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KRÍZOVÉ PLÁNOVANIE

RULES OF PLANNING IN SAFETY MANAGEMENT

Cieľom príspevku je analyzovať koncepciu krízového plánovania v civilnej ochrannej sústave. Strategické plány sú vypracovávané vrcholovými manažermi a definujú sa v nich všeobecné ciele organizácie. Prvky rizík, ohrozenia a riešenia krízových situácií treba brať do úvahy pri strategickom plánovaní, súčasťou ktorého je plánovanie civilnej ochrany. Plány pre civilnú ochranu sú vypracovávané za tým účelom, aby sa zohľadnili požiadavky organizácií a výrobných závodov pracujúcich pre civilnú ochranu podľa reálnych potrieb. Plány sú pripravované štátnou administratívou a miestnymi správnymi orgánmi, závodmi a inými inštitúciami, ktoré sú zodpovedné za prípravu a realizáciu úloh civilnej ochrany. Hlavnou úlohou pre vypracovávanie plánov civilnej ochrany sú vhodné riešenia pre organizačné a výrobné jednotky zaoberajúce sa civilnou ochranou v súlade s predpokladaným ohrozením a požiadavky a reálne možnosti plánovacích orgánov. Plný rozsah úloh civilnej ochrany daného prostredia musí byť stanovený plánom. Vybavenie útvarov civilnej ochrany technickými a vojenskými zariadeniami sa vykonáva inšpektorátmi civilnej ochrany. Jednotlivé ochranné prostriedky proti kontaminácii môžu sa kupovať v regionálnych obchodných domoch, ktoré takéto zariadenia skladujú, zatiaľ čo doplnkové prostriedky treba získavať samostatne.

The article aims to analyze the concept of crisis planning in civil defense system. Strategic plans are worked out by managers of the highest rank and define general aims of the organization. Elements of risk, threads, and ways of activity in crisis situation should be taken into consideration during strategic planning which is the planning of civil defence. Plans for civil defence are worked out in order to assignate and get ready for organizational and material enterprises of civil defence proper to real possibilities. They are prepared by state administration and local governments, factories and other units and institutions which are responsible for preparing and realization of tasks of civil defence. The main aim for working out the plans for civil defence is to get ready appropriate organizational and material enterprises for civil defence in accordance with foreseen threat and needs and real possibilities of the planning rank. The full scope of civil defence tasks of given rank should be given in plans. Providing civil defence formation with technical and military equipment is realized by civil defence inspectorate. Individual protective means against contamination can be bought in regional warehouse of civil defence equipment, while supplementary means should be done individually.

Planning, as one of the most important functions of management should be an implement of an active control of all initiative processes. Successful firms do not forget also on safety planning as a part of management.

As a result of the function of planning there is a pattern of activity (functioning) of an organization in a definite section of time, that is its plan for a given period of time [1]. The plan itself consists of a set of different documents. Its contents, may be defined as three elements: *set of aims, required material and energetic effect*, which are to lead to realization of aims, and required (necessary) *resource of productive factors*, here understood as a distributive set of personal and outfit activity carriers.

Modern philosophy of planning which results in a *business plan* understood as an economy plan, a plan of running business including security questions.

The following criteria should be fulfilled:

- *Advisability*, the need of state and choice of means appropriate for reaching the pre-planned aims.

- *Feasibility*, that is a realistic assessment of planned enterprises. Realism can only be assessed after the task has been achieved (ex post).
- *Internal agreement*, lack of inconsistency of the plan, which practically means the appropriate formulating of subordinated plans that must be conformed with the superior strategic plan.
- *Efficiency*, meaning: simplicity, clarity, and intelligibility of assumptions making possible skillful implementation and realization of the plan.
- *Multi-variant*, which is connected with preparing at least three variants of the plan (probable, pessimistic and optimistic).
- *Detail confinement*, ensuing from time horizon of the plan. In practice particular parts have to be in accordance with the planning horizon.
- *Completeness*, meaning giving a detailed description of the whole enterprise including all factors having decisive influence.
- *Rationality*, building the plan in accordance with standards and required rules.

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Strategic plans serve to obtain general aims of an organization while operational plans describe implementation of strategic plans into every day activity [2]. Both strategic and operational plans are linked with a mission of an organization, with its general aim justifying its existence. Two types of plans are usually used to manage organizations: strategic and operational ones.

Strategic plans are worked out by managers of the highest rank and define general aims of the organization. Within the framework of this planning, plans for civil defense of certain institutions are worked out. Strategic plans lay out principal directions of activity and define general aims of organizations. A strategic plan embodies strategy of a given organization and develops around it. Strategic planning is a process of elaboration of strategy and updating it. Elements of: risk, threats, and ways of activity in crisis situation should be taken into consideration during strategic planning which is *the planning of civil defense*. Tactic plans are derived from a strategic one but they have smaller time horizon, are more detailed and concern medium level of management.

Operational plans contain detail assignments dealing with implementation of strategic and operational plans within everyday operational activities. Strategic and operational plans differ in three main elements:

Time horizon is a quantity related to period for which the plan is prepared. Strategic plans concern many years and even decades. Operational plans encompass a year.

Human resources planning is carried out in the form of appropriate procedures and encompasses four basic elements:

1. Planning of future staff needs for an organization by assigning how many people and what skills will be needed.
2. Planning for balance in future staff by comparing numbers of workers who are needed with those already employed who will stay in an organization.
3. Planning of recruitment and lay – offs.
4. Planning of improvement of workers to ensure organization an influx of experienced and competent staff.

Modern dimension of different threats

The world requires new philosophy of safety management. Safety is a phenomenon that requires management, both as global and regional as close vicinity. This important and objective sphere of life of modern humanity can't be left for intuitional action or be tested by method of trials & errors. Safety undergoes the rules of praxeology and should be managed by competent experts. It requires high managerial qualifications. Maybe we witness the need of separation of new branch of science, which methodologically and effectively will contribute to effective opposition to this new dimension of human threats. This branch will be *securitology* [3]. It will define a wide range of preventive enterprises against negative outcomes of modern development of civilization and acts of nature. We are in the beginning of the way. This notion requires a precise definition. Scientific research should be introduced, the language of the branch should be defined. Axiological foundations of this

phenomenon need to be put forward. One need work on research apparatus, application of well-known methods from other branches helpful to securitology. The new branch should undoubtedly take advantage of output of praxeology, psychology, sociology, politology, pedagogic and economics. It should take advantage of output of humanities, technical, law and medical sciences. It will not avoid cooperation with military, police and crime detection sciences. Securitology is a system of permeation of enterprises for the benefit of security in different separated subsystems of human activity. That's philosophy of integration of all known aspects of safety. Crisis situation in one subsystem causes repercussions of dangers in other subsystems. One may say, good people should think securitologically all over the world. Nowadays, when we face global terrorism people do that, but it is not a well ordered process. There is a lot to do by educational subsystems in this regard, because they shape human awareness. Without educational effects for the benefit of safety, systems for crisis feedback technical, rescue and reproduction systems will gain much worse effects. It will be caused by inertia of victims and inability for cooperation with rescuers. We educate teachers, engineers, managers, lawyers, journalists etc. and during the course of their studies they learn nothing about crisis management. Securitological thinking levels this absurdity.

Seeing that safety is so important for human needs we should not omit this value in upbringing. Such directional upbringing will be part of securitology. The state should acknowledge as a necessary the task of institutionalization of upbringing for safety. There is common awareness of increase in dangers of human existence. Safety should be treated as a phenomenon for the community at large and life of each individual. Therefore the ideal of personality should take into consideration elements of thinking about human safety. An objective side of upbringing for safety should be noticed. Educational effects of didactics of protection of citizens. Defensive education of society in the situation of global terrorist threat is more and more acceptable. Upbringing for ecological safety is invariably important. Significance of competence of people dealing with system of safety is increasing. Nowadays we observe global character of postulating education for safety. Among main competences of modern people one cannot miss ability to estimate complex dangers and skillful behavior in a crisis situation. An increasing international tension causes common appreciation of education for safety.

State's safe functioning, safe existence of each family and each citizen is a superior value, it is a basic need of each human being. Having a complex attitude towards safety one first of all should define: what the notion of safety means, what should be organization and management of safety system. In a subjective term the safety prevention encompasses at least civilians, territory and system of authority while in a functional term: political, economic, military, public and social activities.

Safety can be guaranteed by a complex, multidirectional and multidimensional system of state's functioning. Securitology should take into consideration each element of dangerous phenomena. It should supply practice of safety management with knowledge about newly discovered objective phenomena that threaten safety. We are talking about a need of assurance for the safety of people and their

possessions. *Terrorism* is the biggest problem of the modern world. Kidnapping for ransom has increased. Terrorists are able to threaten with weapons of mass destruction (chemical, biological and atomic weapons).

Planning of civil defense

Plans for civil defense are worked out in order to assignate and get ready for organizational and material enterprises of civil defense proper to real possibilities [4]. They are prepared by state administration and local governments, factories and other units and institutions which are responsible for preparing and realization of tasks of civil defense. Managers of factories and appropriate chiefs of civil defense are responsible for working the plans out. They should be prepared by experts working in a given field of planning, because they can draw rational conclusions and assess all data for planning. Finally, they can make decisions. The base for working out the plans for civil defense is assessment of threat and needs in terms of realizations tasks of civil defense, and also in a certain scope:

- Current law regulations on realizing tasks of civil defense
- Decisions of superior organs of civil defense and decrees of Council of National Security and regional organs for safety managements
- Decrees of department organs concerning realization of tasks of civil defense
- Agreement with community organizations
- Coordination with authorities in scope of realization of tasks of civil defense
- Economy mobilization plan

General rules for planning are directions to prepare plan of civil defense. The main thing in civil defense plans should be its reality [5]. That's why all planned enterprises should be based on present means and resources and possibilities. These resources are used for planning activities during the peace period and also in the state of emergency and would-be war and are real and feasible. Realization of these tasks and fulfilling all requirements that are put before civil defense plans requires a lot of strength and effective work of regional organs of civil defense, state administration offices and community organizations. The main purpose of working out civil defense plans is setting, coordinating and preparing enterprises of civil defense, pre-planned to be realized during a war, havocs in accordance with foreseen threat and real needs and possibilities of a planner (hypothesis of most probable threats are done).

Purposes of planning civil defenses [6]

The main aim for working out the plans for civil defense is create appropriate organizational and material enterprises for civil defense in accordance with foreseen threat and needs and real possibilities of the planning rank. The full scope of civil defense tasks of the given rank should be given in plans. The tasks should especially concern:

- protection of people
- protection of food and water, farm products, animals and fodder
- protection of factories, raw materials, products and culture

- preparation of organs and civil defense units for rescue operations in endangered areas and liquidation of results of emergencies

These tasks should be realized by carrying out a sequence of events of organizational, engineering, technical and educational nature.

Base for civil defense planning

The base for preparing civil defense plans proclaim:

- present law regulations concerning civil defense and superior civil defense organs' decisions
- present and real status quo of civil defense of rank working out the plan
- conclusions drawn from the assessment of threat and analysis of needs and possibilities
- instructions from appropriate organs of departments concerning preparation of civil defense in a special range
- assignations in scope of taking part and means concerning civil defense in liquidation of results of emergencies
- reciprocal services of civil defense and army as well as activity of organizational units for the benefit of civil defense
- settled with appropriate authorities (regional) and army HQ (headquarters) in time and space aspects way of displacements and evacuation of people

Principles of civil defense planning

These principles are as follows:

- agreement of planning with rules related to civil defense tasks
- encompassing in terms of planning the whole scope of activity of civil defense
- coordination of own intentions and tasks with organizations of higher and lower levels of civil defense including organs and units in cooperation
- coherence of civil defense plans with economic and social plans of development
- reality of planned organizations
- parallel planning means preparation and settlement of plans at all levels at the same time
- possibility to manage the civil defense by the chief of civil defense on the basis of individual documents included in the plan
- brevity in formulating intentions of realizing tasks and preparation only necessary supplementary documents.

Plans for civil defense are worked out by competent workers dealing with problems of civil defense with cooperation of departments, divisions responsible for solving special tasks of civil defense. An important prerequisite in the planning process is that the voivodship (district) civil defense chiefs should be able to dispatch the following data to the chiefs of regions, towns, districts and subordinate factories:

- elements of threat for voivodship and adjoining voivodships, way-out areas and ways and time of regrouping of civil defense formations
- intension of evacuation (taking out) of people, including areas of re-locating people, their capacity, means of transportation, roads, time ect.

- intention of running rescue operations (in circumstances of surprise and after realization of basic civil defense organizations)
- lists of factories (buildings) recognized as especially endangered and continuing, interrupting and relocating their activity at war, being in respective categories
- tasks concerning organizing and setting off civil defense at the service of superior level
- civil defense of high readiness
- civil defense units' tasks other units coordinating of voivodship level within comprehensive protection of rescue operations, evacuation of people and staying in displacement areas
- tasks to be done in benefit of the army
- participation of armed forces and civil defense in liquidation results of havoc and tasks within protection of the environment endangered by dangerous substances and poisons coming from industrial factories floods etc.
- organs taking over control of civil defense in case of damage of its HQ of voivodship level and towns regarded as especially endangered
- other necessary information.

Civil defense plans of voivodship level are marked "SECRET", at the level of factory or commune "FOR INTERNAL USE". It is possible to work out with permission of appropriate chief of civil defense, one common plan for civil defense for some factories which are within premises of one manufacturer or directly adjoining ones. Voivodship chiefs of civil defense define detailed rules for working out the civil defense plans pass them on to subordinate chiefs of civil defense and managers of factories, all necessary data to work out plans on respective organizational levels. Civil defense plans are coordinated with other organs and units only in the part concerning collaboration with them. Plans are signed by chiefs of civil defense (managers of a factories). Plans coordinated with superior regional chief of civil defense and then ratified by chief of civil defense of voivodship, region, commune, manager of a factory.

Civil defense plans consist of:

- graphic documents (maps, plans, sketches)
- descriptive documents (legends).

Graphic documents of civil defense plans are made on maps:

- at voivodship level (scale 1:100 000 or 1:50 000)
- at region and commune level (scale 1:25 000 or 1:10 000)
- at factory level (on factory plans).

Descriptive documents (legend) are made as:

- conclusions
- diagrams
- specifications.

Structure and contents of the factory civil defense plan

Plans of civil defense should have the structure in accordance with instructions by Chief of Civil Defense of the country. There is a structural uniformity. But according to the rule of reality each plan corresponds with speciality of the planning organ. A factory's

civil defense plan does not encompass personal and material services releasing from military service and protection of a factory.

The following contents should be in a civil defense plan:

Assessment of threat and activity intention

Contents of the document in a graphic form:

1. Assessment of threat at peace:
 - Displacement of flammable, toxic, explosives and industrial materials in the factory and its environment
 - Fire threat
 - Flood threat
 - Other threats
 - Foreseen results of extraordinary events.
2. Assessment of threat at war:
 - Objects that can become military targets and foreseen results of enemy's assaults
3. Displacement of machinery important for production continuity
4. Displacement of the alarm means, elements for detection of contamination and medical service
5. Factory's civil defense HQ
6. Place of forming factory's civil defense.

The contents of documents in a descriptive form

1. Conclusions on assessment of threat at war and peace concerning:
 - ways of protection the staff (shelters, equipment for means protection, evacuation)
 - protection of important mechanisms, technical and technological specifications
 - organization of civil defense formations
 - staff getting ready for self-defense against results of threats
 - scope of collaboration with other town or neighboring factories rescue groups.
2. Intention of activity in order to realize tasks of civil defense includes:
 - organization of threat detection and alarming the staff
 - organization of staff evacuation
 - sheltering the staff and stock with individual means of protection against contamination
 - organization of civil defense
 - organization of collaboration with town and neighboring factories rescue groups
 - preparing the points of special operations
 - protection of properties necessary for staff survival
 - realization of tasks given by regional chief of civil defense
 - marking the factory with the protective signs.

The graphic part is done on the factory plan or town's plan using conventional tactical signs and abbreviations used in civil defense. Information from assessment of threat can be obtained in Division of Crisis Management and Citizen Protection.

Rescue forces of a town consist of:

- police forces
- professional and volunteer fire fighters
- unit of chemical rescue
- medical and technical services

- operational services of voivodship
- municipal guards
- duty service of Regional Center for Crisis Management
- military base duty service
- civil defense formations of neighboring factories
- other forces which can be called for rescue operations.

Marking the factory with international protective signs concerns:

- medical premises
- objects of culture.

Staff evacuation plan

The documents that are being worked out concern staff evacuation as well as important mechanisms and specifications. Factories which can be dangerous for neighboring citizens because of malfunctions of mechanisms containing poisonous industrial agents get from regional chiefs of civil defense tasks connected with the protection of the citizens.

The contents of the documents in a graphic form:

- places and areas endangered where evacuation of staff is planned
- ways of staff evacuation
- areas of displacement
- displacement of elements that protect evacuation.

The contents of the document in a descriptive form:

- staff's conduct in case of danger requiring leaving the work place
- staff's conduct in case of terrorism (planting the bomb or other threats)
- ways of notification and alarming the staff
- protection of important documents, seals, computer programs and money
- calling the police (fire fighters or other) and cooperation with them
- organization of safeguarding of evacuation given by regional chief of civil defense.

Documents in a form of registers and specifications:

- arrangement of means for preparing protective premises or rearrangements of premises for protective shelters
- providing the staff with individual means of protection against contamination
- furnishing the civil defense formation with equipment and materials
- displacement of premises assigned for staff living quarters
- specification of goods necessary for staff's survival
- realization of blackout
- possibility of giving the first aid for the staff.

Citizen evacuation (in this case factory workers) from endangered areas of town is organized by self-government administra-

tion offices by forming the groups on evacuation and elements for protection of evacuation. These elements are:

- Information and evacuation points
- Embarkation points
- Distributions points
- First aid and technical support points.

Providing civil defense formation with technical and military equipment is realized by a civil defense inspectorate. Individual protective means against contamination can be bought in a regional warehouse of civil defense equipment, while supplementary means should be done individually.

A plan of logistic protection of civil defense activities:

The contents of documents in a graphic form:

- Displacement of freshwater reservoirs and water for industry and fire fighting
- Displacement of points of special operations (medical interventions, decontamination of means of transportation, garment, veterinary interventions)
- Displacement of goods necessary for staff survival (firewood, medicine, foodstuffs, hygienic staff, electricity inducing units, disinfectants, fuels, repairing means)
- Displacement of shelters and protective hideouts
- Displacement of civil defense equipment warehouse and other protective equipment
- Elements connected with blackout
- Displacement of medical service points

An activity plan of civil defense in the process of getting the higher levels of defensive readiness.

The contents of documents in a descriptive form:

- Characterization of levels of defensive readiness of factory
- General schedule of getting higher levels of defensive readiness
- Activities of the administration team of civil defense during getting higher levels of defensive readiness.

Working plans of Center for Crisis Management

- composition and tasks of team members
- notification of team members
- preparing the work places for managing team and its equipment (communication equipment, protective means, living quarters equipment and other).

Specification of permanent duty

Getting higher levels of defensive readiness is connected with realizations sets of tasks:

- for getting higher levels of defensive readiness one should realize set of preparing tasks as well as first and second set of tasks,
- for getting complete level of defensive readiness one should realize third set of tasks.

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