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# **OPERATIONAL PLAN FOR PREPAREDNESS AND RESPONSE OF THE HEALTH SYSTEM DURING RISKS, DANGERS, DISASTERS, STATES OF CRISIS AND/OR OF EMERGENCY IN MACEDONIA**

## **1. About the needs of a revised Operational plan for preparedness and response of the health system during states of crisis**

**I**n conditions of global environmental changes, the increase in the number of emergencies caused by weather influences such as floods, storms, extreme temperatures etc., and the increase of threat from pandemic flu and other communicable diseases highlights the need for preparedness of the health system during risks, dangers, states of crisis, disasters and/or states of emergency in the Republic of Macedonia (further in the text *states of crisis*).

Health crises are often unpredictable, they happen everywhere and at any time. They can cause considerable human suffering and losses, and serious economic consequences. Communities are especially vulnerable when the national or local level system, especially the health system, is not able to deal with the consequences of the crisis often because the sudden increase in demand surpasses the capacities of the institutions involved.

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In Table 1 below, a review is given of the states of crisis/emergency, elementary disasters and dangers that have struck the Republic of Macedonia during the period 2010-2015.

Table 1: States of crisis, states of emergency, elementary disasters and dangers that have struck the Republic of Macedonia during the period 2010-2015

Type of event	Number of events	Death cases	Endangered population
Floods	84	8	Around 700 families
Extreme temperatures	14	/	1900
Fires	126	5	/
Earthquakes	6	/	80
Accidents/traffic accidents in uninhabited areas	44	81	/
Landslides	19	/	15 families
Other/accidents in mines and breakdowns	2	12	/
Other/Lightning strikes	5	3	/
Migrant crisis in 2015	/	/	160.000
<b>TOTAL</b>	300	109	2695 families

*\*The "smaller intensity" events which are not of interest to the crisis management system have not been included in this review. Source: Crisis Management Center, 2015*

## 2. Risks and dangers in the Republic of Macedonia

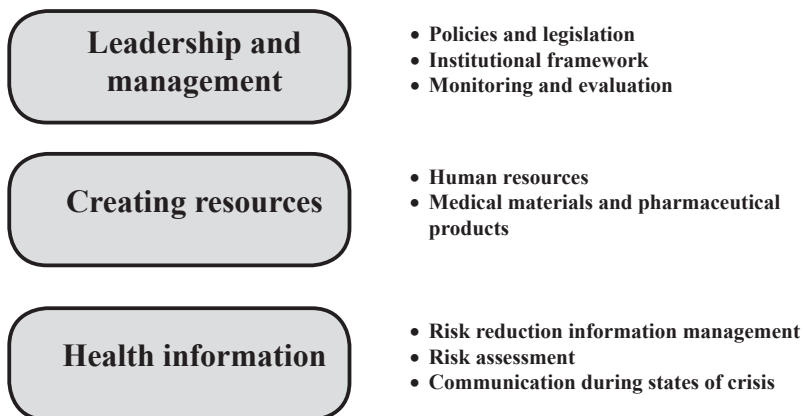
In the Crisis Management Law, Article 42, Paragraph 2, several groups of risks and dangers that are expected to have an impact on the health of the population in the Republic of Macedonia have been numbered. The following are the numbered risks and dangers:

- safety risks,
- natural and other disasters,
- technical and technological disasters,
- mass food, chemical and toxic substances poisoning, ionizing radiation,
- group of risks and dangers such as outbreaks of quarantine and other communicable diseases that can spread in people, animals and plants

- occurrence of communicable diseases that can spread in people (outbreaks), occurrence of communicable diseases that can spread in animals (epizootic), occurrence of communicable diseases in plants (epiphyties),
- group of risks and dangers as are large scale degradations and destructions of the environment,
- disorder in the regular state of the communal sphere, traffic and problems during supply of viands and material goods,
- increased influx of migrants and refugees that transit the territory of the Republic of Macedonia, or stay for a longer period of time.

### **3. Structure of the Operational Plan for Preparedness and Response of the Health System during Risks, Dangers, States of Crisis, Disasters and/or States of Emergency in the Republic of Macedonia**

The Operational Plan for Preparedness and Response of the Health System during Risks, Dangers, States of Crisis, Disasters and/or States of Emergency in the Republic of Macedonia is structured according to the following schematic review<sup>1</sup>:



<sup>1</sup> According to the guidelines from the: “WorldHealthOrganization. Strengthening health-system emergency preparedness - Toolkit for assessing health-system capacity for crisis management, 2012”

### Health financing

- Financing preparations for crisis
- Contingency financing

### Provision and delivery of services

- Accommodating capacities
- Capacities of the health institutions and the Emergency Medical Services
- Mass casualty management
- Communal infrastructure, logistics, telecommunication and safety

**Leadership and management** is careful and responsible managing of the health system through influencing the policies and actions in all sectors which have an impact on the health of the population. In cases of crisis preparedness planning, this means that the existence of a national policy that encompasses health system preparedness for states of crisis/emergency should be enabled. This also includes effective structures of coordination, partnerships, advocating (providing support), risk assessments, information management, and monitoring and evaluation.

**Creating resources** - the preparedness planning for states of crisis/emergency secures that, taking into consideration the available resources and conditions, there will be enough qualified personnel that will respond to a certain crisis/emergency. This function also includes:

- education and training;
- gathering and analyzing data and announcements;
- managing supplies and equipment needed as stocks in case of crisis/emergency.

**Health information** - updated and relevant data and information are necessary in order to conduct risk assessment, proper preparedness planning during states of crisis/emergency, and make decisions. These data and information should be available through a widespread, interoperation and secure information system that connects the relevant institutions (including the Ministry of Health), with a mandate to gather and store them. At the same time, the data that comes from different institutions should be compatible and documented in context of risk assessment and emergency planning.

**Surveillance and early warning systems** – in order to appropriately respond to states of crisis/emergency, data is needed that will refer to injuries, communicable diseases, vector borne diseases, food safety, nutrition, invalidity, some priority non-communicable disease, safety of blood, men-

tal health, etc. These data are part of the surveillance system. The surveillance and monitoring of the short-term trends is of vital importance during states of crisis/emergency. The provision of a rapid needs assessment concerning the immediate response after a specific state of crisis/emergency is done by expert teams that are made available within a very short period of time and that gather information necessary for determining the scope of resources needed for an effective response.

**Emergency risk communication during health crisis** - during health crisis, communication includes a wide range of capacities including, timely and transparent information; communication coordination; and understanding the audience and engaging with all stakeholders. Disseminating coherent and consistent messages by the authorities who are partners during health crisis is especially important. Timely sharing of information is a critical point due to the expected media pressure, especially in conditions of states of crisis/emergency.

**Health financing** - the structures of the Ministry of Health that work with managing the states of crisis/emergencies do not have a special budget for this activity. The funds necessary for functioning, education, exercises, etc. are covered by the regular budget incomes of MH. In the MH there is no Fund for contingency financing that would cover all the unforeseen health cost increases. For their personal needs, the MH additionally asks for funds from the Budget with a Government decision in order to provide a rapid and adequate response to states of crisis, without there being a negative influence on the normal budget costs.

**Provision and delivery of services** – the states of crisis planning process enables reviewing the manner in which the services are organized and managed in order to provide access, quality, safety and continuity of the health care for the different health conditions and health institutions during states of crisis/emergency.

#### **4. The role of the health institutions in the response to states of crisis/emergency**

The response of the health system to specific and suddenly occurred crises/emergencies and the effectiveness of the capacity in terms of provision of adequate health services and medical help to the affected population depend on *the level of preparedness of the hospitals* and the other health institution. From them it *is expected to continue to function during the time of crisis/emergency*, yet experience has shown that they can be especially

vulnerable during a crisis/emergency (for example a natural disaster and especially an earthquake) from the point of view of infrastructure, and with it they become incapable of satisfying the urgent needs. *The emergency medical services and hospitals* should possess the necessary capacity and infrastructure to be able to quickly respond to the urgent medical needs of the population and to the sudden changes that happen during every crisis/emergency.

*The access to, as well as the provision of quality emergency medical services during a crisis/emergency* is one of the most important strategies for reducing mortality and morbidity during any critical event. In the Republic of Macedonia, there are developed plans for response during a crisis/emergency with a special accent on pandemic influenza, on the level of all PHI general hospitals, clinical hospitals and university clinics. The resources and personnel of the health homes and the public health centers, on the level of separate regions and all the relevant stakeholders, have been encompassed in the plans. There have been 9 (nine) simulation exercises (with different topics – increased number of wounded people, burns during traffic accidents, fires, forest fires during a heat wave and Ebola infected people) to assess the response preparedness of the hospitals/university clinics and the health homes – emergency medical help services which were realized in Skopje -2009, Shtip-2011, Bitola/Prilep-2012, Strumica and Gostivar - 2013, Skopje in May, September and November 2014 and Ohrid in 2015. After each simulation exercise, an evaluation was done with suggested measures for improving the state.

## **5. Sexual and reproductive health during occurrences of risks, dangers, states of crisis, disasters and/or states of emergency**

During states of crisis/emergency (disasters), the most exposed population types concerning reproductive health are women, adolescents and children. The care for mothers and newborns, gender based violence and family planning have been included in the updated Operational Plan for Preparedness and Response of the Health System during States of Crisis as an important segment.

The inter-agency working group on reproductive health<sup>2</sup> defines a minimal package of services for reproductive health that should be provided

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2 Formed in 1995 in order to address and improve reproductive health in women, men and children during humanitarian crises. The governing body has 12 members and is comprised of United Nations agencies, international and national non-governmental organizations and academic institutions.

from the very beginning of the crisis in order to prevent diseases and infections, but also to save lives, especially the lives of women and girls. The integration of the minimal package of services for reproductive health in the national Plan for Preparedness and Response of the Health System during States of Crisis will contribute for better protection and management of the consequences of sexual violence, prevent increased maternal mortality and mortality in newborns, reduce HIV transmission and other sexually transmitted infections, as well as better planning for provision of a comprehensive access to services for reproductive health from the early days and weeks of the beginning of the crisis. The minimal package should be defined and prepared before the crisis even exists and it should include trained personnel, educational materials, and equipment and standard procedures for rapid purchase. The minimal package of services for reproductive health is activated by the Intersectoral Committee for Preparedness and Response of the Health System during States of Crisis. Till now, several training have been conducted to experts from relevant health institutions, ministries and institutions in order to strengthen the human capacities for a proper and timely response concerning sexual and reproductive health during states of crisis/emergency. The Ministry of Health identifies an institution from the health system to conduct the minimal package of services for reproductive health during states of crisis/emergency.

## 6. Conclusions and recommendations

In order to have a coordinated and intersectoral response, the system for preparedness and response of the health system during states of crisis is established and connected with the other key stakeholders on a national and local level.

The following steps are necessary in order to provide a timely and coordinated response to the challenges that arise during states of crisis:

- Appointing coordinating structures by the Ministry of Health for preparedness and response during states of crisis which include:
  - Sector for Preparedness and Response of the Health System during States of Crisis, with a clearly defined terms of referenced;
  - Coordinator for Preparedness and Response of the Health System during States of Crisis, with a clearly defined terms of references;
  - Surveillance Body for the Conducting of the Operational Plan for Preparedness and Response of the Health System during States of Crisis, with a clearly defined terms of references;
  - Coordinating Structures on a regional and local level, led by the

#### Public Health Centers.

- It is necessary to maintain a high level of preparedness among all the health institutions in the country by regularly updating the local and regional hospital plans for crisis response, clearly defining the roles of the medical and non-medical personnel, and testing them by regularly organising simulation exercises.
- It is necessary to upgrade the health information system in context of preparedness and response during states of crisis. The data which comes from various institutions should be compatible and documented in the context of risk assessment and emergency planning. It is necessary to establish an appropriate geographical information system (GIS) which will serve as a neutral platform for integrating these data for visualizing and analyzing the risks.
- A periodical assessment of the needs for training and appropriate conducting the trainings is necessary. The trainings should be incorporated within the national preventive programs and they should encompass: assessment trainings, risk management trainings, communicable diseases management trainings, trainings for hospitals preparedness to respond during states of crisis, etc. Special attention should be paid to training the nurses for response during states of crisis.
- An upgrade of the communication capacities during states of crisis is necessary.
- In order to properly respond to health crisis, a comprehensive, risk management communication plan needs to be created and it should be prepared and adopted by the highest national political structures which will be making communication decisions during health crisis. However, it has to be mentioned that a well-developed plan is not enough to ensure preparedness. Building good communication during health crisis is a continuous and dynamic process which includes exercises, checks, modifications and updates in order to provide a high level of efficiency in the communication activities and to also achieve the wanted results.
- It is necessary to establish monitoring and evaluation systems for all the aspects of the Operational Plan for Preparedness and Response of the Health System during States of Crisis and to also provide evidence that will help in the future planning and upgrading.
- It is necessary to review all the possibilities for establishing a sustainable health financing system during states of crisis.



## **Executive summary**

In 2015, the Ministry of Health in cooperation with key government institutions and the support of the World Health Organization initiated an activity for updating the Operational Plan for Preparedness and Response of the Health System during risks, dangers, crisis, disasters and/or states of emergency in the Republic of Macedonia (further in the text Operational plan for preparedness and response of the health system during states of crisis), which was adopted in 2009 in order to provide an intersectoral cooperation and participation of all relevant institutions connected to the jurisdictions in health concerning:

- timely planning and taking operational measures for response to states of crisis/emergency,
- timely and rapid announcements,
- constant communication and cooperation,
- raising the health care system,
- connection to the protection and rescue system and crisis management system.

The Operational plan for preparedness and response of the health system during states of crisis developed as part of the National Strategy for Health until 2020.

**References:**

1. World Health Organization. Strengthening health-system emergency preparedness. Toolkit for assessing health-system capacity for crisis management. Part 1. User manual (2012)
2. Government of the Republic of Macedonia. Operational Plan for Preparedness and Response of the Health System during States of Crisis. 2009.
3. Government of the Republic of Macedonia. Crisis Management Law, 2005.