

Plan of the general introductory training in occupational safety and health

Accident and occupational disease risks

Fall of the worker at the same level due to slippery surfaces;

Fall of the worker from an elevated level;

Fall or collapse of materials and objects from the conveyer belts;

Get caught, be hit or be crushed by machines or working equipments, due to the lack of attention or wrong positioning of the executants towards these;

Get caught, be hit or be crushed by the means of transportation for workers;

Get caught, be hit or be crushed by the objects and materials carried;

Come into contact with electrical current (touching directly the installation for electric supply or indirectly the segments stripped of isolation or damaged of the belts.

LAWS ON OCCUPATIONAL SAFETY AND HEALTH

Law on occupational safety and health (Law 319/2006)

Article 5. For the purpose of this law, the following terms and expressions have the following meaning:

- a) worker – person employed by an employer, according to the law, including students, pupils during their traineeships, as well as apprentices and others participants in the work process, with the exception of persons undertaking domestic activities;
- b) employer – natural or legal person having a working or service relationship with the worker and having the responsibility for the enterprise and/or the establishment;
- c) other participants in the working process: persons that are in the enterprise and/or establishment, with the employer's permission, during the preliminary period of verification of professional skills in order to be employed, persons carrying out activities for the benefit of the community or volunteering, as well as unemployed persons during their participation to a form of professional training, and persons who do not have an individual labour contract concluded in a written form for which contractual provisions and services rendered can be proven through any other means of evidence;
- d) workers' representative with specific responsibility for the safety and health of workers – person elected, selected or designated by the workers, according to the legal provisions, to represent them on issues related the safety and health protection of workers at the workplace;
- e) prevention – the entirety of provisions established and measures taken or foreseen in all the stages of the work process, in order to avoid or reduce occupational risks;
- f) event – accident having caused death or body injuries, occurred during the work process or whilst complying with the occupational duties, the case of a person reported as missing or a transport or road traffic accident, if employed persons were involved, dangerous incidents, as well as the case susceptible of occupational or work-related disease;
- g) work accident – a violent injury of the organism, as well as occupational acute intoxication, occurring during the work process or whilst complying with the occupational duties and which leads to a temporary incapacity to work of at least three calendar days, invalidity or death;
- h) occupational disease – impairment occurring as a consequence of practicing a trade or an occupation, caused by physical, chemical or biological harmful agents specific to a workplace, as well as by overstressing the various organs or body systems during the work process;
- i) work equipment – any machine, apparatus, tool or installation used at work;
- j) personal protective equipment – any equipment designed to be worn or used by a worker to protect him/her against one or several hazards likely to endanger his/her safety and health in the workplace, as well as any supplement or accessory designed to meet this objective;
- k) workplace – place intended to house workstations, located in the buildings of the enterprise and/or establishment, including any other place within the area of the enterprise and/or establishment to which a worker has access during his/her activity;

- l) serious and imminent danger of accident – the concrete, real and present situation for which only the trigger is missing to produce an accident at any moment;
- m) traineeship – the training of an applicative nature, specific to the trade or to the specialty for which pupils, students, apprentices, as well as unemployed persons during the occupational reconversion period are trained;
- n) occupational safety and health – the entirety of institutionalised activities aimed at ensuring the best conditions for carrying out the work process, life protection, physical and psychical integrity, health of the workers and of the other persons participating in the work process;
- o) dangerous incident – the identifiable event, such as the explosion, fire, damage, technical accident, major emissions of harmful substances, resulted from a malfunctioning of an activity or of a work equipment or/and from inadequate human conduct that had no effect upon the workers, but might have had such consequences and/or caused or might have caused material damages;
- p) external services – legal or natural persons from outside the enterprise/establishment, authorised to carry out protective and preventive services in the field of occupational safety and health, according to the law;
- q) light accident – event having as a consequence superficial injuries which require only first aid treatment and determined an incapacity to work of less than 3 days;
- r) work-related disease – the disease caused by multiple factors, to which some of the determining factors are of an occupational nature;

Article 16. (1) Taking into account the size of the enterprise and/or establishment, the employer must take the appropriate measures so that workers and/or their representatives receive, in accordance with the legal provisions all the necessary information concerning:

- a) the occupational safety and health risks, as well as the protective and preventive measures and activities at the level of enterprise and/or establishment in general, as well as at the level of each workstation and/or each job;
- b) the measures taken pursuant to article 10(2) and (3).

(2) The employer must take appropriate measures so that the employers of workers from any outside enterprise and/or establishment undertaking activities in his enterprise and/or establishment receive adequate information regarding the issues referred to in paragraph (1), which pertain to these workers.

Article 22. Each worker must perform the activity according to his/her training, as well as the instructions received from the employer, so that he/she does not expose himself/herself or other persons which may be affected by his/her actions or negligence to an accident or occupational disease.

Article 23. (1) In particular, in order to achieve the objectives referred to in Article 22, workers have the following obligations:

- a) to use correctly the machinery, apparatus, tools, dangerous substances, transport equipment and other means of production;
- b) to use correctly the personal protective equipment supplied to them and, after use, to return it or place it in the designated space for safe-keeping;
- c) to refrain from disconnecting, modifying, changing or removing arbitrarily its own safety devices fitted, in particular to machinery, apparatus, tools, technical installations and buildings, and use such devices correctly;
- d) to inform immediately the employer and/or the designated workers of any work situation they have reasonable grounds for considering it represents a danger to safety and health of the workers, as well as any shortcomings of the protection systems;
- e) to inform the workstation chief and/or the employer of the accidents he/she had;
- f) to cooperate with the employer and/or the designated workers, for as long as it may be necessary, to allow the carrying out of any measures or requirements imposed by the labour inspectors and the sanitary inspectors to protect the safety and health of the workers;
- g) to cooperate for as long as it may be necessary with the employer and/or the designated workers to allow the employer to ensure that the working environment and working conditions are safe and pose no risk to safety and health within the field of activity;
- h) to learn and respect the provisions of the law in field of occupational safety and health and the their measures of enforcement;
- i) to give the information required by the labour inspectors and the sanitary inspectors.

(2) The obligations stipulated in article 1 will be applied, as the case may be, to the other participants in the work process as well, according to the activities they carry out.

Article 56. The workers representatives with specific responsibility for occupational safety and health are consulted and take part, pursuant article 18 of the law, and can carry out the following activities:

- a) to work with the employer for improving the occupational safety and health conditions;
- b) to accompany the team/person performing the risk assessment;
- c) to help the workers understand the need of applying occupational safety and health measures;
- d) to inform the employer or the occupational safety and health committee about the suggestions of the workers regarding the improvement of the working conditions;
- e) to keep close watch on the enforcement of the measures from the prevention and protection plan;
- f) to inform the competent authorities about the non-compliance with the legal provisions in the field of occupational safety and health;

Labour Code (Law 53/2003)

Article 257. The internal rules and regulations are drawn up by the employer, after consulting the trade union or the employees' representatives, as the case may be.

Article 258. The internal regulations comprise at least the following categories of provisions:

- a) rules on labour protection, hygiene, and safety within the establishment;
- b) rules on the observance of the principle of non-discrimination and removal of all forms of dignity violation;
- c) rights and obligations of the employer and of the employees;
- d) the procedure for solving the employees' individual requests or complaints;
- e) actual rules on labour discipline in the establishment;
- f) infringements of discipline and applicable sanctions;
- g) rules concerning the disciplinary procedure;
- h) modalities for implementing other particular provisions of the law or of the contract.

Article 259. (1) The internal rules and regulations are brought to the attention of the employees through the good offices of the employer and produce its effects on the employees from the time of such notification.

(2) The obligation of informing the employees about the contents of the internal rules and regulations must be fulfilled by the employer.

(3) The actual manner in which each employee is informed about the contents of the internal rules and regulations is stipulated in the collective labour contract or, as the case may be, in the contents of the internal rules and regulations.

(4) The internal rules and regulations will be displayed at the employer's head office.

Article 260. Any amendment in the contents of the internal rules and regulations is subject to the notification procedures stipulated in article 259.

Article 261. (1) Any interested employee can notify the employer about the provisions of the internal rules and regulations as long as he/she can prove the violation of one of his/her rights.

(2) The control of the lawfulness of the provisions of the internal rules and regulations is in the jurisdiction of the courts of law, which can be notified within 30 days from the date of the employer's answer of the solution to the notification filed under paragraph (1).

Disciplinary liability

Article 263. (1) The employer has a disciplinary prerogative, being entitled to apply, according to the law, disciplinary sanctions to his employees whenever he finds they have committed an infringement of discipline.

(2) An infringement of discipline is a deed related to work, which consists of an action or non-action guiltily performed by an employee, who has thus violated the provisions of the law, the internal rules and regulations, the individual labour contract or the applicable individual labour contract, the lawful orders and decisions of his/her superiors.

Government Decision 1091/2006: Annex no. 2

Minimum health and safety requirements for workplaces already in use

Preliminary note

1. The obligations laid down in this Annex apply wherever the characteristics of the workplace, activity, circumstances or hazard require it.

2. Stability and solidity

Buildings which have workplaces must have a structure and solidity appropriate to the nature of their use.

3. Electrical installations

Electrical installations must be designed and constructed so as not to present a fire or explosion hazard; workers must be adequately protected against the risk of accidents caused by direct or indirect contact.

Electrical installations and protection devices must be appropriate to the nominal voltage, external conditions and to the competence of persons with access to parts of the installation.

4. Emergency routes and exits

4.1. Emergency routes and exits must remain at all time clear and lead as directly as possible to open air or to safe areas.

4.2. In case of danger, it must be possible for workers to evacuate all work-stations as quickly and as safely as possible.

4.3. There must be an adequate number of escape routes and emergency exits.

4.4. Emergency exit doors must open outwards.

Sliding or revolving doors are not permitted if they are intended as emergency exits.

Emergency doors should not be locked or fastened in such a way that they cannot be easily and immediately opened by any worker who may need to use them in an emergency.

4.5. Specific emergency routes and exits must be indicated by signs in accordance with the Government Decision 971/2006 provisions.

Such signs must be made to last and be placed at appropriate points.

4.6. Emergency doors should not be so locked.

The emergency routes and exits, as well as the traffic routes and doors giving access to them, must be free from any obstruction, so that they can be used at any time without hindrance.

4.7. Emergency routes and exits requiring illumination must be provided with safety/emergency lighting of adequate intensity in case the power supply fails.

5. Fire detection and fire fighting

5.1. Depending on the dimensions and destination of the buildings, on the equipment they contain, the physical and chemical characteristics of the substances present and the maximum potential number of persons present, workplaces must be equipped with appropriate fire extinction devices, and if necessary, fire detectors and alarm systems.

5.2. Non-automatic fire extinction devices must be easily accessible and simple to use.

These devices must be indicated by signs in accordance with Government Decision 971/2006 provisions.

These signs must be strong enough and be placed in the appropriate emplacements.

6. Ventilation of enclosed workplaces

Measures must be taken to ensure that there is sufficient fresh air in enclosed workplaces, considering the working methods used and the physical demands imposed to the workers.

If a forced ventilation system is used, it must be maintained in working order.

Any malfunctioning must be indicated by a control system, if this is necessary for the health of the workers.

7. Room temperature

7.1. During working hours, the temperature in rooms containing workplaces must be adequate for the human body, taking into account the working methods used and the physical demands imposed to the workers.

7.2. The temperature in rest areas, rooms for duty staff, sanitary facilities, canteens and first aid rooms must be appropriate to the particular purpose of such areas.

8. Natural and artificial lighting

8.1. When possible, workplaces must receive sufficient natural light and be equipped with proper artificial lighting to ensure the safety and health of the workers.

8.2. Workplaces in which workers are especially exposed to risks if the artificial lighting system fails must be provided with safety/emergency lighting of adequate intensity.

9. Doors and gates

9.1. Transparent doors must be marked accordingly, at eye level.

9.2. Swing doors and gates must be transparent or have see-through panels.

10. Danger areas

If the workplaces include danger areas in which, due to the nature of the activity, there is a risk for the worker or for objects to fall, these areas must be equipped, as far as possible, with devices preventing unauthorized workers from entering those spaces.

Appropriate measures must be taken to protect the workers authorized to enter danger areas.

Danger areas must be clearly indicated.

11. Resting rooms and resting areas

11.1. If the safety or health of the workers, in particular due of the type of activity carried out or the presence of more than the foreseen number of employees, so require, workers must be provided with easily accessible resting rooms or appropriate resting areas.

This provision does not apply if the workers are employed in offices or similar work-rooms providing equivalent relaxation possibilities during breaks.

11.2. Resting rooms and resting areas must be equipped with tables and chairs with back rests.

11.3. In resting rooms and resting areas appropriate measures must be taken for the protection of non-smokers against the discomfort caused by tobacco smoke.

12. Pregnant women and nursing mothers

Pregnant women and nursing mothers must be given the possibility to lie down to rest in appropriate conditions.

13. Sanitary equipment

13.1. Changing rooms and lockers

13.1.1. Appropriate changing rooms must be provided for workers if they have to wear special work clothes and where, for health or propriety reasons, they cannot be expected to change in another room.

Changing rooms must be easily accessible and of sufficient capacity.

13.1.2. Changing rooms must have facilities which enable each worker to lock away his own clothes during working hours.

If circumstances so require (e.g. dangerous substances, humidity, dirt), lockers for work clothes must be separate from those for his own clothes and personal effects.

13.1.3. There must be separate changing rooms or a separate use of changing rooms for men and women.

13.2. Showers, toilets and washbasins

13.2.1. Workplaces must be fitted out in such a way that workers have in their vicinity:

- showers, if required by the nature of their work;
- special facilities equipped with an adequate number of toilets and washbasins.

13.2.2. The showers and washbasins must have cold running water (as well as hot water if necessary).

13.2.3. Provision must be made for separate showers or separate use of showers for men and women.

Provision must be made for separate toilets or separate use of toilets for men and women.

14. First aid equipment

Workplaces must be fitted with first aid equipment.

The equipment must be suitably marked and easily accessible.

15. Workers with disabilities

Workplaces must be organized to take into account the workers with disabilities, if necessary.

This provision applies in particular to the doors, passageways, staircases, showers, washbasins, toilets and workstations used or occupied directly by workers with disabilities.

16. Movement of pedestrians and vehicles

Indoor and outdoor workplaces must be organized in such a way that pedestrians and vehicles can circulate in a safe manner.

17. Outdoor workplaces (special provisions)

When workers are employed at outdoor workstations, such workstations must as far as possible be organized so that workers:

- a) are protected against bad weather conditions and if necessary, against falling objects;
- b) are not exposed to harmful noise levels, nor to harmful external influences, such as gases, vapours or dust;
- (c) are able to leave their workstations quickly in the event of danger or can rapidly receive assistance;
- (d) cannot slip or fall.

18. Secluded workplaces (special provisions)

18.1. The employee will nominate a person with clear attributions who will supervise the workers who are working in secluded places, though an official decision.

18.2. To be able to intervene in an adequate time period in case of accident or failure at secluded workplaces, these will be equipped with technical means permitting through connection with the person supervising the workers, as follows:

- a) constantly and automatically (supervising central, radio wave alarm devices);
- b) periodically and automatically (phone-radio, phone);
- c) periodically through an intermediary person (phone calls, phone-radio, video-camera and monitor).

19. Ergonomic principles

19.1. The sizing of the workplace is to be done according to the anatomical, physiological and psychological characteristics of the human body, as well as to the size and characteristics of the work equipment, work furniture, movements and circulation of the worker during his/her activity, the safety distances, the auxiliary devices for materials manipulation, as well as considering the need for ensuring the psycho-physical comfort of the worker.

19.2. The elimination of strained, unnatural body positions of the worker, ensuring the existence of body position changing possibilities while at work, is done through the organisation of the workplace by optimising the technological flow and by using work equipments in conformity with the regulations in force.

19.3. The workplaces where the work is performed in a sitting position are to be provided with chairs designed according to the functional and anthropometrical parameters of the human body as well as the activity taking place, correlating the height of the chair with the height of the working area.

19.4. At the workplaces where the work is performed in orthostatic position, measures must be taken to ensure, at least for a short period of time that the workers can sit down (e.g. chairs, benches).

19.5. Work equipments, tables and workbenches must assure enough space for a stable and comfortable support of the lower limbs during the activity, as well as the possibility of moving them.

19.6. The height of the working area for the sitting or orthostatic position of the worker is established according to the optimal distance for eye contact, the precision of the work, the anthropometrical characteristics of the worker and the level of effort for the upper limbs.

19.7. To avoid the rotation and bending movements of the body, as well as the extended movements of the arms, measures must be taken for the proper organisation of the technological flow, for correctly handling the raw materials and products towards the working equipments used directly by the worker.

Government Decision 1048/2006. Annex no. 3

Non-exhaustive guide list of activities and sectors of activity which may require the use of personal protective equipment

1. Head protection (skull protection)

Protective helmets:

- Building work, particularly work on, underneath or in the vicinity of scaffolding and elevated workplaces, erection and stripping of formwork, assembly and installation work, work on scaffolding and demolition work;
- Work in trenches;
- Earth and rock works;
- Work in quarries, open diggings, stock-piles;
- Work in the vicinity of lifting gear, cranes and conveyors;
- Work at direct reduction plants;
- Work at silos, bunkers and pipelines;

2. Foot protection

Safety shoes with puncture-proof soles:

- Carcase work, foundation work and roadwork;
- Scaffolding work;
- Demolition work;

- Work with concrete and prefabricated parts involving formwork erection and stripping;
- Work on project sites and warehouses;
- Roof work;
- Work with furnaces, direct reduction plants, steelworks, rolling mills, metalwork, forging, drop forging, hot pressing and drawing plants;
- Work in quarries, open diggings and stock-piles;

Safety shoes with heels or wedges and pierce-proof soles:

- Roof work.

3. Eye or face protection

Protective goggles face shields or screens:

- Welding, grinding and separating work;
- Drilling works;

4. Respiratory protection

Respirators/breathing apparatus:

- Spray painting where dedusting is inadequate.

5. Hearing protection

Ear protectors:

- Work in places where the noise level is above the accepted limit;
- Work with metal presses;
- Work with pneumatic drills;
- The work of ground staff at airports;
- Pile-driving work;
- Wood and textile working.

6. Body, arm and hand protection

Protective clothing:

- Work with acids and caustic solutions, disinfectants and corrosive cleaning substances;

Fire-resistant protective clothing:

- Welding in restricted areas;

Leather aprons:

- Welding;

Gloves:

- Welding;
- Handling of sharp-edged objects, other than machines where there is a danger of the glove's being caught;

7. Weatherproof clothing

- Work in the open air in rain and cold weather.

8. Reflective clothing

- Work in places where the workers must be clearly and easily seen.

9. Safety harnesses

- Work on scaffolding;
- Assembly of prefabricated parts;
- Work on masts.

Government Decision 971/2006: Annex no. 1

MINIMAL GENERAL REQUIREMENTS

concerning safety and/or health signalization at work

1. Preliminary remarks

1.1. Where health and/or safety signalization is necessary, according to the general requirements mentioned in art. 6, this must comply with specific requirements in annexes mentioned in annex no. 2-9 of present decision.

1.2. This Annex introduces specific requirements concerning safety and/or health signalization, describes various uses and establishes the general rules on the interchanging and combining of signs.

1.3. Health and/or safety signs must be used only to convey the message or information specified by the present decision.

2. Signalization modalities

2.1. Permanent signalization

2.1.1. Signalization referring to prohibitions, warnings and mandatory requirements, as well as location and identification of emergency escape routes and first-aid facilities must consist of permanent signboards. Signboards and/or a safety colour must be used to mark permanently the location and identification of fire-fighting equipment.

2.1.2. Signalization on containers and pipes must be placed according to annex 3 provisions.

2.1.3. Places where there is a risk of colliding with obstacles or of falling must be permanently marked with a safety colour and/or with signboards.

2.1.4. Traffic routes must be permanently marked with a safety colour.

2.2. Occasional signalization

2.2.1. Whenever circumstances demand, illuminated signs, acoustic signals and/or verbal communication must be used where the occasion requires, taking into account the possibilities for interchanging and combining signs set out at point 3, to notice danger, to call persons to take a specific course of action and for the emergency evacuation of persons.

2.2.2. Guiding the persons carrying out hazardous or dangerous manoeuvres must be done, where the occasion requires, by hand signals and/or verbal communication.

3. Interchanging and combining in signalization

3.1. When equally effective, one may choose among the following:

- a) a safety colour or a signboard to mark places where there is an obstacle or an unevenness;
- b) illuminated signs, acoustic signals or verbal communication;

c) hand signals or verbal communication.

3.2. Some signalization modalities may be used together:

a) illuminated signs and acoustic signals;

b) illuminated signs and verbal communication;

c) hand signals and verbal communication.

4. The instructions in the table below apply to all signs incorporating a safety colour:

Colour	Meaning or purpose	Instructions and information
Red	Prohibition sign	Dangerous behaviour
	Danger alarm	Stop, shutdown, emergency cut-out devices Evacuate
	Fire-fighting equipment	Identification and location
Yellow or Amber	Warning sign	Be careful, take precautions Examine
Blue	Mandatory sign	Specific behaviour or action Wear personal protective equipment
Green	Emergency escape, first aid sign	Doors, exits, routes, equipments, workplaces, facilities
	No danger	Return to normal

POSSIBLE CONSEQUENCES OF NOT KNOWING OR BREAKING THE OCCUPATIONAL HEALTH AND SAFETY LAW

Work accidents affect in a negative manner all the elements of the work system – **the person doing the work, the task, the resources and the work environment.**

Consequences on the person doing the work. In the context of the work process, the man or woman can be seen from two perspectives: as a human being and as a person completing a task. A series of specific values and characteristics is associated to each perspective, such as: life, health, ability to create, respectively the work capacity, skills and knowledge.

Work accidents have an impact over both sets of values: psycho-physiological, economical, financial, etc.

Consequences on the task. The direct consequence is the not completion of the task or the not completion of the task before the deadline.

Consequences on the resources. After work accidents, in particular, both the resources and the products of the work can be damaged or destroyed (in case of explosions, fire, etc.).

Consequences on the work environment. Both the physical and the social environments can be affected by the occurrence of work accidents. The physical environment suffers in the form of damaged material elements, while the social environment suffers due to the stress caused to the persons from workstations close to the one of the victim, with all the specific symptoms.

Another criterion of classification – **the level at which they appear** – distributes the consequences of work accidents in:

a) **consequences at individual level**, that is:

a.1. at the level of the victim – physical pain caused by the aggression endured, temporary or permanent work incapacity, loss of confidence in his/her ability to react properly to tasks given, income reduction, etc.

a.2. at the level of people close to the victim – pain, anguish, stress, reduction of family income, etc.

b) consequences at employer level (micro-economic)

b.1. losses in production, loss of the potential capacity of production, damages and destruction of means of production, financial loss caused by investing again in the work force and machinery, degradation of the social working environment, etc.

c) consequences at society level (macroeconomic)

c.1. expenditures with social insurance, medical insurance, reduction of creativity.

FIRST AID, FIRE EXTINCTION AND WORKER EVACUATION MEASURES AT THE LEVEL OF THE ESTABLISHMENT

The accident hazards for workers in this workplace can cause wounds, fractures, electrocutions and burns.

FIRST AID

A. In case of haemorrhage (wounds)

Haemorrhage is the name given to the loss of blood from blood vessels when their walls' integrity was affected.

Depending on the blood vessel damaged, we can differentiate between arterial, venous, capillary and mixed haemorrhage.

In case of external haemorrhage, the blood flows in the external environment. In case of internal haemorrhage, the blood flows into body cavities. Arterial haemorrhage is characterised by bright red blood, pulsating according to the rhythm of the heart beat. Venous haemorrhage – the blood is dark red, slowly flowing, without signs of stopping by itself. In case of haemorrhage from a main vein it is possible for it to pulsate according to the rhythm of breath. In case of capillary haemorrhage the blood is lost equally on the entire surface of the wound.

First-aid in case of haemorrhage depends of its type and consists in stopping it temporarily and transporting the afflicted to the nearest medical institution. In most cases the haemorrhage can be stopped with regular or compressive bandage. Tourniquet is used only in case of massive arterial haemorrhage, when blood loss can not be stopped by other means. In case of massive haemorrhage, to prevent the major loss of blood, before using the tourniquet or bandage it is necessary to immobilise the artery to the pre-established places of the skeleton where the pulse can be felt properly.

B. In case of fractures:

The patient will not be moved to a different location before the basic first-aid is provided: cardio-respiratory reanimation, stopping the haemorrhage, immobilisation for transportation, bandage of the wounds and the burns, administration of pain-killers.

The patients will not be transported before the triage (classification) of the afflicted is made, in order to establish the order – who, when and by which means will be evicted.

If there is chaos in the transportation phase, one may win a little, but most of the afflicted may loose their life by not getting to the hospital! It might seem simple and of little importance, but it has a major impact.

For the benefit of the patient, first-aid, transportation or embarking should be done by 3-4 or more rescue persons, while the triage should be done by a lower number of people – 1 or 2 specialists well-prepared in this field. The life and future of the afflicted depend on this.

Standard stretchers and shields (long boards) must be used for transport, and in case these lack or are insufficient, improvised stretchers. The most severely injured will be transported on standard stretchers (shields), while the less severe cases on the improvised ones! The improvised stretchers can be made from different materials: sticks, boards, winter or summer clothing, skis and ski sticks, large sheaths and other pieces of cloth, blankets, etc.

In some cases, for short distances, when extracted from crashed cars or pits, the injured person can be transported manually by 1 or 2 rescuers.

Moving the afflicted from the ground on a stretcher or shield, especially when fractures of the backbone, pelvis or larger bones are presumed (or exist with certainty), will be done only by 4-5 rescue persons (4 of them will move the patient and one will move the stretcher or shield or will coordinate the movements of the 4 co-workers).

It is extremely important to limit or avoid entirely the movements of the fractured area!

The position of the afflicted on the stretcher must spare him/her of pain and prevent possible complications, asphyxiation with vomit or gagging. In some cases the afflicted will be allowed to take the position most comfortable for him/her.

Patients with cerebral trauma will be transported with the head (or the whole body) on one side to avoid asphyxiation with vomit.

Patients with abdominal trauma will be transported with their face up and their knees bent.

Patients with back trauma will be transported lying on one side or lying on their belly with the face down – whichever is more comfortable.

Patients with thoracic trauma, pneumothorax, emphysema, broken ribs, will be transported in semi-sitting position, with a large stack of clothes or other items behind their back.

Patients with backbone or pelvis fractures will be transported on shields (boards), the stretcher being used only when no shield can be found.

C. In case of electrocution:

1. Immediately stop the electrical current affecting the victim!
2. If possible – use the switch. If no switches are nearby – the electrical wire must be taken off the victim with any dry non-metallic object (wood, plastic, rubber) or any metallic object if using rubber gloves to protect oneself.
3. If the contact with the electrical source is not through a wire – try to push the victim away from the electrical source by dragging the dry clothing of the victim or using the same non-metallic objects.
4. It is not allowed to touch the victim or the source of electricity with the bare hands.
5. It is not allowed to get near the victim, without the proper means of self-protection, in case of rain, mud or snow!
6. If the victim is exposed to a high voltage electrical current – the movement towards him/her will be done with small steps, by dragging the feet on the ground (it is possible for the rescuer to get electrocuted by a voltaic arc).
7. If the victim is at an elevated level – proper measures will be taken to avoid trauma in case of falling.

After freeing the victim of the source of electricity

1. Immediately check the breathing and heartbeat. If needed start immediately the reanimation. A characteristic of patients with electric trauma is the higher chance of survival, because the body is practically healthy, unaffected by acute illnesses. In these cases it is possible to prolong the time for reanimation to 45 minutes – 1 hour.
2. If breathing and heartbeat can be felt – the places of entry and exit of the electric current are to be examined (hands, legs, body) – where burns of different thicknesses and surfaces can exist. In case burn marks are found – the same procedure applies as in burns caused by flames, applying sterile bandages.
3. If needed, pain-killers, sedatives (valerian) and cardiac drugs (validol) will be administered.
4. First-aid in case of lightning strike trauma is the same as in electrocuting. The general condition of the victim is more serious, the breathing and heartbeat stopping more frequently.

Any person affected by an electric trauma needs to be admitted to the hospital to be kept under observation, whatever his/her condition may be, whether he/she accepts or refuses to be admitted – as there is a risk for sudden cardiac and respiratory arrest a certain time after the electric trauma!!!

D. In case of burns

a) *In burns caused by flames:*

1. Extinguish the flames immediately with water, snow, or by covering them with a blanket or coat, without covering the head, to avoid carbon dioxide intoxication and burns to the airways.
2. If possible, remove or cut burning clothes. One way to extinguish burning clothes is to lay the victim on the ground. It is not allowed to extinguish the flames with the bare hands, with the palms or running.

The burnt surface can be sprayed for 15-20 minutes with clean, cold water or can be covered with snow, to minimize the pain and prevent oedema.

3. On large burnt surfaces a sterile fascia is applied and the victim is admitted urgently at the hospital.
4. The victim will receive painkillers and sedatives (valerian).
5. The blisters formed will not be burst under any circumstances. No unguents, greases, oils, dairy products or other liquids will be applied over the burnt surface. No baking soda or starch will be dispersed over the burns. All these substances can do severe harm to the patient, infect the wound, and form a thick layer leading to the overheating of the affected area, aggravating the burns and their consequences. It is not allowed to use for burns iodine, potassium permanganate or other drugs with colorants. It is allowed only to sprinkle clean cold water and apply drugs specially created for burns (normally aerosol). In particular cases it is allowed to apply sterile napkins with a weak alcohol solution (up to 30°), which have a pain-killer and disinfectant effect.

b) *In burns caused by hot liquids*

1. The affected area is sprinkled with cold water and is submerged in cold water.
2. The clothing will not be taken off in the regular way. It is preferable to cut the clothing. The burnt surface is very sensitive, the skin and blisters are easily damageable.
3. No random substance is to be applied on the burns, because through the skin damaged by the burn the absorption of any substance will take place at a higher rate than through healthy skin. In this case allergies, intoxications and other undesirable effects can appear.

c) *In burns caused by chemical substances*

1. The clothing drenched in chemical substances will be removed or cut.
2. The affected surface will be thoroughly washed for 15-20 minutes under running water, until the specific smell of the substance disappears. The jet of water must be directed perpendicularly to the burnt surface and not alongside it, in such a way that the surface where water trickle along is as small as possible, to avoid the propagation of the burns.
3. In case of burns caused by sulphuric acid – the surface will not be washed with clean water, because that would lead easily to amplifying the burnt surface. The area will be washed with soap solution, solution of baking soda (1 tea spoon for 1 glass of water).
4. In case of burns caused by acids – after washing the area, over the surface of the burns napkins with alkaline solutions – of baking soda can be applied.
5. In case of burns caused by alkalis – after washing the area, over surface of the burns napkins with acid solutions – vinegar (1 to 1 with water), citric acid or natural lemon juice can be applied.
6. The neutralising solutions will not be applied before washing the area with water, because a strong chemical reaction can take place, leading to the aggravation of the burns.
7. In case of burns with caustic lime, dry tissue will be used to absorb the substance. The surface will not be washed with water, because when water and caustic lime come into contact a chemical reaction releasing large quantities of thermal energy takes place, which can lead to the aggravation of the burns. The washing of the area will be done after removing the caustic lime from the skin. After washing the area it is allowed to apply a thin layer of vegetal oil.

8. When tar gets on the skin – the mix will be cleaned using a pad drenched in gas, petroleum or petrol. In this case the techniques for fire-safety must be respected.

After any burns, irrespective of their thickness and surfaces, irrespective of the patient's condition, the victim must be examined by a doctor and follow all his/her directions!

It is recommended to train some workers within the company, which will be present most of the time at the workplace, to perform first-aid.

FIRE EXTINCTION AND STAFF EVACUATION

Fire extinction will be done according to the Plan of Action in Emergency Situations, and **the evacuation** of staff in cases of emergency (fire, flood, earthquake, etc.) will be done through the exit on Constructorilor Street, which is closest. To avoid trampling, the access way to the exit doors will be free and clean at all time and the gate will be checked periodically for the manual opening procedure in case of electrical failure.

INSTRUCTIONS FOR FIRE PREVENTION AND FIRE FIGHTING

IPSSM 90

1. The entire staff of the establishment is bound to know and apply the specific rules for fire prevention and fire fighting in the workplace.
2. The workplaces with a high fire or explosion hazard will be signalled distinctly, with specific signboards.
3. All workplaces with fire and explosion hazard will be fitted with the proper resources for fire detection and fire extinction.
4. The persons working in storage facilities, workshops, etc, fitted with interior fire hydrants and fire extinction materials should know where these are placed and how to use them.
5. The access ways will be kept perfectly clean, as it is forbidden to block them. The access ways to the intervention materials (hydrants, fire extinguishers, signboards for fire prevention and fire fighting, etc.) will be kept free at all time.
6. It is forbidden to make any type of improvisation or apply temporary solutions to the electric installations or to the installations using open fire.
7. It is forbidden to use or overcharge live conductors or bare wiring, as well as the use of faulty plugs or switches. Live electrical devices will not be placed near flammable materials. Oversized safety fuses will not be used.
8. Heating stoves or furnaces used for technological purposes will be fuelled with gas through circuits without any improvisations. Periodically the gas proofness of the circuits will be tested.
9. When installing or using gas driven devices and installations, all the obligations for receiving the agreements, permits and authorisations needed for modifying the gas installations will be strictly met. Only homologated devices and installations will be used and their installation will be done exclusively by workers authorised for this purpose.
10. It is forbidden to store in workshops, halls, storage facilities, offices, etc. easily flammable and combustible materials, such as rags, mineral oil, wood, gas cylinders, etc. which will not be used immediately or which are not strictly needed for one shift. These will be kept in specially designed areas. Flammable liquids will be kept only in special containers hermetically sealed.
11. When leaving the workplace, no open fire will be left unattended, no candles will be left lighted and the heating or electric devices will not be left plugged in.
12. In case of fire, the materials with which the workplace has been fitted will be used according to the instructions provided by the manufacturer for each type of fire-extinguisher: foam extinguisher, carbon dioxide extinguisher or powder and carbon dioxide extinguisher.
13. Based on the type and location of the fire, the following resources will be used:
 - for solid and liquid combustible materials (with the exception of calcium carbide, quick lime and other substances reacting violently to water) – foam extinguishers and water from hydrants will be used;
 - for electrical installations and substances which can not be extinguished with water and foam – power and carbon dioxide fire extinguishers will be used;
 - for electrical installations – carbon dioxide fire extinguishers will be used; It is forbidden to use water or foam fire extinguishers in this case.
14. It is strictly forbidden to use fire fighting materials for other purposes, to damage or to incorrectly maintain them.
15. When a fire which cannot be immediately extinguished using the existing materials breaks out, the fire-fighter brigade service will be called by dialling 112.
16. Periodically, along with the occupational health and safety training, the staff will be trained in fire prevention and fire fighting.

These rules are not limitative, the head of unit may further enhance and adjust them.

PREVENTION AND PROTECTION DIVISION