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THE COMPETENCES OF COMMAND CADRE OF THE AIRPORT FIRE SERVICE ON THE EXAMPLE OF SAFETY ASSURANCE OF WARSAW OKECIE AIRPORT

Abstract

The globalization process in almost all spheres of our life causes a possibility of making equal living standards in all countries of the world. An introduction to globalization was undoubtedly the development of air transport which greatly accelerated the possibility of travelling on all continents. Along with the development of technology, airplanes used for carrying people and cargo become much better, quicker, but they also become more and more complicated in respect of their construction. This also gives rise to requirements that airports have to comply with, i.e. in order to receive super modern machines they must be equipped with modern navigational facilities, modern equipment for surface handling of airplanes and passengers. This, in turn, requires a continuous development of knowledge and competence from airport staff to be flexible in the constantly modernized environment. In consideration of a rapid development of air transport, and consequently its increasing importance for the world economy countries face a problem how to assure the high quality of aviation services, its access for a man-in-the-street, and first of all safety in its broad meaning, which is a synonym of quality in air transport. Nowadays, this is the main problem in air transport which has priority before the comfort of a traveller. Safety in aviation is approached in two dimensions - prevention of occurrence events and removal of results of unforeseeable incidents, accidents or catastrophes. A special part in this area is performed by the airport rescue and firefighting service, commonly called the Airport Fire Service (AFS). The main requirement for airport rescuers set by the International Civil Aviation Organization (ICAO) is conducting rescue and firefighting operations in case of an aircraft or airport incident (disaster). In Poland the AFS is a structural unit of the airport organization and therefore, within the framework of its activity, it performs a wide range of other functions consequential from airport operations such as conducting protection operations (refuelling of an airplane with

passengers on board, assisting with hot works carried out on the airport premises), preventive activities (training of airport services, giving opinions on investment projects in the airport etc.). The performance of operations by the AFS depends on their command cadre and more specifically on the competence of this personnel. The specific nature of the AFS responsibility for safety on the airport causes that the manner of operations of this service has a characteristic feature, distinguishing it from other airport services.

In the AFS activity two modes of operations can be distinguished:

- usual during the so called everyday work, normal activities like in every organization, and
- alarm during emergency situations such as fires, disasters, other rescue and firefighting incidents where a unit is involved.

An approach to giving orders and instructions by the command cadre will be different according to the mode of AFS operations. This requires suitable predispositions which should be characteristic of the AFS command cadres as well as high individual competences. Taking into account a number of factors such as the development of technology, engineering and management sciences which have an immediate impact on the development of air transport, a conclusion can be made that year by year higher competence requirements are established for airport rescuers, and one of the basic elements which can guarantee the fulfilment of the function they are qualified to perform is the proper organization and provision of specialist training.

1. Air transport

The twentieth century was characterized by a very quick development of technology, engineering, information technology, etc. of practically every sphere of a human life or activity. Two world wars had an immediate and significant impact not only on the development of military technology or medicinal sciences but also on economies of most countries all over the world, thus finally having a positive effect on the social situation of people. An extremely high progress was noticed in aviation, both in respect of construction and exploitation of aircraft as well as air transport supporting technology and engineering and in management systems and services of the air traffic. Over recent years air transport is the most rapidly developing branch of transport, one of the most important sectors of the world economy which generates significant profits. In addition to its positive effect on the development of world markets, air transport affects the progress of the globalization and integration process. This is especially visible on the European Union market where the flight market is substantially liberalized and integrated. The network of European airports includes approx. 370 airports, whereof 335 are situated in the territories of 15 former EEC countries.

Air transport is composed of many interrelated, mutually dependent elements. Therefore, it is often referred to as the air transport system. The most important components of this system are as follows:

- aerospace with an air route network,
- airports along with their infrastructure including radionavigation landing assistance systems,
- air navigation service providers,
- ground and satellite navigation devices,
- communications and supervisory devices and systems,
- users of aircraft,
- aircraft industry.

These components determine the features which are the characteristics of the air transport system:

- complexity resulting from a great number of components and interrelations;
- probabilism, i.e. unpredictability of all events happening in the air traffic management process (a definite probability of incidents),
- limited ability to make self-adjustments which means that when any faults occur in the system activity, the participation of the man is necessary to restore the system's efficient performance,
- dynamics and flexibility resulting from the interference of the man in the system operations in a definite time and space and from the possibility of adapting the system to new circumstances.

Important aspects of air transport are as follows:

- possibility of relocating quickly from one continent to another,
- comfort of travel,
- safety,
- price (accessibility),
- in the event of a disaster a large number of casualties,
- international nature of events,
- a definite location of an airport (most often near large concentrations of population),
- airline luggage restrictions,
- necessity to be punctual, time limits for departures / arrivals,
- necessity to surrender to rigours of airport security,
- susceptibility to weather conditions.

The complexity of the components of the air transport system, its features, characteristics of aircraft such as:

- ability to attain high flight speed and altitude,
- lack of possibility to stop an airplane in mid air,

- limitations regarding a change of a cruising speed,
- susceptibility to weather conditions and other effects of natural phenomena cause the necessity to create standards for all aspects of the system by introducing uniform rules, regulations and codes of practice as well as management and design procedures to assure safety and correct development of the system.

2. International civil aviation principles

Already during World War II some countries recognized the need for arranging the situation in international civil aviation. Therefore, in 1944 in Chicago they signed the Convention on International Civil Aviation which initiated an air traffic management process. The aim of the convention was to develop and support friendship and cooperation amongst nations to assure global safety and peace in the world. The countries which were the signatories to the Convention co-ordinated principles of international civil aviation, so that it could develop in a safe, orderly and fair manner for all nations and according to economic rules.

3. European civil aviation regulations

Having regard to the integration process, the European Union, basing on international regulations established by ICAO, developed a number of Directives and Regulations providing standards for the following areas of air transport in EU countries:

- market access.
- air traffic navigation,
- air traffic safety,
- protection of aviation,
- social matters,
- protection of passenger rights,
- trans-European transport network,
- environmental protection,
- external relations,

and other problems.

In compliance with the provisions of the Chicago Convention, on the basis of international standards every Member State should publish regulations, rules and laws applicable on its territory. With regard to the foregoing in Poland the Aviation Law Act was published in 2002 which governs legal relationships in respect of civil aviation in Poland. Civil aviation includes all air traffic with the

exception of state aviation, i.e. any state aircraft and state airports used exclusively for takeoffs and landings of state airplanes.

Amongst other things, the Aviation Law Act set forth standard requirements for the following issues:

- control in aerospace,
- civil aviation administration,
- aircraft and other air equipment,
- airports, landing grounds and airport ground equipment,
- air traffic personnel,
- air navigation,
- exploitation of aircraft,
- aviation economic activity,
- protection of civil aviation,
- air carriage,
- protection of passengers,
- third party liability in aviation,
- fines for violation of duties or conditions under aviation regulations,
- penal provisions for any breach of aviation regulations.

The Act liberalized the air flight market in Poland which so far had been a national domain and thereby it made it possible to provide a broader access to enterprises to render air transport services. Simultaneously, in order to assure specific safety standards, in pursuance of international regulations, enterprises operating in the air service sector were imposed upon very high requirements to comply with as a condition for their existence on the market. As from the effective date of the Act the economic activity including such objects as airport management may be carried out by a company possessing an airport management licence. The public airport management licence authorizes its holder to provide services related to takeoffs, landings and stops of aircraft, performed in the interest of air carriers and other users of aircraft.

It is also indispensable to obtain a licence for the ground handling of aircraft, cargo, passengers and their baggage. The ground handling includes the following categories of services provided in the airport in the interest of air carriers using an airport:

- 1) general administrative and economic services performed in the interest of users,
- 2) passenger service,
- 3) luggage handling,
- 4) air cargo (commodities and mail) handling,
- 5) ramp service of aircraft,
- 6) cabin service of aircraft,

- 7) services including refuelling and provision of lubricants and other technical materials,
- 8) aircraft technical and administrative services,
- 9) field operation and administrative service for crews of aircraft,
- 10) surface transport connecting an airplane and a terminal,
- 11) catering and provision of other supplies and in-flight services.

4. Safety of air traffic on airports in Poland

An airport can be founded provided that a licence is granted by the President of the Civil Aviation Office and it can commence its operations upon being entered in the register of civil airports.

Aircraft and air carriers have the right to use public airports under the principle of equality. The conditions of use of public airports and access fees for such use can be diverse only for kinds and characteristics of aircraft and the nature of performance of flight operations.

To provide the airport safety assurance system in accordance with the law the airport management has the following obligations:

- 1) use an airport in compliance with its purpose,
- 2) exploit the airport ensuring safety of flights and efficiency in the provision of service to users of the airport,
- 3) keep the airport and its components in the condition complying with technical requirements specified by a competent authority and in conformity with particulars in the register of civil airports,
- 4) determine the border of the flight area of the airport subject to the approval by the President of the Office,
- 5) ensure necessary medical aid at the airport,
- 6) make information contained in the airport operating instructions available to users of the airport,
- 7) ensure the conditions to airport administration authorities carrying their official duties necessary to perform such duties,
- 8) make available to the President of the Office, irrespective of other duties, information necessary to keep records of air traffic data, volume of passenger traffic and air cargo carriage, in compliance with the classification set forth in the Regulation No. 437/2003/EC of 27 February 2003 on statistical returns in respect of the carriage of passengers, freight and mail by air (Official Journal L 066 of 11.03.2003),
- 9) notify immediately the President of the Office and institutions providing air navigation service personnel of issuing an order to close the airport for air traffic or to introduce reasonable restrictions on its use, reasons for closing the airport and expected duration,

- 10) organize airport rescue and firefighting services,
- 11) coordinate works of a local airport safety team,
- 12) ensure the delivery of meteorological information for the needs of airport users.

5. Airport rescue and firefighting system

To ensure safety of flight operations on airports the airport administration is obliged to organize and maintain a rescue and firefighting system on airports within the framework of the national rescue system including the following actions:

- 1) develop an action plan for emergency situations,
- 2) prepare airport fire safety instructions in accordance with international regulations including the specification of action procedures in case of fire or another local emergency situation, agreed with the local competent commander of the National Fire Service,
- 3) organize and assure operations of the rescue and firefighting service equipped with specialist equipment,
- 4) maintain necessary rescue and firefighting resources.

Health care system, public administration, National Fire Service units and other public services cooperate to prepare and implement action plans for emergency situations and they report to the airport administrator in respect of coordination of activities.

The airport rescue and firefighting service is a firefighting unit within the meaning of the Fire Protection and Prevention Act of 24 August 1991. Employees of the airport rescue and firefighting service undergo specialist training provided at the expense of the airport administration.

The fire protection and prevention consists in the realization of activities aiming at the protection of life, health, property or environment against a fire, natural disaster or another emergency situation by:

- 1) preventing the occurrence and spreading of a fire, natural disaster or another emergency situation,
- 2) providing forces and resources to fight a fire, natural disaster or another emergency situation,
- 3) organizing rescue activities.

In compliance with the Fire Protection and Prevention Act in force a natural person, a corporate body, an organization or an institution using the environment, a building, an object or premises are obliged to protect it against the risk of fire or another emergency situation. Relevant provisions govern liability for any breach of fire protection and prevention regulations.

The owner of a building, civil structure or premises who assures fire protection has the following obligations:

- 1) to comply with civil structural, design, installation and technological fire protection requirements,
- 2) to provide a building, civil structure or premises with required fire detection systems and extinguishing equipment,
- 3) to assure maintenance and repairs of fire detection systems and extinguishing equipment so that their efficient and unfailing operations would be guaranteed,
- 4) to make sure that any persons in a building, civil structure or premises are safe and they will have a possibility of evacuation,
- 5) to prepare a building, civil structure or premises for rescue activities,
- 6) to acquaint workers with fire regulations,
- 7) to agree procedures in case of a fire, natural disaster or another emergency situation.

All or partial responsibility for the realization of fire protection and prevention duties is assumed by a manager or user of a building, civil structure or premises in accordance with a civil law contract establishing the management or use. If no such contract is executed, responsibility for the realization of fire protection and prevention duties will be imposed on an actual holder of a building, civil structure or premises.

The obligation to comply with fire protection and prevention requirements also rests on the manufacturer of machinery, devices and other products, as well as on buyers of foreign licences or imported machines, devices and other products and on the user of machinery, devices and other products.

Fire protection and prevention practices and conditions regarding buildings, other civil structures and premises are set forth in applicable regulations which provide for:

- prohibited actions in structures and adjacent premises because of a possibility of causing or spreading a fire or a probable occurrence of difficulties in rescue activities or evacuations,
- 2) procedure for performance of duties by owners, administrators or users of buildings, other civil structures and premises in respect of fire protection and prevention,
- 3) procedure for usage or storage of hazardous materials,
- 4) suitable conditions of evacuation and conditions where using an existing building is deemed as threatening to human life,
- 5) conformity requirements for water supply and firefighting installations,
- 6) the range of obligatory usage of fixed firefighting equipment, fire alarm systems including alarm signalling devices and alarm systems, audio warning devices and fire extinguishers in civil structures,

- 7) conformity requirements for technical installations and equipment in civil structures,
- 8) procedures for organizing fire hazardous works and an assessment of explosion risks,
- 9) procedures for fire protection of forests,
- 10) procedure for fire protection of combustible crops of agricultural products, their transport and storage.

Fire protection service units include:

- 1) National Fire Service structural units,
- 2) Military Fire Service structural units,
- 3) company fire brigade;
- 4) company emergency service,
- 5) district professional fire brigade,
- 6) county professional fire brigade,
- 7) local emergency service,
- 8) voluntary fire brigade,
- 9) association of voluntary fire brigades,
- 10) other rescue units.

Fire protection service units are established as uniformed services and equipped with specialist equipment, intended to fight fires, natural disasters or deal with other local emergency situations. Workers employed in these units have special duties resulting from the nature of their work and they should have suitable qualifications and satisfy psychophysical conditions. They are referred to as 'firefighters from fire protection units'. Employees who have required qualifications to become a firefighter, firefighting technician, firefighting engineer or an individual whose qualifications to practise these regulated trades are recognized as a result of the procedure for obtaining recognition of qualifications acquired in the Member States of the European Union, the parties to the European Free Trade Agreement (EFTA), the signatories to the European Economic Area Agreement or the Swiss Confederation can become firefighters from a fire protection unit provided that they carry out rescue activities.

Qualifications required to pursue a firefighter career include having general education, at least at the secondary level and the completion of a basic training course or a basic and supplementary training course. Firefighters from fire protection units should possess physical and psychological abilities to work in these units. An assessment of prospective firefighter's physical and psychological ability to work is carried out by an occupational medicine specialist.

ICAO defined a basic task of the rescue and firefighting service (including the Airport Fire Service – AFS) as saving a human life. In case of an accident or incident it is of significant importance for saving a human life to use reasonable

precautions on the airport. The most important factors upon which efficiency of rescue activities depends include as follows:

- personnel training,
- very good equipment efficiency and condition,
- the time which must elapse until the personnel begins a rescue activity and firefighting equipment is used.

The AFS must be equipped with suitable rescue and firefighting equipment and it should have such an organizational structure that would facilitate undertaking interventions in emergency situations including but not limited to the following:

- an air accident in the airport operations area,
- an air accident outside the airport operations area,
- if there is a reasonable threat that an air accident would happen in the airport operations area,
- when the aircraft which happened to be within the airport operations area was damaged or a technical failure took place.

The airport administration must assure:

- airport rescue and firefighting vehicles in compliance with required parameters,
- emergency equipment which should be transported on rescue and firefighting vehicles.

International requirements for assurance of safety standards of airport operations determine the manner of organization and kinds of processes which must be implemented by the AFS to carry out its mission. These units in general are organized like the National Fire Service units. There are three main areas of activity:

- basic, i.e. operating activities,
- support, i.e. activities assuring the technical efficiency of vehicles and rescue equipment,
- strategic, i.e. activities aimed at the development of a unit and provision of preventive activities on the airport premises.

The volume of air traffic on the aerodrome and types of airplanes performing flight operations determine the number of the ADS staff and the quantity of equipment on each airport. However, the structural organization and performance of tasks are convergent, and consequently, competences required from the command cadre and other personnel are almost identical for most civil airports. The structure of the command cadre with their basic tasks is shown in Fig. 1 below.

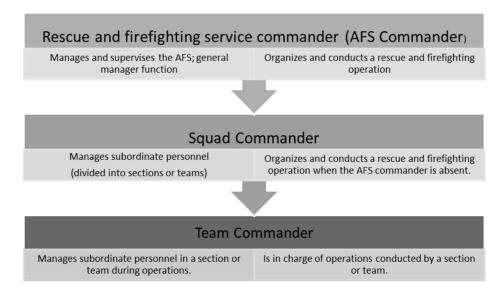


Fig. 1. The structure of the command cadre of the Airport Fire Service. *Source: author.*

The above figure shows the reporting hierarchy in the AFS. The specific nature of the AFS mission and accordingly, a double nature of the human resource management requires that a flexible management system should be used by the command cadre to manage the subordinate staff. In the AFS activity two modes of operations can be distinguished:

- usual during the so called everyday work, normal activities like in every organization, described by processes as shown in Fig. 2 and
- alarm during emergency situations such as fires, disasters, other rescue and firefighting incidents where a unit is involved.

According to the AFS operating mode there will be a different approach to the manner of giving instructions. In the usual mode instructions are given to the staff in the standard manner like in every organization. A significant difference appears during rescue and firefighting activities and manoeuvres. In this case instructions are given as an order and feedback information is a report. The situation is the same as in the army during war operations. This form of communication requires a great discipline and the acceptance of a strict power structure in respect of the functions of the organization and a reporting hierarchy of the staff. The above management style and the communication procedure determines competences of the command cadre on particular levels of the official hierarchy. In the European Union key competences include knowledge, skills, abilities, attitudes, motivation, values, personality. Taking into account the

extensive nature of these problems only knowledge and skills are discussed in this paper. Fig 2 shows minimal requirements, which should be met by candidates for particular levels of the commanding staff in AFS.

Team (Section) **AFS Commander Squad Commander** Commander • Higher education Higher education Secondary education • Fire Engineering • Fire Engineering University University • Noncommissioned • Post-graduate Specialist training officer's course courses in in airport rescue **Economic Sciences** Fire officer school Specialist training Specialist training in airport rescue in airport rescue

Fig. 2. Educational requirements for the command cadre of the Airport Fire Service *Source: author.*

Specialist training in airport rescue consists of theoretical and practical instructions and it is provided once every 3 years. Practical instructions should be given on:

- training positions,
- training yards of exercises,
- a firefighting training ground / area,
- airport infrastructure objects.

Instructions can only be given by authorized personnel:

- specialists in aviation fire engineering, protection and prevention,
- National Fire Service officials,
- aircraft construction and exploitation specialists,
- and other aviation and rescue specialists.

The training is completed when a learner passes a theoretical and practical examination comprising modules which are the subject of the training. In addition to the training on the AFS premises the administrator is obliged to organize an in-service training system for AFS employees. This kind of training will include as follows:

- operational preparation of the airport including its topography,
- aircraft construction,
- personal safety of the rescue staff,
- communications, alarm, cooperation and commanding system,

- construction and exploitation of airport rescue equipment and vehicles,
- fire extinguishing media and tactics of its use,
- tactics of rescue activities,
- procedure for dealing with hazardous materials,
- provision of aid to victims under outpatient conditions,
- cooperation of airport services with external entities during rescue activities in the airport operations area.

Upon completion of the specialist training AFS rescuers gain knowledge of the following:

- obligatory rules during takeoff and landing operations of the aircraft, airport surface traffic of vehicles.
- directions of landings and takeoffs of aircraft, taxiways, rapid exit taxiways, final approach and takeoff area,
- rules of safe and quick access to the place of an air accident or incident,
- construction of fixed wing aircraft and a helicopter with special regard to the distribution of hazardous materials, ways and possibilities of evacuation of passengers and crews,
- fire prevention and counteractions to other hazards occurring on the airport premises,
- construction, tactical and technical parameters, operating and usage instructions regarding the equipment supplied for AFS,
- fire extinguishing media and neutralizers and instructions of their usage,
- functions and rules of commanding a squad, team and section,
- combustion process and fire spreading mechanisms in aircraft,
- fire extinguishing methods and procedure for aircraft and other airport facilities.
- tactics of rescue activities during various events and under various weather and field conditions,
- organization of the command and control communication system and cooperation,
- procedure for dealing with hazardous materials,
- provision of aid to victims of accidents and incidents under outpatient conditions,
- occupational safety and health in fire lookout towers, during theoretical and practical instructions, manoeuvres and rescue activities.

The training is deemed to be effective when rescuers who have completed it successfully have the following skills:

- proper handling of the equipment used by AFS,
- optimum utilization of technical and operating parameters of the equipment,
- conducting reconnaissance under various conditions and during various events,
- · commanding a squad, team and section,

- organization and use of the command and control communication system and cooperation,
- organization and conducting evacuation and rescuing people and property during aviation accidents and incidents,
- giving operation orders,
- correct reporting on the development of the situation and the course of rescue activities,
- effective selection of fire extinguishing media and correct use of fire extinguishing streams,
- proper calculation of forces and requisite resources to conduct a rescue and firefighting operation,
- in-service training of the subordinate staff,
- ability to assess the technical condition of the equipment given for use,
- provision of first aid to victims under outpatient conditions,
- use of rules of occupational safety and health in fire lookout towers, during theoretical and practical instructions, manoeuvres and rescue activities,
- fire extinguishing tactics for airport facilities,
- assessment of possible fire development,
- efficient conduct of technical, chemical and ecological rescue operations.

The requirements regarding the basic (statutory) function of the AFS in the field of safety assurance on the airport are presented below. Taking into account that an AFS unit is an airport organizational unit it has a number of other duties set forth in the Organizational Regulations of every airport which have an indirect effect on the safety of flight operations on the airport. Fig. 3 shows a diagram of connections between AFS processes with the areas of airport operations.

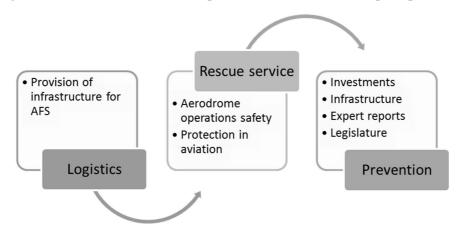


Fig. 3. Airport Fire Service processes *Source: author.*

In the AFS the following three basic processes can be identified:

- 1. Rescue service the main process which underlies AFS operations and results from the statutes of the airport, is an international requirement for every airport; in Poland it is provided by the AFS as units in the organizational structure of an airport.
- 2. Prevention the main process, which takes place in the AFS according to the Organizational Regulations of any airport, can be provided by external institutions and organizations e.g. the National Fire Service.
- 3. Logistics the supporting process aimed at assuring the efficiency of rescue equipment can be provided by external institutions and organizations.

Legal requirements establish strict standards for the AFS in the area of rescue as described above. In other areas of airport operations which are protected within the framework of the implementation of Prevention and Logistics processes the definite requirements are set forth partly in national general regulations (e.g. The Building Law), partly in airport specific standards, i.e. procedures, instructions, plans and programmes of a given airport.

Within the framework of airport operations the airport management authorities require from the AFS command cadre a lot of additional activities affecting safety, however rescue is always the priority. Activities conducted as tasks of the command cadre also include as follows:

- Coordinating development and application of the Airport Rescue Operations Plan.
- Requesting for the suspension of works in airport facilities in case of a fire risk.
- Participation in the civil defence preparation,
- Participation in fire and accident investigations; analysis of causes and circumstances of fires on the airport premises,
- Inspection of airport facilities in respect of compliance with firefighting regulations and orders of the airport management authorities,
- Organization and conducting of airport manoeuvres with the participation of all interested services of the airport and external organizations described in the Airport Rescue Operations Plan and trainings checking the organization and conditions of evacuation in facilities.
- Hot work precautions where hazardous works are carried out on the airport premises,
- Removal and neutralization of fuel leaks and other petroleum derivative substances causing a fire risk,
- Providing assistance in refuelling of airplanes with passengers on board,
- Providing first medical aid to victims at the place of occurrence of an accident or incident until they are taken by medical staff members of health care units,

- Supervision over the correct performance of operations and maintenance of fire equipment installed on the airport ground premises,
- Providing fire safety training to the airport service staff,
- Development of drafts of internal rules, regulations, procedures and instructions regarding airport rescue services,
- Giving opinions on each stage of the design documentation with regard to investments, modernizations and repairs in terms of fire safety,
- Participation in the final site acceptance test of facilities upon completion of investment and repair processes with regard to fire safety.
- Preparing opinions and expert reports on airport rescue services,
- Coordinating works at the development of programs and plans regarding fire safety.

6. Conclusions

International guidelines and national regulations set forth the basic area of AFS operations. i.e. today an airport employee who represents the AFS command cadre should have a very broad knowledge. Although legal requirements emphasize the operating preparation to perform the function of an airport rescuer, they do not provide for standard requirements in everyday work of a unit. As it was described above, AFS operations take place both in the usual mode and in the alarm mode. Therefore, operations of rescuers are different. Specialist instructions concentrate on the proper performance of duties by a rescuer, i.e. the performance of statutory obligations of an airport. In practice, the problem of performance of a managerial role by members of the command cadre is disregarded. Training in personnel management is provided as part of general instructions for workers and airport management staff. Such training sessions are generally useful, however during instructions no attention is paid to the specific nature of work in a uniformed unit where part of operations is based on an order. This results in considerable differences in the manner of communication both in the vertical structure and the horizontal structure of particular commanding levels. Within a second a friend rescuer becomes a commander who does not discuss any matters but gives an order and demands absolute obedience and execution. Such situations can give rise to instinct objections or even become the cause of conflicts. Therefore, in the case of the command cadre, in addition to knowledge, education, decision making skills, experience and other skills, the possession of suitable psychological features will be useful. Selfconfidence and the ability to assume responsibility and good communication skills will certainly be required. The present programmes of specialist training focus mainly on the communication during incidents, its form and

- flow of information. The stress on communication as a complex process intended not only to give orders and instructions but also to build relations among people, in particular confidence and respect underlying cooperation as the AFS operations concept is insufficient.
- 2. Another problem which should be included in specialist training because it affects safety on the airport is a good knowledge of English as the international communication language in aviation and improvement of English language skills. Once every three years the members of the AFS command cadre participate in training in airport rescue in the International Fire Training Centre at Teesside in Great Britain or in the Airport Rescue Training Centre at Leipzig. Courses are held in English and they refer to:
 - Training for firemen
 - Training for the command cadre and
 - Training for instructors teaching in rescue units.
- 3. A problem regarding the improvement of the competence of the AFS command cadre may refer to the scope of specialist instruction which was in detail set forth in the Minister of Infrastructure Regulation of 12 September 2005 on the preparation of airports to emergency situations and airport rescue and firefighting services. The Regulation provides for a detailed syllabus including total obligatory hours of theoretical and practical instruction as well as topics and modules with a range of knowledge they should contain. This is the reason why the training programme is inflexible and it is impossible to introduce and discuss any additional issues which arise instantly. It would be more useful to provide general guidelines and training framework whereas any details would be approved on a yearly basis, for example, by the airport administration in accordance with the opinion given by the Chief Fire Officer of the Fire Brigade.

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