprises, the implementation of the above work is being carried out in shop, departments also conducted active case detection, thermometry and other events.

With the aim of eliminating intermediaries in the transportation of patients, sending them to the appropriate hospitals, reducing the time of hospitalization and a final disinfection on the basis of Department admission city disinfection station established the center for sanitary and epidemiological surveillance (epidemiological office). In the center (Bureau) received information about the content of infectious hospitals, data on patients requiring hospitalization. Patients are hospitalized by the Department of evacuation and then the Department of disinfection carried out final disinfection. This arrangement allows to maintain consistency between pre-hospital and hospital stages of medical care of infectious patients.

Infectious patients should be transported to the hospital special transport. Patients with dpi in a hospital transporting a brigade of tow trucks (the doctor or a nurse, two paramedics, the driver) who are dressed in protective clothing in accordance with the nature of the infection. After delivering the patient to the hospital transport and the items used during transport, decontaminate. Tow disinfect footwear, gloves and aprons, additionally put during the mass transportation of patients. In the event of an evacuation, individuals with diseases caused by pathogens of the first group, change protective clothing after the evacuation of each patient. After the change medical professionals undergo sanitary processing.

The complex anti-epidemic measures plays a major role carrying out disinfection measures, terrain, transport, industrial and residential premises, water, food, fodder, objects of care.

First and foremost, carry out disinfection in:

- the field of detection of pathogens of infectious diseases;
- medical institutions;
- travel on main highways;
- transport;
- commercial facilities that continue to work in the cell.

The disinfection of vehicles is carried out on the decontamination stations transport, unfolding on the basis of cleaning offices, garages.

Disinfection of clothing, footwear, soft stock is at stations for the disinfection of clothing, unfolding on the basis of laundries, dry cleaners. Sanitization of the population is stationary or time washing the items on the basis of these shaft passers, the sanitary, baths, showers.

Contaminated food should be identified and disposed of or decontaminated.

Disinfection of individual supplies of drinking water is carried out by boiling or by chemical method (chlorination). Disinfection in epidemic outbreaks are carried out by special brigades, which include:

- getinstruction;
- sanitizer;
- two national.

Organization of emergency prevention and immunoprophylaxis of infectious diseases among the population in epidemic outbreaks.

In the General system of measures and anti-epidemic measures in the event of a highly contagious infectious diseases is quite important emergency prevention.

Emergency prevention - a set of medical interventions in relation to people who have suffered infection with the pathogen of infectious diseases, to prevent the development of infectious process.

These measures are carried out immediately - from the moment of receipt of information of the infection or disease people dangerous infections, as well as during outbreaks among the population of infectious diseases of unknown etiology. Emergency prophylaxis is divided into General and special.

General emergency prevention is held to establish the type of agent that caused the infectious disease. It is performed with antibiotics or chemotherapeutic agents with broad spectrum of action.

Special emergency prevention is held after the establishment of the microorganism, its antibiotic susceptibility, confirming the clinical diagnosis in patients with infectious diseases.

The average duration of a General emergency prevention - up to 5 days (the time required for separation, identification and determination of susceptibility to certain antibiotics).

After identification and definition of sensitivity to antibiotics begins the special emergency prevention drugs, causal influence on the well-known causative agent of an infectious disease. The duration of the special emergency prevention is mainly

determined by the duration of the incubation period calculated from the day of possible infection. In the case of consecutive transition from the General to the special emergency prevention should follow an appropriate sequence in terms and doses of drugs given drugs, obtained during a General emergency prevention. Emergency prophylaxis (preventive treatment) are individuals or groups that according to epidemiological surveys should be considered infected.

Emergency prevention are:

- among people, to communicate with the person that is the source of the pathogen, i.e. with the patient or carrier;
- in children's hospitals and hospitals, food facilities, nursing homes, institutions with a special regime in case of identification of cases or carriers of infectious diseases;
- all the inhabitants of the locality or part thereof in case of group of diseases.

Mandatory conditions of emergency prevention are:

- simultaneous coverage of all contingents, subject to prevention;
- account and control over use of means of prevention;
- determination of the resistance of isolated cultures of the pathogen on the use of prophylactic drugs.

Emergency prevention is organized and carried out:

- in children, homes for the elderly and persons with disabilities, institutions with a special regime leaders and medical workers of these institutions;
- in other enterprises, institutions and organizations, heads of regional and district hospitals, polyclinics and outpatient clinics according to the territorial principle with the involvement of the health asset;
- among the unorganized population - medical staff teams.

The light of the emergency prevention is carried out by those responsible for its implementation.

In the system of measures regarding the emergence and spread of infectious diseases the importance of immunization (specific prevention). Simultaneously with the planned mandatory vaccinations (against diphtheria, tetanus, polio, whooping cough, measles, tuberculosis) preventive vaccination on epidemic indications. They are only epidemiological (enzootic) territories and those contingents, which are for domestic or commercial environments are at risk of infection in certain seasons of the year.

For example, routine vaccination against anthrax is performed by persons working with live cultures of pathogens, animal material infected with the pathogen, as well as those taking care of the animals, their slaughter and butchering, gathering, storage, transportation and primary processing of raw materials of animal origin.

Routine vaccination is carried out for the population enzootic to tularemia territories (adults – planning, children on epidemic indications). As a result of the specific prophylaxis of an immune layer among the population must be at least 90%.

In the case of cholera specific prophylaxis is of secondary importance. Vaccination is carried out one month before the expected rise of the morbidity. Time from vaccination

to revaccination in case of unfavorable epidemic situation is reduced. Thus, the concept of "epidemic indications" for specific prevention include indications of:

- territory on which immunization is carried out;
- contingents at risk of infection by some kind of infection;
- time of immunization.

In turn, the choice of the territory and contingents to be vaccinated, and the terms determined by the vaccination calendar, require a preliminary diagnosis of the local epidemiological situation.

**Psychological protection of the population.**

Psychological protection is one of the major activities of implementation of the tasks of the civil protection system for the prevention and reduction of negative psychological impact on the population and timely provision of effective psychological help.

Organization and implementation of psychological protection of the population rests with the Central Executive body which provides forming and implements the state policy in the field of civil protection.

Code of civil protection of Ukraine defines the rights of citizens on the socio-psychological support and medical assistance, medical rehabilitation in the case of the psychological injury. Mediko-psychological rehabilitation - complex of medical-preventive, rehabilitation and curative measures aimed at restoring physiological functions, optimal working capacity and social activity of rescuers of rescue services (formations), persons involved in the execution of rescue works in case of an emergency and affected by such an emergency, especially minors.

Psychological protection - a complex of organizational, medical, psychological and practical measures aimed at the prevention or reduction of negative impact of disaster on the mental health status of the population and timely provision of effective psychological support psychotraumatology.

**THE PROBLEM OF PSYCHOLOGICAL PROTECTION:**

1. Providing the population with a real and comprehensive information.
2. Create a normal psychological climate in the areas of emergency.
3. Participation in addressing the social needs of the population in the affected areas, the impact of the disaster.
4. Avoiding panic and unfair distribution of humanitarian aid.

**POWER OF PSYCHOLOGICAL PROTECTION OF THE POPULATION:**

1. Center of psychological support of gschs of Ukraine.
2. Centres (departments) of psychological support in the (state) emergency service in the regions.
3. The health workers.
4. Representatives of public organizations and religious faiths. The event of psychological protection of the population are implemented in the following forms:

1. Psychological diagnostics.
2. Psychological help.
3. Psycho-correction.
4. Psihopedagogica.
5. Psychological rehabilitation.

Psychological protection of the population directed to:

1. The formation of psychological stability.
2. Readiness to act in emergency situations.
3. Mental decline loss.
4. The provision of psychological services.

The event of psychological protection of the population (article 38 of the Code GO) is used for reduction and neutralization of negative mental States and reactions among the population in case of threat and occurrence of emergency situations and include:

- 1) planning activities related to the psychological protection (the use of existing forces and means of departments of psychological support of the specially authorized Central body of Executive power on issues of civil protection;
- 2) timely application licensed and permitted for use in Ukraine, informational, psychoprophylactic and psycho-corrective methods of influence on personality;
- 3) identification by means of psychological methods factors contributing to the emergence of socio-psychological tension;
- 4) the use of modern psychological techniques to neutralize the negative influence of emergencies on the population;
- 5) implementation of other measures of psychological protection depending on the situation.

The planning of activities and use of the services of psychological support is determined by the relevant normative-legal documents of the SSES of Ukraine and the instructions on the organization of psychological support service activities of the emergency services.

The goal, objectives, and principles of psychological relief.

The main purpose of psychological assistance to the population affected by an emergency is the preservation of psychological and physiological health of victims, preventing the development of destructive and deviant forms of human behavior, contribute to a more speedy and qualitative carrying out of rescue works.

Tasks of psychological assistance to:

- prevention of acute panic reactions, psychogenic neuropsychiatric disorders;
- informing the public about itself and mutual assistance in emergencies;
- regulation of moral and psychological state of the population;
- the development of abilities to control their own mental processes; the actualization of adaptive and compensatory resources of the individual;
- stabilization of psychoemotional state, increase efficiency; mobilization of psychological potential to overcome the negative consequences of emergencies;



preventing the development of posttraumatic disorders.

Types of assistance: individual and group.

Principles of psychological assistance in the event of emergencies: urgency and psychological support should begin immediately upon carrying out of rescue works; the unity and simplicity of the psychological impact - all activities that will be carried out by specialists, should be brought to the victims in language they can understand, without using specific terminology, and be focused on achieving the main goal;

qualification - emergency psychological assistance may be provided only by professionals with appropriate education and certificates for permission to work in extreme conditions; appropriate training or experience in emergency situations; confidentiality - all information relating to victims, remains confidential. If necessary, uses only aggregated data;

impartiality - to all categories of population equally friendly;

the active position of assist - specially trained professionals must look for victims in need of psychological assistance. Most of the people in critical situations to avoid seeking psychological help because they do not see persons requiring specialized care;

synergy - the essence of it is that a lot of negative factors in emergencies, act synergistically, that is, to repeatedly enhance the overall effect of its influence.

There is no preparation of a negative impact, as it were, a multiplication of one factor on another. Therefore, the medical, psychological and social interventions should be carried out synergistically. Basic functions in the direction of providing psychological assistance to the population in emergency situations:

- practical - the direct provision of emergency psychological assistance to victims of an emergency;

- coordination - ensuring communication and interaction between the psychological services of other departments, that is, psychologists of the State Emergencies Service of Ukraine: organize and coordinate the actions of the psychological and social services of other departments (MH, MES, Ministry of Internal Affairs, etc.) in order to prevent or reduce panic moods, mass unrest, destructive behavior and mental disorders;

- carry out preventive measures with the population and are systematically printed in periodicals on the formation of psychological readiness for effective action in case of emergencies.

The use of psycho-prophylactic methods.

Psychological prevention - focused systematic work of the psychologist together with the heads of departments of system of civil protection for the prevention of negative phenomena (among the population and personnel), the identification of the group of enhanced psychological attention (at different stages) and for psycho-correction work

Socio-psychological prevention is a system of measures aimed primarily at mental health, prediction of possible complications in the life or development of a certain contingent, which is the main object of activity of service GZ; identify social and psychological

conditions under which these complications can be prevented or mitigated their experiences; the development of a system of measures to ensure these conditions, involving their implementation by all stakeholders. Psychologists on the basis of the monitoring features of the development of personality, socio-psychological changes in society (groups) predict the possibility of one or the other. The most important areas of psycho-prophylactic work are:

- prevention in the healthy part of the population (personnel) stress and post-stress States, acute panic reactions "delayed" neuropsychiatric symptoms, the appearance of which is associated with natural and man-made disasters;
- prevention of persons with the already-developed neuro-psychiatric disorders;
- prevent excessive psychological stress in the society where there is a risk of crises, emergencies socio-political, natural and technogenic character;
- prevention of deviant behavior (manifestations of looting) in the case of emergencies, and the like.

These guidelines are implemented by operation of the totality of the units of the service of psychological support of the system GZ.

Identification of factors contributing to the emergence of socio-psychological stress.

Identification of factors contributing to the emergence of socio-psychological tension is ensured through a continuous diagnostic monitoring.

Diagnostic monitoring is implemented by using the research methods of psycho-sociological tools, which includes methods of data collection (observation, survey, document analysis, etc.) and information processing (computer statistical packages for data processing, qualitative, quantitative, correlation, factor analysis, etc.).

The use of modern technologies of psychological impact to neutralize the negative mental States among the population.

Model the use of modern technologies to neutralize the negative mental States among the population is determined by the structure of active methods of psychological impact, which includes methods: the information blockade, psychological counseling, methods of psychological correction, psychological and socio-psychological training, psychological therapy and rehabilitation. The technology of psychological counseling are used to provide human psychological assistance during a specially organized communication, which can be updated additional psychological capabilities of humans from a difficult situation.

The use of methods of psychological correction involves overcoming certain behaviors and activities of man by means of studying the individual peculiarities of the personality of their compliance with the requirements of the surrounding social and natural environment, identify and overcome existing contradictions, the formation of new goals, values, motivation, behavior, development of a program of lifestyle changes, transformations in the course of self-discovery and self-education, development of skills in self-regulation, and the like.

Psychological training can be used for the development of skills with the aim of socio-psychological adaptation and personal growth.

One of the most applied psychological technologies in the system of public procurement is the technology of psychological therapy and rehabilitation. This system of healing effects directed at the reproduction of the mental abilities that were lost, the normalization of the mental state during his stay in the heavy stress when psychogenic (non-pathological States of mind), that is, the elimination of extreme overvoltage that distort the normal mental functioning and behaviour of the individual. The effectiveness of the use of modern psychotechnology is primarily associated with the timely determination of the contingent of victims, which may consist of the following categories:

- families of those killed in the crash;
- victims of the disaster (the wounded and those who received an exacerbation of chronic diseases due to the disaster) and their families;
- disaster participants (those who directly survived the disaster, but were saved without damage) and their families;
- rescuers (various professional units that were involved in rescue operations) and their families;
- observers (both direct and those who witnessed the events via television).

The use of modern technologies of psychological impact at the stage of providing psychological assistance to the population affected by emergencies allows us to solve the following problems:

- the provision of emergency psychological assistance (directly in the situation of rescue operations and by telephone hotline);
- the provision of psychological assistance in crisis situations;
- Implementation of a course of psychological counseling for people who have lost loved ones;
- informing about organizations providing assistance in emergency situations (emergency services, law enforcement agencies, medical assistance, social assistance.

The provision of emergency psychological care to population affected by emergency situations.

The event of psychological defense aimed at reducing and neutralizing negative mental States and reactions among the population in case of threat and occurrence of emergency situations.

The main tasks of psychological support at liquidation of consequences of emergency situations are:

- proximity to the place of tragedy, working in communities of victims;
- coordination of the work, which should cover all the places with mass stay of victims;
- urgent psychological assistance and support for victims and their relatives;
- individual work;
- work with groups;

- unity with the victims and the simplicity of the psychological impact;
- information work with the population.

Emergency psychological assistance is a component of the measures on liquidation of consequences of emergency situations. Psychologists DSNs provide emergency psychological assistance to the affected population in emergency situations that occur during accidents, destruction of buildings, mining accidents and other emergency events.

Materials for self-control:

1. According to the survey among the population there were some not previously registered an infectious disease or group of diseases arise without further distribution, so the sanitary-epidemic state is given by:

- \* A. Unstable;
- B. Adverse;
- V. Emergency;
- G. Favorable.

2. Principal activities of sanitary-epidemiological service, in the process of liquidation of consequences of emergency situations in the peace time:

- \* A. Sanitary; epidemic control measures; monitoring the environment;
- B. Supply the population with quality drinking water and foods; prepare premises to accommodate people in the gathering places of the victims;
- V. Quarantine, observation, insulation;
- G. Form of infectious insulators, these shaft passers, the sanitary, sanitary-control points.

3. Assessment of results of exploration in the area of emergency health and epidemic status is defined as:

- A. Favorable, unstable, adverse, emergency;
- B. Favorable, unfavorable;
- B. Stable, unstable, threatening, emergency;
- G. Stable, unstable.

4. According to intelligence among populations do not exist infectious disease, or have been isolated cases of disease that are not associated with each other, so the sanitary-epidemic state is defined as:

- A. Favorable;
- B. Adverse;
- Sustainable.

5. Name the sequence of deterioration of sanitary and epidemiological situation assessment of exploration results in the area of emergency situations:

- \* A. Favorable, unstable, adverse, emergency;
- B. Emergency, adverse, unstable, favorable;

- V. Favorable, unfavorable, unstable, emergency;
- G. Unstable, favourable, adverse, emergency.

6. According to intelligence among populations arise a group of infectious diseases with a tendency to further spread or isolated cases of especially dangerous infections (plague, cholera, anthrax) so the sanitary-epidemic state is defined as:

- A. Adverse;
- B. Emergency;
- V. Unstable;
- G. Favorable.

7. The main factors influencing the emergence and spread of communicable diseases in emergencies:

- \* A. Disruption of social structures, intense migration processes; the disruption of medical and sanitary and anti-epidemic institutions;
- B. Intensive migration processes; the disruption of medical and sanitary and anti-epidemic institutions;
- V. Mental stress of the affected population, intensive migration, late notification, lack of doctors-epidemiologists;
- G. disruption of medical and sanitary and anti-epidemic institutions.

8. According to intelligence among the population, an epidemic of an infectious disease or group of diseases of especially dangerous infection:

- \* A. Emergency;
- B. Adverse;
- V. Catastrophic;
- G. Crisis.

9. The checkpoints are deployed:

- \* A. On the outskirts of the settlements, the railway, sea, river, railway stations and bus stations;
- B. At railway stations, motorways, sea and river ports, airports;
- V. On the ways of evacuation of the population from the quarantine zone;
- G. access roads to settlements.

10. Composed of checkpoints by forces and means of health authorities takes place:

- \* A. Sanitary-control points;
- B. Sanitary these shaft passers;
- V. Infectious insulators;
- G. Medical distribution point.

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