

		<b>No project:</b> 2004/RO/16/P/PA/003
<b>Health and Safety Plan</b>		
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>	<b>Pag. 1/25</b>

## Health and Safety Plan CONTENT

<b>1. INTRODUCTION</b>	
1.1. Location of construction site .....	3
1.2. List of addresses and telephone numbers of key organizations and individuals ...	5
1.3. The organization works site.....	6
1.4. Coordination and supervision of safety and health on site .....	6
1.5. Raporting.....	7
1.6. Personnel .....	7
1.7. Work program.....	7
1.8. Subcontracting works.....	7
<b>2. AREAS OF WORK</b> .....	7
2.1. Movements in the site.....	7
2.2. Residential areas on the site and social dependencies.....	8
2.3. Work places / areas with special protection for winter.....	8
2.4. Medical Cabinet.....	8
2.5. Electricity on site, site lighting.....	9
2.6. Radio communication.....	9
2.7. Regime, cleanliness and hygiene.....	9
<b>3. HEALTH AND SAFETY OF THE WORKS</b> .....	9
3.1. Safety at work on the construction site.....	9
3.1.1. Responsibilities.....	9
3.1.2. Instructions .....	10
3.1.3. Safety and protection equipment.....	10
3.1.4. Intoxicating agents.....	11
3.1.5. Work in areas of lines (wires) .....	11
3.1.6. Demolition works .....	12
3.2. Technical safety requirements.....	12
3.2.1. Construction machinery and equipment.....	12
3.2.2. Electric equipment.....	13
3.2.3. Cables and pipes.....	13
3.2.4. Excavation and reinforcing, reinforcing on the line longitudinală.....	13
3.2.5. Protection of areas of work at heights, scaffolding and excavations or other dangerous areas.....	14
3.2.6. Hazardous materials.....	14
<b>4. EDUCATION</b> .....	14
<b>5 FIRST AID AND REPORTING INCIDENT / ACCIDENT..</b> .....	16
<b>6 PROTECTION AGAINST FIRE AND EXPLOSIVE (IF)</b> .....	18
<b>7. ENVIRONMENTAL PROTECTION</b> .....	17
<b>8. IDENTIFICATION AND ASSESSMENT - TREATMENT RISKS</b> .....	18
<b>9. SAFETY AND HEALTH REGULATIONS FOR SITE</b> .....	19
<b>10. PERMIT</b> .....	21
<b>11. OTHER MEASURES</b> .....	24
<b>12. COORDINATION AND COMMUNICATION WITH CONTRACTORS</b> .....	24
<b>13. INSPECTIONS AND REPORTS</b> .....	24

		<b>No project:</b> 2004/RO/16/P/PA/003
<b>Health and Safety Plan</b>		
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>	Pag. 2/25

## ANNEX

- Annex 1 – List of important phone numbers
  - Annex 2 – Organization of site plan (developed separately by the contractor)
  - Annex 3 – Checklist safety and health site
  - Annex 4 – Measures to prevent falling into the empty
  - Annex 5 – Environmental Protocol (annex to the contract)
  - Annex 6 – Safety protocol (annex to the contract)
  - Annex 7 – Permit pass the site
  - Annex 8 – Permit lifting
  - Annex 9 – Permit to work with open fire
  - Annex 10 – Work permit in enclosed spaces
  - Annex 11 – Permit for execution of electrical works
  - Annex 12 – Minutes for meetings of Command
  - Annex 13 – Incident notification form
  - Annex 14 – Journal of site
  - Annex 15 – Utilities - facilities, waste disposal plan of organization
  - Annex 16 – Training agenda
  - Annex 17 – Identification System
  - Annex 18 – Alarm plan
  - Annex 19 – List risk of accidents at work and occupational disease.
  - Annex 20 – Method statement
  - Annex 21 – Prevention and protection plan OSH
  - Annex 22 – Auto and pedestrian traffic routes
  - Annex 23 – Note remedial activities
  - Annex 24 – Warning for violation of labor protection
  - Annex 25 - Risk identification and assessment of site
  - Annex 26 - Subcontractors convention on safety and health
  - Annex 27 – Risk inventory and evaluation
  - Annex 28 – Notions of first aid staff appointed
  - Annex 29 – Emergency evacuation plan and fire
- CONTENT Additional Annexes

		
<b>Health and Safety Plan</b>		<b>No project:</b> 2004/RO/16/P/PA/003
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H,</b> <b>SECTION: BRAȘOV - SIGHIȘOARA</b>	Pag. 3/25

## INTRODUCTION

### ABBREVIATIONS

(OSH) – Health and safety

**CMSSEPL)- Coordinators for safety and health during the project preparation stage**

(CMSSSL) - Coordinator Safety and Health during the implementation of the project

(EIP) - Personal protective equipment

(EIL)- Work equipment

(SSS) – Superior site manager

(AFER) - Romanian Railway Authority

(RMP) - Minimum risk possible

### *Preamble*

**Attention!** Health and safety plan must be kept by the project manager for five years from the date of final reception of the work.

Health and safety plan is a written document that includes all the measures to be taken to prevent risks that may arise during the activities on site.

Health and safety plan will define the basic information on specific requirements derived from the fact that the construction and implementation will be carried out under continuous rail traffic.

Health and safety plan contains rules of organization, coordination and supervision of a secure site and contains measures for safety work is mainly related to the coordination of all organizations and individuals involved in field work.

All contractors (including subcontractors) will inform / educate all staff on site on Health and safety plan. Fulfilling OSH Plan is a contractual issue. Registration signature is required of all staff will form a special document.

During the design work will be considered the major principles of health and safety for works to be executed.

### *The legal basis*

Security plan and health (OSH) is prepared in accordance with the provisions of GD no. 300/2006 on minimum safety and health requirements for temporary or mobile construction sites. Additional content will be adopted safety and health regulations of the European Union - Directive 92/57/EEC of 24 June 1992 on minimum safety and health requirements at temporary or mobile construction sites, modified by 2007/30/EC

### *OSH Policy*

OSH plan implement security policy and health adopted by Romania by GD 300/2006, harmonized with EU legislation, as follows:Politica aplicată pe șantier este de a crea un mediu de lucru sigur atât din punct de vedere al securității și sănătății muncii, pentru toți angajații cât și pentru alte persoane ce pot fi afectate de activitățile realizate pe șantier.

	
<b>Health and Safety Plan</b>	
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>
	<b>No project:</b> 2004/RO/16/P/PA/003  Pag. 4/25

1. Policy is to achieve appropriate projects with customer requirements and applicable legal requirements.
2. Policy is to implement the best conditions for workers to reflect as much as possible in the health and safety personnel on site.
3. Policy is provided to identify and assess risks, both to the activities of employees and on-site activities so as to ensure a safe and healthy workplace for employees, partners and anyone else who might be affected by site work.
4. OSH Plan aims to contribute to the general perception change that construction activity is an activity with high risk of incidents / events and to do this campaigning for active collaboration and honest with everyone involved in projects beneficiary (customer builders, designers).
5. Respect and paying a special importance all health problems and safety, and environment.

#### **Objectives**

1. To provide information on the characteristics and functioning of the project to future users of the project;
2. Indicate the personnel who work transformation, expansion, etc.
3. Indicate any steps that were taken to safety and health principles for persons who may be affected by activities conducted on site.
4. Specify the names of the parties known to have been involved in work, maintain, etc..

#### **Aims and goals**

The main aims of OSH are:

- zero accidents with temporary incapacity
- a minimum of cases requiring medical care;;
- minimeum risk possible (RMP);
- compliance at least the Romanian and EU legislation and international standards and codes, and where reasonable, to improve efficiency standards specified in these documents.

#### **General informations**

OSH plan provides requirements for GD. 300/2006 referred to in art. 19, as follows:

- General measures of organization of site
- Specify minimum OSH requirements applicable to the site
- Specification of risks arising
- Indication of necessary preventive measures to reduce or eliminate risks
- Content specific measures concerning work which recorded in exhaustive list of tasks that involve specific risks to health and safety of workers..

OSH plan is developed for design PTh, DE or single phase PTh+DE, for projects carried out by a single designer. He must be completed and adapted by the manufacturer according to site development and continuation of the work or work stages documented by the manufacturer through its OSH provisions of the Plan.

The goal of health and work safety (OHS), applied in the health and safety plan is to ensure the health and safety of employees working on site and any others who may be affected by their activities.

		<b>No project:</b> 2004/RO/16/P/PA/003
<b>Health and Safety Plan</b>		
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>	<b>Pag. 5/25</b>

The purpose of this OSM Plan is to ensure customer confidence that the work undertaken on site are adequately prepared against documented requirements and compliance with legal requirements and the essential quality for railway construction, on:

- Road safety
- Mechanical resistance and stability of the works;
- Fire safety;
- Hygiene, health and environment;
- Safety in use;
- Protection against noise;

OSH plan is designed to meet the requirements of the beneficiary as well by providing information and records management activities on site during all phases of ongoing investment in a professional and efficient manner.

OSH plan identifies hazards and assesses risks, which can lead to physical or psychological injury, industrial disease, fire and environmental damage.

OSH plan to constructively deal with health and safety hazards anticipated employees from the first phase of the process.

OSH plan provides adequate facilities and arrangements to enable employees and those working on site should be heard and to raise health and safety.

To control the site through monitoring activities to prepare a statement of THE METHOD according to Appendix 20, based on site organization plan (Appendix 02) prepared separately by the general contractor.

### 1.1. Location of construction site

Location of construction site and is described in detail in Annex 2.

This organization is based on the proposal site designer and is reconciled with the work provided by the manufacturer that rail works to ensure that all staff is familiar with all the facilities that could involve some risks to the works to be executed.

OSH Plan include:

- General description of the construction site (site plan works (Annex 02))
- Limits site works
- Access to the site works (access from public roads, Annex 02)
- Roads and technology site in the vicinity of railway lines
- Information on the operation of the railway
- The lines are in operation
- Line voltage contact
- Work areas special structures
- Interface with public facilities and private properties

### 1.2. List of addresses and telephone numbers of key organizations and individuals

It is vital that all parties involved in the construction yard to be known by everyone. For this reason some lists will be prepared to inform everyone on the field and staff organizations on the ground. In particular, will be nominated persons responsible for each area and task. Vor fi elaborate următoarele liste:

- List of important phone numbers (Annex 01)
- List of companies builders and subcontractors (Annex 01)
- List of utility companies (Annex 01)

		<b>No project:</b> 2004/RO/16/P/PA/003
<b>Health and Safety Plan</b>		
<b>GENERAL DATA</b>	Objectif: <b>REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>	Pag. 6/25

Companies that provide utilities for the site and, more importantly, list of companies that have utilities that undercrossing or undercrossing sites, such as for instance the parallel track. This will also include a list of divisions Employer (Railroad Company) that hold the cables and pipelines crossing. These facilities are vital for railway operation and safety of railway operation.

### 1.3. Construction site organization

Field organization will be presented in special organization. In addition to contractors, on the ground are also involved representatives of the Employer and / or supervision (Engineer).

Will be developed following plan:

- The organization for all contractors and all subcontractors, each contractor (Annex 01)
- Employer Organization (including regional divisions) and field representatives, including Supervision (Engineer), (Annex 01)

### 1.4. Coordination and supervision of safety and health site

For coordination and application of general principles of prevention and security will appoint a:

- **Coordinating the safety and health during the project preparation stage (CMSSEPL)**- any natural person or legal authority, designated by the beneficiary and / or by the project manager during project elaboration, with the powers provided for in art. 54 (GDno. 300/2006.)
- **Coordinating the safety and health during the development work (CMSSRL)**  
Any person or entity designated by the client and / or the project manager during the development work, with duties stipulated in art. 58. (GD no. 300/2006.) Coordinating function in security and health during project preparation and function  
The security coordinator and health during the development work and subsequent interventions may be owned by the same person.

Coordinator safety and health at work is a natural or legal person with experience to perform his duties, namely:

- Professional experience in construction or site management;
- Specific training coordinator for safety and health.

Contractors must specify the persons above working method and safety measures for construction site before work can begin.

Based on contractual documents (tender documents, contracts) and OSH Plan, Coordinator must verify:

- If the working method and sequence of construction comply with the measures set out in the SSM;
- If the work can be performed without causing a dangerous situation.
- If non-compliance to OSH Plan, and will have the methods of work and construction sequence.
- SSM plan and will be adopted for the work that is called;
- Performance of OSH Plan including all relevant provisions for the duration of works.

Contractor shall specify the method of work and safety measures for buildings that achieved on site before work can begin by developing and submitting to the beneficiary (Annex 22) - method statement.



		<b>No project:</b> 2004/RO/16/P/PA/003
<b>Health and Safety Plan</b>		
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H,</b> <b>SECTION: BRAȘOV - SIGHIȘOARA</b>	<b>Pag. 7/25</b>

### 1.5. Report

Coordinator (CSSRL) is transmitted to the beneficiary regularly at intervals of time, reports on the conduct of work on site in terms of safety and health, to enable the Beneficiary can follow the work. Beneficiary and its representatives (Engineer) will develop a list of telephone numbers of all persons responsible for the field, including those mentioned in Chapter 1.4.

The contractor must notify the Employer following:

- Staff on site
- Use of machinery and equipment
- Providing materials
- State of progress
- Reports on incidents and accidents
- Damage of equipment and their installations
- Damage of facilities and property of the beneficiary, or, as appropriate, of third parties.

### 1.6. Staff

Contractor personnel will be sufficiently trained and experienced to work to be carried out on site. All persons must comply with the requirements specified in the SSM plan and must comply with the Beneficiary or its representatives. In case of failure, and contractor personnel that will be warned and in severe cases the contractor will be required to replace that person.

### 1.7. Work program

On legislation, the work will be performed during regular working hours.

All work performed outside working hours will be announced by the contractor in advance, specifying the work program (eg shift) working days (eg weekends) and during these works. Also be considered in regard to the exploitation of special railway lines.

The contractor is responsible for all necessary approvals for overtime (shift, working Saturday and Sunday, overcoming normal working hours) required by Romanian law.

### 1.8. Subcontracting work

Entries can be performed by subcontractors only with prior consent of the Beneficiary The contractor must demonstrate that the designated subcontractor may have experience and is able to perform work as required under the contract.

The contractor will also provide all necessary documents and special permits required for such works for the railways.

## 2.. AREAS OF WORK

### 2.1. Circulation in the site

Auto and pedestrian Circulation within the site shall be regulated based on rules laid down in Annex 22 on auto and pedestrian traffic routes.

All access roads and access to public roads are established and approved by relevant authorities;

All accesses to the branch will also be agreed with the Beneficiary to reduce negative effects on plants and its exploitation;

Ing access roads to the site will be marked with signs and bear.

Access and movement on site will only traffic routes indicated / marked.

		
<b>Health and Safety Plan</b>		<b>No project:</b> 2004/RO/16/P/PA/003
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H,</b> <b>SECTION: BRAȘOV - SIGHIȘOARA</b>	Pag. 8/25

The working and organization of site area will be delivered by (possession for the contractor) on a special protocol. This report will include (among others) the following items:

- Description of site conditions found in the field taught
- All information on facilities the Beneficiary
- Exploitation of the client's own facilities / lines
- Owners of utility facilities to third parties (Undercrossing and Overpass)
- Other information specified in the instructions the Beneficiary

### **Responsibilities of Contractor**

The contractor is responsible for installation and operation of the site organization. Contractor will comply with legislation.

The contractor is responsible for installation and operation of the site organization .

Contractorulului assigned duties specified by law and requested by the authorities concerned.

The contractor is responsible for the use, operation and maintenance of site organization.

The contractor shall obtain approval on their responsibilities for these pathways.

Contractor shall be responsible for all measures to ensure safe traffic area.

The contractor will present their findings as the the Beneficiary to ensure safe movement in the work area for coordination and approval.

The contractor shall prepare a plan for the site including its organization and access to the site and for site organization. This plan must be approved by the Employer.

After completion of the contractor to terminate the access roads within the site organization, and land temporarily occupied initial destination to be played under the contract. The minute is the verification that the conditions required have fort.

### **2.2. Residential areas on the site and social dependencies**

In general it is not expected to be allowed the contractor to build residential areas for workers on construction sites or in place of the organization of the site.. The only exception is work to be done in shifts.

However, if necessary residence on site, the contractor must transmit a official request to the beneficiary or his representative for approval.

The contractor will provide resting places for their staff during working hours and an adequate number of toilets and washing facilities.

În cazul în care se execută lucrări cu fluide sau cu agenți periculoși, contractorul trebuie să asigure de asemenea echipamentul necesar pentru spălare și pentru cazurile de urgență, așa cum este cerut prin lege.

### **2.3. Work places / areas with special protection for winter**

If the contractor of the works during the winter to ensure sufficient staff rooms with heat to warm.

In addition the contractor shall ensure that all access roads and technology will be safe for movement. Snow will be removed from work areas and to avoid slipping staff will throw sand or gravel.

### **2.4. Medical office**

Beneficiary calls to legal regulations, a separate medical office.

The contractor shall provide this office with all necessary first aid equipment.



	
<b>Health and Safety Plan</b>	
<b>GENERAL DATA</b>	Objectif: <b>REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>
	No project: 2004/RO/16/P/PA/003  Pag. 9/25

The contractor will make a proposal to equip the office. The size will depend on the number of medical service personnel on site.

In addition to the subject mentioned above, additional legal regulations will be respected.

### 2.5. Electricity on site, site lighting

Electricity supply is the responsibility of the contractor. It must coordinate with the supplier the amount of electricity and power supply.

Contractor shall obtain all necessary approvals from the authorities and the provider.

Electricity supply must be part of the site plan organization.

The contractor must also deal with providing sufficient lighting for working points as well as main roads. If work must be carried at night may be required mobile lighting systems. For safety reasons the site organization must be illuminated throughout the night.

No person outside the site electrician named, will not connect or disconnect the power supply, other than those of electrical outlets or triple plug, or modify temporary power supply. Improvisations are not allowed electric lighting, heating, etc..

### 2.6. Radio communication

For radio communication site contractor must provide the type and amount of equipment you intend to use. He must coordinate with The beneficiary or its representative to ensure that its equipment does not disrupt radio communications used by the railway company. He must obtain approval of the Employer and the relevant authorities before using equipment.

**Atentie !** The use multimedia devices (radios, stereos / walkman, mp3 player, etc..).

### 2.7. Regime, cleanliness and hygiene

Contractor is required to maintain the work area, site organization and driveways clean and orderly. In particular, will be cleaned regularly driveways and roads to avoid the danger of accidents especially road.

Beneficiary or his representative will check this regularly and is entitled to have additional cleaning if traffic safety is endangered

If the many contractors use the same access road, the Employer or its representative shall have and cleaning costs will be attributed to the contractor who caused the contamination or public access roads.

Site organization and all rooms must be kept clean and sanitary. Periodic cleaning is necessary.

## 3. HEALTH AND SAFETY OF THE WORKS

### 3.1. Safety at work on the construction site

#### 3.1.1. Responsibilities

- The contractor is entirely responsible for safety and health on the site. He must ensure that all building managers and workers know all OSH plan. This also includes subcontractors.

OSH Plan will be available on site and be located in a place accessible to all participants. Beneficiary and its representatives will check if SSM plan is available and updated in the final version.

- The contractor shall designate a person - coordinator on health and safety during implementation of the project (CSSRL) and its representative to the construction site. This person (CSSRL) is

		<b>No project:</b> 2004/RO/16/P/PA/003
<b>Health and Safety Plan</b>		
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>	<b>Pag. 10/25</b>

responsible for all updates OSH plan and must ensure that all plan participants comply with the requirements of OSH. One of them must be kept on site. Ei sunt responsabili integral pentru desemnarea personalului, utilajelor, echipamentelor, materialelor și sunt de asemenea responsabili pentru tot echipamentul de protecție.

Designated person - Superior site manager (SSS) is responsible for all matters concerning safety and health on the site, safety and fire protection, particularly for safe interface between all the works including all contractors and subcontractors.

- The contractor must ensure compliance with all legal requirements regarding safety, health and safety and any other requirements under the permit.

If several contractors working in the same area, each contractor must verify the conditions left by another contractor after conducting works or works. This is especially in relation to works near the railway and additional excavation and / or trenching, demolition or other work areas that may jeopardize the contract work.

Will also be checked shuttering, scaffolding or other facilities to be used by another contractor. If the power supply and lighting will be shared by several contractors, one of them will be responsible for the use, maintenance and all work required for the operation of these facilities.

- The contractor is responsible for developing an analysis for all the work on hazard / risk potential may arise during execution and also to develop relevant instructions for each project staff. This will reduce risks.

Beneficiary or his representative will verify this analysis.

If you have already occurred risks, the contractor can continue work only after the risks have been eliminated and the beneficiary or his representative agreed.

If the contractor has found non-compliance, must immediately beneficiary to assess whether the work can be continued or not. If the contractor does not fulfill its obligations, the Beneficiar may stop work until the risks and non-conformities have been eliminated.

### **3.1.2. Instructions**

Each person / employee of the contractor and all subcontractors must be informed about OSH plan and all relevant instructions. The contractor must demonstrate a minutes the Beneficiary or other appropriate documentation that all employees have received training and instructions (see example in Annex 16).

This procedure must be repeated for each person entering the building site for the first time.

If the Employer identifies unauthorized personnel on site and / or untrained, the Employer is entitled to evacuate the building site.

### **3.1.3. Safety and protection equipment**


You must be worn a helmet and protective boots for all the construction work carried out.

Personalities must wear high visibility vests especially for works of the lines and in public areas.

The contractor will provide special equipment such as safety goggles, gloves and special news for special work or works that toxic agents danger of spark.

### **Providing personal protective equipment (EIP) and work equipment (EIL)**

- Perform Providing workers with personal protective equipment and clothing and individual work according to the rules and the collective labor contract.
- The worker receives inventory helmet, was forced to wear permanently on site.
- Depending on workload, the worker is equipped with work (EIL), goggles, gloves, belt,

		<b>No project:</b> 2004/RO/16/P/PA/003
<b>Health and Safety Plan</b>		
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>	<b>Pag. 11/25</b>

etc..accordance with the law.

- To equip workers with overalls and boots provides a list of the chief supervisor stating name, profession, date of employment, overall size, size boots, signature and address employee Purchasing Department.

Personal protective equipment (PPE) appropriate to be worn at all times. Minimum building site is:

- Construction helmet (like miner helmets are not allowed)
- Construction footwear (steel toecap and sole blind soles)
- Appropriate clothing (overalls)

Anyone found appropriate personal protective equipment nepurtând will denied access on site.

#### **3.1.4. Intoxicating agents**

The construction site is strictly prohibited alcohol or other intoxicating agents. This also includes all facilities in the organization of the site.

The contractor is responsible to evacuate any of the site if there is suspicion of alcohol or other intoxicating agents.

No person who has consumed alcohol or other intoxicating agents and traces can still be in circulation shall be permitted on site. Beneficiary or representative can verify this by testing randomly. Any person who fails the test or refuse to be tested will be removed from the site.

#### **3.1.5. Work in areas of lines (wires)**

Before starting work on the lines, the Employer provides special provisions and special training on the risks that may arise from the installation and operation of railways. Instruction must be demonstrated in special documents / minutes.

It is envisaged that work will be performed during operation of railway lines. It is vital to not interrupt the operation. Gauge lines in service should not be limited or reduced the works. Observe all necessary steps under the appropriate instruction to ensure safe operation of railway tracks.

Will be that all additional requirements may be imposed by regional divisions of the railway company during the construction period.

The contractor shall provide supervisory staff all work performed in the operating lines. It is forbidden that such persons have no other duties than the surveillance agent.

All work in the service lines will be announced in due course Beneficiary. This documentation will include among others the following information:


- Program works
- Detailed description of work coordinated with all involved contractors
- Nomination of all people in charge of the works contractors and health and safety. All these people will have special permission for such tasks

Have also adopted special instructions of the railway company. Upon a written request railway company issued a so-called "decision" that allowed the work. Will be provided the same documentation also for work taking place in the traffic window.

In this procedure will be involved and beneficiary. He must check and approve the work, checking also influence the overall project and contractual provisions.

If the work allowed by the "Decision" submitted were completed, the railway company and beneficiary must be informed in advance.

If the rail cranes are used, the contractor shall ensure that any equipment, machinery, heavy dut, counter-weight or gauge line does not affect the operation or endanger the railway line installations

		
<b>Health and Safety Plan</b>		<b>No project:</b> 2004/RO/16/P/PA/003
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H,</b> <b>SECTION: BRAȘOV - SIGHIȘOARA</b>	Pag. 12/25

facilities threaten the railway line (contact line, signaling). In particular attention is needed in areas of contact line voltage. The machines will be equipped with devices which block / restrict movement of these plants.

For all these areas need trained personnel and special approvals from the railway company.

Besides working the crane operator is required another person to direct on the crane the operator to ensure that the gauge is not violated. It is generally responsible person and any person involved in that work must comply with its instructions.

All equipment used in the construction of railway lines must have authorization / certification from the Romanian Railway Authority (AFER).

The contractor is responsible for obtaining all approvals and authorizations.

If the Employer identifies that echipamentul not meet the requirements, he has the right to refuse equipment on site.

Throughout the period of the works in the vicinity of lines in service route will be checked regularly and level lines to ensure stability and integrity in service lines.

### **3.1.6. Demolition works**

For demolition work requires a special disposal including necessary safety measures and description of equipment used for this work. Provision should be developed and submitted by the contractor or his Beneficiary for review and approval.

## **3.2. Technical safety requirements**

### **3.2.1. Construction machinery and equipment**

The contractor is responsible for providing all documentation required for each facility and equipment used in the construction site. Among others will be provided the following documents:

- Permits (AFER is mandatory)
- Maintenance Reports
- If mounting provisions (eg cranes)
- Other permits required by law.

The contractor is responsible for these documents are available on site. The beneficiary has the right to these documents is also necessary that these documents are available on site for inspection by the authorities (AFER, State Inspectorate, etc..).

All equipment must be approved AFER valid markup.

Contractor's responsibility to ensure that machinery and equipment are operated only by authorized personnel.


Machinery and equipment should not be handled / driven only by a qualified person who is in possession of a valid certificate of competence to the current date.

Personnel should wear permanent authorization that allows operating machinery and equipment.

Staff parking is restricted or prohibited near moving equipment (cranes, excavators, trucks, etc..).

### **3.2.2. Electric equipment**

Only authorized personnel may work on electrical systems owned railway company (contact line, high voltage cables including cables, signaling equipment).

	
<b>Health and Safety Plan</b>	
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>
	<b>No project:</b> 2004/RO/16/P/PA/003  Pag. 13/25

All work completed will be checked by the authorities / relevant departments of the railway company. The result will be demonstrated by special reports (inspection reports, minutes of Teaching, minutes of reception).

După ce compania de căi ferate și toate autoritățile implicate au transmis recepția lucrărilor, acestea pot fi puse în funcțiune.

În cazul în care lucrările vor fi executate în vecinătatea liniei de contact sub tensiune și nu poate fi oprită tensiunea, trebuie adoptat un regim special pe baza dispozițiilor organului relevant din cadrul companiei de căi ferate.

After the railway company and all involved authorities sent reception work, they can be put into service.

If the work will be performed in the vicinity of the contact line voltage and voltage can not be stopped, have adopted a special regim under relevant provisions of the relevant body of railway company.

### 3.2.3. Cables and pipes

In the work site areas are owned cable and facilities railway company. Additionally, several pipes and utility cables undercross site owners and in some cases run parallel to the rail.

The contractor shall provide all facilities knowledge of the railway company and those of others. During the process of teaching of the site by the contractor will be specified location and type of these facilities.

With the draft will be drawn up a list of utilities located in the area which will be delivered to the contractor. The contractor must verify actual field location of all utilities and cable.

The owner must be informed before work in the vicinity of installations, cables and pipelines. If relocation is required, the contractor must request approval for these works.

**Attention!** Do not start any work before obtaining approval of utility owners.

Work can be performed by companies authorized by their owners. Note that it is possible that during the works to appear unknown utilities and cable. In these cases must immediately inform be neficiary.

Contractor in collaboration with the Beneficiary will seek owner of utilities. While the owner is not known and the nature and purpose utilities / cables are not specified, the Contractor shall not continue work in that area.

In the event of breakage or damage to utilities and cables will be immediately beneficiary and owner of utilities. Work will be stopped to avoid further damage. Troubleshooting must be done by the owner or by an authorized company appointed by the owner, costs borne by the contractor who caused the damage.

To avoid damage, all personnel working near utilities and cables must be aware of these facilities. The contractor has the responsibility to inform / to put the issue in advance before work. Information will be represented by documents with minutes respectively.

### 3.2.4. Excavation and reinforcing, reinforcing on the line longitudinală

All areas of excavation will be provided with adequate balustrades or similar protection. If during excavation will be found ammunition and explosives, work must be immediately stopped and the Beneficiary will be informed immediately and authorities.



		<b>No project:</b> 2004/RO/16/P/PA/003
<b>Health and Safety Plan</b>		
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>	<b>Pag. 14/25</b>

Explosive ordnance disposal and will be made only by competent authorities. Those bodies will be included in a separate annex.

Will be made for special projects and all supporting calculations and other work that will ensure stability of the earth. The contractor is responsible for developing these projects. The project will be checked by an authorized expert (Expert MLPAT). Without its approval will not be performed any work. The Engineer of the Beneficiary must check whether the execution of these works is in accordance with the project.

### 3.2.5. *Protection of areas of work at heights, scaffolding and excavations or other dangerous areas*

**ATTENTION !** Not allowed to link to crane loads only authorized internal load bookbinding.

To prevent falls in the empty area where there is any risk of falling should be protected with guard rails / barriers appropriate. Working over 2 m in height and it is considered compulsory wearing of seat belts fastened / secured properly to prevent fall.

OHS Coordinator of the Beneficiary will be informed prior to commencement of these works to give its approval.

The contractor must demonstrate "documented" good condition of scaffolding, shuttering and safety barriers. Such documentation (eg installation instructions from the manufacturer, quality certificates, general calculations, etc..) Must be available on site. In case of doubt on the stability and safety of these installations beneficiary is entitled to consult the documentation and reject plants.

Not allowed any change or modification of scaffolding and shuttering is not provided in the manufacturer's manual. All changes must be approved by calculations and special projects producer.

All scaffolding and formwork which is close to the contact line voltage will be equipped with grounding.

**Attention!** It is forbidden to work on sawing stand, barrels, bricks or other improvisations.

### 3.2.6. *Hazardous materials*

The contractor is obliged to inform the Beneficiary on the use of materials, goods and hazardous agents. The contractor must provide a complete list specifying the type of materials or agents (toxic, flammable, etc. explosiv.).

The prior consent of the Employer is necessary.

For storage of these goods will be taken special measures required by law and all other regulations. In case of emergency must immediately beneficiary. Area where hazardous materials have caused degradation soon be isolated to prevent or reduce further negative influences on people, property and the environment.

Handling hazardous materials and will be made only ageților personnel / authorized. The contractor shall notify the Employer name and position of these people.

## 4. EDUCATION

Personnel belonging to entrepreneurs will be trained before entering the site Occupational Safety Officer on a theme (agenda) training.



		<b>No project:</b> 2004/RO/16/P/PA/003
<b>Health and Safety Plan</b>		
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>	<b>Pag. 15/25</b>

All training is documented and kept in a secured cabinet properly ..

In accordance with the law each contractor is required to regularly train their own staff.

#### 4.1. Training agenda

Before entering, the first entry on site all personnel will be trained on safety and health. This training is based on an agenda that will include:

- Summary of project
- Presentation and manufacturer role in this project
- Presentation Rules applicable OSH and Fire Site

Presentation paper:

- Major risks that may occur during construction and personnel at risk
- Causes and how to report the incidents / events
- OHS obligations line, PSI, environmental and emergency situations
- Materials hazardous to health and protective measures necessary when working with such materials
  - asbestos – mask and goggles
  - dust - mask and goggles
  - concrete – goggles and gloves
  - noise and vibrations – antiphons
  - grinding – goggles
  - welding – mask, gloves, apron, protective leggings

#### The work on the basis of work permits

- Presentation site stating:
  - How to access the site,
  - The pedestrian and auto circulation routes on site
  - Location of the offices / containers
  - Location of switchboards,
  - Location smoking place
  - Location of pickets PSI
  - Location of existing facilities (toilets, water, etc.)
  - Working time of site
- Presentation evacuation plan in case of fire / emergency measures to be taken in such circumstances
  - Evacuation routes kept free
  - Assembly points in case of emergency
  - Fire extinguishers - types and usage

#### 4.2. Instruction on Safety,

##### 4.2.1. Instruction in employment

- Instruction on Safety training is carried out according to the agenda (Annex 16)
- Operator training is carried out at work for 8 hours by direct head job, depending on risk factors specific to the job and that job.

		<b>No project:</b> 2004/RO/16/P/PA/003
<b>Health and Safety Plan</b>		
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>	<b>Pag. 16/25</b>

#### **4.2.3. Regular instruction**

- Is done once a month for at least 2 hours.
- Process the regulations and instructions that are specific to their job and that job provided by the worker.
- It records individual training record for safety and the emergency.

#### **4.2.4. Instruction on Safety to change jobs**

- Is made by direct head job, that for min. 2 hours.
- It presents specific risks of workplace injury, provided that the worker job.
- Be recorded in the individual file for safety.

#### **4.2.5. Instruction on Safety to introduce a new technology, equipment, facilities**

- Is made by direct head job, that for min. 2 hours.
- It presents specific risks and protective measures specific to the new technologies, equipment, facilities, etc..
- The record sheet instruction in safety.

#### **4.2.6. Instruction on Safety worker returning from annual leave or sick**

- Is made by his supervisor that work for min. 2 hours.
- It has those rules and instructions that are specific to their job and that job provided.
- The record sheet instruction in safety.

### **5. FIRST AID AND REPORTING INCIDENT / ACCIDENT**

All contractors shall provide necessary first aid equipment, in order to the number of staff working on site. Moreover, it is also necessary to ensure an organized first aid special container with all necessary equipment.

In addition the contractor shall designate a sufficient number of trained first aid. All these people will have the necessary authorization for this training / education specialist.

Must be complied regulations legislation.

In case of emergency (incident, accident) the responsible person must inform the competent emergency medical, police and fire department, as appropriate. In parallel be informed and beneficiary. In all incidents, especially those with injuries or deaths, a report be presented to the Beneficiary.

The contractor must also have regard to all other reports and processes may result from these incidents.

All accidents must be recorded in the register of Accidents in the companies where workers are employed. This is a legal requirement.

Shall report all incidents, situations or dangerous actions.

#### **First aid in case of accident**

- It will equip the site with first aid medical kit and competent person nominated first aid.
- It instructs staff for providing first aid measures in case of injury, and especially the staff

		
<b>Health and Safety Plan</b>		<b>No project:</b> 2004/RO/16/P/PA/003
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H,</b> <b>SECTION: BRAȘOV - SIGHIȘOARA</b>	Pag. 17/25

- called (with the provisions of Annex 28) to perform this operation
- First aid instructions are displayed on site. În cazul unui accident grav, este chemată de urgență salvarea, sau dacă starea accidentatului permite, este transportat de urgență la spital.

### Procedures for accidents

- Workers are required to notify the head of the site as soon as the incident happened.
  - Head of Site is obliged to notify the safety inspector.
  - Safety inspector shall immediately notify senior management (the beneficiary contractor)
  - The insurer announced ITM and OSH, for special situations.
  - Establish a committee of inquiry.
  - Take statements from witnesses.
  - To establish a record of accidents, which is submitted to the ITM and the insurer for OSH.
- It will be Reported to ITM or insurer relating to OSH about to restart work or change the degree of disability.

## 6. PROTECTION AGAINST FIRE AND EXPLOSIVE (IF)

In case of fire must immediately notify the fire department and beneficiary. Immediate action will be taken to reduce the impact of fire.

If a severe fire or unskilled person will not approach the fire. In case of fire in the vicinity of hazardous materials will be evacuated all personnel from area. Only Firefighters can approach the fire.

Firefighters will be informed immediately about the presence of hazardous materials and goods. Will also be available to firefighters documentation specifications of these materials. The contractor shall provide all facilities fire on the law and regulations. We have developed a special procedure as part of the OSH

All work that can produce heat (welding, flame cutting work) should be made with special regim. Staff involved should be trained to use extinguisher. Lucrările will be notified of the Employer before execution.

Unauthorized persons, improperly using the fire fighting equipment (fire extinguishers) will be removed from the site and if necessary can be legal and disciplinary action taken against them.

**Evacuation plan in case of emergency** or fire are presented separately for each site separately, ie each job site, linked alarm plan, according to - Annex 18 and evacuation plan in case of emergency or fire - Annex 29 .

Install warning signs in high fire risk areas (storage tanks, flammable substances, etc..). Be equipped with a picket PSI site, including the nomination team, and extinguishers. In case of fire or emergency stop everything and all the staff gathered in a specially designated place (place of assembly in an emergency).

**Attention!** Smoking on site is allowed only in specially designated areas.

		
<b>Health and Safety Plan</b>		<b>No project:</b> 2004/RO/16/P/PA/003
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H,</b> <b>SECTION: BRAȘOV - SIGHIȘOARA</b>	Pag. 18/25

## 7. ENVIRONMENTAL PROTECTION

Environmental protection will be considered permanent account during construction. Will be strictly avoided contamination or degradation of water sources, soil, vegetation, public or private property, public or private roads, and transport work performed by the contractor. In case of incidents or accidents, the contractor shall be responsible primarily to reduce the impact and the second to remove contaminants and their degradation costs.

In working areas where vegetation was not removed by works will be protected. The contractor / contractors shall comply with environmental legislation, orders and regulations. Failure to comply with legal requirements and other applicable cerintel, by the contractor, the beneficiary will be treated as a breach of contract.

The contractor shall bear all legal consequences arising from this.

Special measures will be taken:

- Waste management, waste collection will be pursued, namely earth, ballast, the material from dismantling / demolition, etc.. and its transport to places authorized
- Reduce noise during construction near residential areas in the site
- Protection of environmental water, air and soil
- Realization and maintenance of cleanliness on the site and adjacent areas.
- Development of ramps wheel washing machines leaving the site by road.

To track activities related to utilities - facilities, waste disposal plan of organization are records of Annex 15

Protection measures will be specified in detail during the development project at the latest after completion of the Project Technical (PTH).

## 8. IDENTIFICATION AND ASSESSMENT - TREATMENT RISKS

Methodology for identification and evaluation, risk treatment is based on common principles laid down by national and European legislation.

Risk factors work to determine the four components of work: executing, inputs, the task and work environment.

Risk assessment to consider the most serious consequence of foreseeable risk factors, based on data from a multi-organization experience, combined with available data from similar organizations.

Identify and evaluate risk-related main treatment site by filling in and analyzing the main problems in Annex Table 25

Treatment project risks is based on the table in Annex 27 - Inventory and assess risks. Treating the main risks is presented in Annex 21 - Plan OSH prevention and protection, developed in accordance with the provisions of the GD 1425/2006 on rules for the application of Law 319/2006.

Risk level for each job is calculated as a weighted average risk levels established for identified risks.

The overall level of risk the organization is calculated as a weighted average risk levels established for each job.

Risk Classification:

- Acceptable - risk level <the overall risk organization;
- Unacceptable - the risk > risk than the overall organization.

The result of identification of risk factors and risk assessment must be documented Assessment Sheet workplace.

		<b>No project:</b> 2004/RO/16/P/PA/003
<b>Health and Safety Plan</b>		
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>	<b>Pag. 19/25</b>

All risk factors from the relevant unacceptable evaluation sheet are centralized in preventive measures. The process of identifying and assessing risk factors for SSM is dynamic, meaning that takes place continuously.

OSH performance is continually improving processes through the implementation of any control action / improvement.

Identify and evaluate risks-site treatment is performed in compliance, but not limited to, the provisions of GD 300/2006 ANNEX 2 - exhaustive list of tasks that involve specific risks to safety and health and Annex 4 - Minimum Site safety and health.

## 9. SAFETY AND HEALTH REGULATIONS FOR SITE

General measures of organization of the site in security matters and health and environmental protection will be based on protocols signed with the client (Annex to the contract):

- Protocol on Environmental Protection (Annex 5) and
- Safety protocol (Appendix 6).

### *Employing staff*

- Employment Act is based on qualification for that job;
- Perform medical examination on request sheet and sheet risk exposure, the notification card safety. (Ex. Apt for working at heights).

Occupational physician for skill sheet issued with work visas apt for the job done. Making general introductory safety briefing on safety cabinet in accordance with Law no. 319/2006 for 8 hours.

- the employment contract is made upon the presentation of qualifications and ID, the card work, the human resources office.

Presenting the work site or section

- The worker is present on site with:
  - The distribution given by the Office of Human Resources;
  - Safety sheet, which is also the medical record of competency.

(Ex. The safety sheet must be working visa Apart from height, for all those working at height).

- Perform the safety briefing at work by his supervisor that.

### *Supervision of works*

Surveillance work is done directly by the head of that job, the worker Standing:

- ♣ To wear EIP and EIL;
- ♣ To practice proper work procedures;
- ♣ Respect the rules of safety.

### *Achieve collective protection measures at site*

Achieving collective protective measures on the site is based on the checklist on-site safety and health (Annex 3).

Balustrades at all places with danger of falling into the void (excavation edges, board edges, technological gaps, stairs, scaffolding). Balustrades shall be of steel or wood and must be strong so that they can take any work arising from loss or imbalance of one or more employees. Semnalizarea de securitate:

- ♣ tape warning the goals;
- ♣ Posters signals, plates (metal) with security markings to be taken on inventory supply

		<b>No project:</b> 2004/RO/16/P/PA/003
<b>Health and Safety Plan</b>		
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>	<b>Pag. 20/25</b>

- compartment;
- ♣ Burn electrical panels, "electric shock";
  - Creation of pedestrian passageways, protected and marked for sites adjacent pedestrian crossing sidewalks.

Electro security:

- ♣ locked, electrical panels and safety signs them;
- ♣ Making earthing to the barracks, equipment, electrical panels;
- ♣ Making the site PRAM bulletin every six months.
- ♣ Scaffolds:
- ♣ Seating area is flat, without holes or irregularities;
- ♣ It is prohibited to mount the scaffold legs on bricks, brick ...
- ♣ Scaffold should be complete (complete and continuous paved, ladders, handrails);
- ♣ Scaffold should be anchored (anchors and spacers present, so it does not move). To be perfectly stable.
- ♣ After mounting the scaffold to prepare a record of receiving it.

Making all necessary protective measures as required by law to prevent any accidents or occupational diseases.

#### ***Binding load internal authorization***

It meets an internal committee to instruct the load bookbinding, comprising:

- ♣ Responsible ISCIR
- ♣ Officer safety
- ♣ Chief of site

Training for those workers, according to technical prescriptions ISCIR R1-R5/2003.

It is a test by trained worker and a practical test;

After taking the test and practical test card is made by authorized personnel

Book is intended annual personnel authorized by the commission instructed.

**ATTENTION !** Not allowed to link to crane loads than internal authorized personnel.

#### ***Internal authorization electricians***

- Meets an internal committee consisting of:

- ♣ person authorized electrical
- ♣ chief electricians
- ♣ safety inspector

is given a test result shall be recorded

- After passing the test is made coupon electrician

- Annual coupon electrician is intended by the commission which drafted.

- To carry out electrical works must be issued a permit for execution of electrical works in accordance with Annex 11.

**ATTENTION!** Allowed to intervene in domestic electrical installations only authorized electricians.



		<b>No project:</b> 2004/RO/16/P/PA/003
<b>Health and Safety Plan</b>		
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>	<b>Pag. 21/25</b>

### ***Working with subcontractors***

- The project manager is required to attach to the contracts with subcontractors on safety and health convention (Annex 26).
- Chief of site and safety inspector are required to verify compliance with the Convention by subcontractors and even to apply its penalties, under the contract.
- If all efforts remain unsuccessful stops subcontractors working on site to address matters required or apply penalties under subcontract.

### ***Identifying risks on site***

- The task is head of the site based on the risk list for accidents at work and occupational disease (Annex 19) and safety inspector.
- Risks are recorded in notes taken on site finding, indicating the degree of risk, treatment and remedial measures.
- Failure to lead to administrative sanctions according to the ROF, RI and Law. 319/2006 and GD implementing rules. 1425/2006.

Verification of sites on the safety line is:

- Chief of site
- Project Manager
- Coordinator of the Occupational Safety and Health duratarealizării work (CMSSRL)
- Inspector of safety
- Chief Engineer
- Director General of the constructor
- Representative of the consultant.

### ***Site facilities***

- Safety cards (and emergency) of staff with the ability-to-date medical records and medical visas required.
- Plan safety and occupational health of the site.
- Safety legislation and guidance for training their staff.
- Dossier for safety, comprising: finding notes, internal memos, agreements with subcontractors.
- Posters or plates (metallic) warning.
- EIP, helmets, gloves, goggles, boots, cloaks.
- Pichet PSI + extinguishers.
- First aid kit.

## **10. PERMIT**

Permit will be elaborated by the contractor / subcontractor, by competent persons and approved on activities that will run-supervisors work areas / activities, taking into account following a detailed analysis all potential risk factors.

Permit will be approved by supervisory personnel.

Permit will be issued only when the responsible ministry was concerned, attesting complete check of safety measures on the line for safety.

Work permits are given in Annex.

Work permits are constructor's own safety.

		<b>No project:</b> 2004/RO/16/P/PA/003
<b>Health and Safety Plan</b>		
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>	<b>Pag. 22/25</b>

Work permits are required for the work with open fire, excavation, work up in enclosed spaces.

The work site will be held on a permit system which will include:

- **Allowed access to the site (Annex 7)**

It is only with the head of the site which sets out:

- Describe the timing of activity
- Include the correct stages of developing activities
- Introduce responsibilities executants

- **Permit for excavation or excavation work**

It is only with the head of the site which sets out:

- The area of excavation or digging;
- Size, depth;
- The person performing the work and equipment or tools used;
- Protection of workers with EIP and EIL;
- Fencing and signaling area.

Excavation permit is given only after precise information network routes underground cables and pipelines in the area (high or low voltage cable, telephone, gas pipes, water, sewage ...) or an indication of existing underground constructions and their precise positioning (sewers, manholes, drainage ...).

In the event of such networks of underground installations, excavation permit will be given only after stopping supplying valves such ducts or voltage interruption on the electrical networks.

**ATTENTION !** This is done only with the institutions that belong to these networks (Ex. RENEL, APA NOVA, Romtelecom, ROMGAZ, etc..).

- **Lift Pass (Annex 8)**

Working at height

At the height of over 2 meters in feet and by reference to which the worker can not fall, it is considered working at height.

We allow only workers with medical opinion "Ready for work at height", written on card safety.

Not have access to high people under 18 years and over 55 years.

It is forbidden to work at height without adequate personal protective equipment: safety belt, helmet, safety shoes.

It is forbidden to work at height on work fronts were not made collective protective measures:

- Rails for all areas with danger of falling into the void (see Appendix 4);
- Coverage goals technological or otherwise, with durable cover that can take over any tasks that could be subject to warning tape and signs.

Access to the front of the worker working at heights can be made only after his training under OHS Regulations and their instructions for working at heights.

- **Allowed to work with open fire (Annex 9)**

Works with open fire is achieved only with the Chief of the site, which must be notified to:

- Location
- Personnel performing work
- Safety equipment used, according to the minimum of GD 1146/2006.
- Duration of work.

		<b>No project:</b> 2004/RO/16/P/PA/003
<b>Health and Safety Plan</b>		
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>	<b>Pag. 23/25</b>

These works will be completed only by authorized personnel for such work.  
example:

- Welding - Welders authorized
- For electrical works - electrical expert.

There will, before operation, protection and signaling adjacent areas could be affected (lateral spaces, below ...)

The work will be supervised by the chief required endpoint.

Chief of the site will be announced on completion of the work. After this time no longer work again opened fire there, and elsewhere without a new agreement of the chief supervisor..

▪ **Work permit to extreme temperatures**

A) - Low temperatures (below 5 ° C)

Chief the site must take the following measures, according to GD 1425/2006 approving the Methodological Norms for applying Law no safety and health. 319/2006:

Ensure the quantity of tea from 0.5 to 1.0 liter / person / shift.

It will give breaks to restore capacity thermoregulation, whose time and frequency are dependent on the intensity of exercise and ambient temperature in which they work. To this end shall ensure properly heated areas (barracks).

Providing personal protective equipment (padded coat, vests).

Reducing the duration of the working day (when temperatures drop below -20 ° C).

Failure to those to be taken by the head of the site shall be punished according to Law. 319/2006.

B) - High temperatures (above + 30 ° C).

On all sites where outdoor activities, according to the methodological norms of GD 1425/2006, head of the site must take the following measures:

At workplaces where constant air temperature exceeds 30 ° C:

- Take the sparkling salt water (1 g NaCl / liter), the amount of 1 liter / person;
- Staff will benefit from rest to restore thermoregulatory capacity in areas with proper environment.

During the extreme temperatures recorded (exceeding 37 ° C), shall take the following measures:

- Take the sparkling salt water (1 g NaCl / liter), the quantity of 2 liters / person;
- Provide shaded area where staff can go worker organized breaks to rebuild thermoregulatory capacity (perhaps a barracks provided with the fan). Duration and frequency of breaks is determined by exercise intensity and ambient temperature;
- Avoid outdoor activities at times which record maximum temperatures, will be arranged for this time activities inside;
- If possible, the program will be fragmented so as to avoid extremes in temperature intervals.

▪ **Permit to work in isolation or indoors (Annex 10)**

Be made only by agreement of the Chief of site, which sets the location:

- Personnel performing the work;
- Establish specific operations to be performed and their order;
- The provision of PPE and EIL done according to minimum requirements of GD 1048/2006 and GD 1146/2006.
- The stage set and the total work.

		
<b>Health and Safety Plan</b>		<b>No project:</b> 2004/RO/16/P/PA/003
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H,</b> <b>SECTION: BRAȘOV - SIGHIȘOARA</b>	Pag. 24/25

In these works at least 2 people involved and the work is done only under direct supervision and permanent (continuous) the head of that workstation.

The report to the Head of site after completion of the work is now prohibited any intervention in that area without a new agreement of the chief supervisor.

▪ **Permit for electrical work (Annex 11)**

**Identification System (Annex 17)**

Working methodology allowed is as follows:

- Seeking a contractor for a permit shall be submitted to the office coordinator for safety and health during implementation of the project, will complete the required permit and after approval will be able to start work.
- At the end of the program or the end of the validity of the permit shall be returned to the originator for cancellation.
- The permit will be kept of the work of the person undertaking the work and will be presented at the request of staff control

Notă:

- The carrying out above mentioned activities without having the license appropriate and valid
- Responsibility for obtaining permits is the job of supervisor
- Execution of works without permission is prohibited and disturb the work immediately

Completed permits shall be kept in the Register of coordination.

Model forms for permits can be found in Annexes Plan safety and health.

## 11. OTHER MEASURES

To consider the normative acts related to environmental protection, utility issues - facilities, waste disposal plan of organization are treated according to Annex 15..

- Requirements are not exhaustive and is necessary to take account of compliance with the regulations and will take the following measures not limited to, the:
  - Health and safety of workers from risks related to exposure to asbestos, in accordance with the provisions of the GD 1875/2005.
  - Minimum safety requirements regarding the exposure of workers to risks arising from vibration, according to the provisions of the GD 1876/2005.
  - Minimum safety and health requirements for temporary or mobile GD 300/2006.
  - Minimum safety requirements regarding the exposure of workers to risks arising from noise, according to the provisions of GD 493/2006 and GD 1756/2006.
  - Minimum requirements for safety signs and / or health at work, according to the provisions of GD 971/2006.
  - Minimum safety and health on the use of display screen equipment in accordance with the provisions of the GD 1028/2006.
  - Minimum safety and health for use by workers of personal protective equipment at work, according to the provisions of the GD 1048/2006.
  - Minimum safety and health requirements for manual handling of loads which pose a risk to workers, especially back injury, according to the provisions of the GD 1051/2006.
  - Minimum requirements for improving the safety and health protection that may be potentially at risk from explosive atmospheres in accordance with the provisions of the GD

		<b>No project:</b> 2004/RO/16/P/PA/003
<b>Health and Safety Plan</b>		
<b>GENERAL DATA</b>	<b>Objectif: REHABILITATION OF THE RAILWAY LINE BRAȘOV - SIMERIA, COMPONENT PART OF THE IV PAN-EUROPEAN CORRIDOR, FOR THE TRAINS CIRCULATION WITH MAXIMUM SPEED OF 160 KM/H, SECTION: BRAȘOV - SIGHIȘOARA</b>	<b>Pag. 25/25</b>

1058/2006.

- Minimum safety and health requirements for work, according to the provisions of the GD 1091/2006.
- Protection of workers from risks related to exposure to biological agents at work, in accordance with the provisions of the GD 1092/2006.
- Setting of minimum safety and health protection of workers from risks related to exposure to carcinogens or mutagens at work, according to the provisions of the GD 1093/2006.
- Minimum safety and health related to work exposure to risks from electromagnetic fields in accordance with the provisions of the GD 1136/2006.
- Minimum safety and health for use in work equipment by workers at work, according to the provisions of the GD 1146/2006.
- Establish minimum safety and health to protect workers from risks related to chemical agents, according to the provisions of the GD 1218/2006.
- Protection of young people at work, according to the provisions of Ord.753/2006.
- Law no. 307/2006 on protection against fire.
- Law no. 265/2006 approving Government Emergency Ordinance no. 195/2005 on environmental protection
- Government Decision no. 1739/2006 on approval of the type of constructions and subject to endorsement and / or approval of fire safety.
- Order no. 712/2005 on approval of the general emergency training.
- Law no. 112/2006 on Water Law no. 107/1996 with subsequent amendments.

Implementation of legislative acts above is the task and responsibility of supervisors and the Chief of site and the Coordinator appointed safety and health during the implementation of the project. Risks and treatment measures set will be available with adequate records, relating to the work.

## 12. COORDINATION AND COMMUNICATION WITH CONTRACTORS

To carry out its work session will be held as follows:

Meeting weekly command (coordination) to participating client, Coordinator of safety and health work and contractors during implementation will among other safety issues, according to records - Annex 10. Participation in the work supervisor of each contractor currently on site is mandatory. In addition, it will keep in regular contact with staff working on site, via the coordinator of security activities and health during implementation of the project, or other members of team management / coordination.

Conduct daily site activity take out the journal site (Appendix 14)

## 13. INSPECTIONS AND REPORTS

- OHS Site Checklist (Annex 3)
- Session command (Annex 12)
- Note remediation activities / dangerous situations (Annex 23)
- Warning for violation of Labor Protection (Annex 24)
- Incident notification form (Annex 13)

Model forms are found in Annex.

## ANNEX

According to those listed in the Contents.