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“OSH+ for the European Agriculture sector - Stimulating growth in rural areas through capacity building for providers (and beneficiaries) of occupational medicine and OSH services” – AGROSH+

# OSH for Agriculture

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# OSH for Agriculture

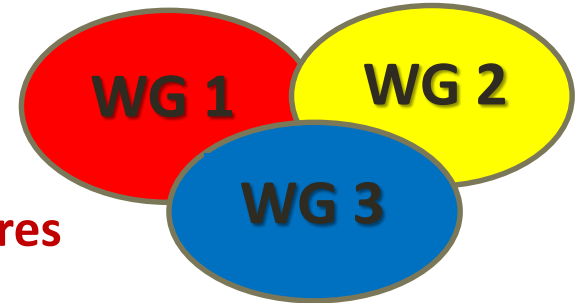
## Aims of the Course

- To provide an overview of occupational hazards including how to classify, manage and assess risk.
- To understand the basic framework of risk assessment in the EU.
- To establish occupational hazards relevant to agriculture and the current prevention and protection measures within the agriculture sector.

## How?

**7 Case Study, with three items each:**

- ✓ **Hazard identification**
- ✓ **Risk evaluation**
- ✓ **Design of preventive and protective measures**



# New challenges on EU labour market (I)

- Population decline, shrinking working-age population and an ageing population;
- Workforce ageing is a long-term trend:
  - 19% of the EU-28 population was older than 65 years in 2016; by 2080, around 29% of the “EU-28” population will be over 65 years;
  - From 2005 to 2015, the employment rate of older workers increased by more than 13% in EU-28, reaching 55% in 2016;
- The increasing of the population dynamics: immigration, continuous migration flows, internal and external to the EU;

# New challenges on EU labour market (II)

- EU economy structure is changing: less industry, more service sector;
- Work equipment and technology are changing: robots, IT devices, modern working tools, micro/nanotechnologies etc.;
- New working rhythms;
- Employment practices are changing: temporary employment (fixed-term, project- or task-based contracts, seasonal/casual work);
- New and emerging risks such as work-related psychosocial risks (work-related stress, violence at work, harassment, bullying etc.).

# EU approach to health and safety at work

- ❑ **Framework Directive 89/391/EEC** provides a common prevention structure for all EU workers, employers, workplaces, hazards;
- ❑ **OSH Specific Directives:** work equipment, work environment, specific hazards, specific workers groups;
- ❑ **OSH legislation is important, but not only instrument to prevention:** strategic objectives, effective enforcement, awareness raising, training, information, technical support etc.;
- ❑ **Risk assessment** carried out by the employer, not by external services.

# OSH in numbers

- Every year in EU more than 4000 workers die due to accidents at work and more than three million workers are victims of a serious accident at work leading to an absence from work of more than three days.
- 24.2 % of workers consider that their health and safety is at risk because of their work, and 25 % declared that work had a mainly negative effect on their health.
- In addition to human suffering, the costs due to work-related sick leave are unacceptably high. In Germany, 460 million days' sick-leave per year resulted in an estimated loss of productivity of 3.1 % of GDP.
- Costs for social security attributable to sickness or accidents are also unacceptably high (i.e . 2010/11 fiscal year, the net cost to government in the UK alone was estimated at £ 2381 million).

**HEALTH AND SAFETY AT WORK IN THE EU STILL NEEDS FURTHER IMPROVEMENT!**

# Framework Directive 89/391/EEC

- Employer has primary duty *“to ensure the safety and health of workers in every aspect related to the work”*;  
**He/She can delegate tasks but not responsibility!**
- Requirement **to evaluate the risks to the safety and health of workers** (in the choice of work equipment, the chemical substances or preparations used, the fitting-out of work places etc.);
- Requirement to take **the measures necessary for the safety and health protection of workers**, including prevention of occupational risks, provision of information and training, provision of the necessary organization and means;
- Requirement **to consult workers and/or their representatives** and allow them to take part in discussions on all questions relating to safety and health at work;
- Requirement **to cooperate in implementing OSH provisions** with other employers (in case of sharing a workplace) and coordinate their actions in matters of the protection and prevention of occupational risks (contractors, temporary workers etc.).

# Prevention principles\* – Hierarchy of control

- ✓ Avoid risks;
- ✓ Evaluate the risks that cannot be avoided;
- ✓ Combat risks at source;
- ✓ Adapt the work to the individual;
- ✓ Adapt to technical progress;
- ✓ Substitute the dangerous for the less dangerous;
- ✓ Have an overall coherent prevention policy;
- ✓ Give priority to collective protective measures over individual measures;
- ✓ Give appropriate instructions to the workers.

\*According to Framework Directive 89/391/EEC



# Employers' obligations\*

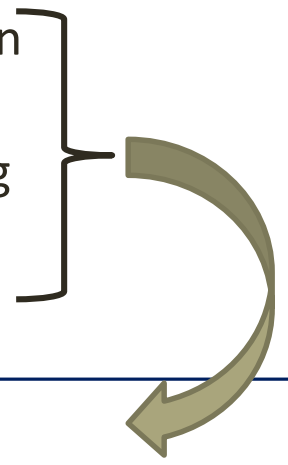
- ❑ **Elimination of risk and accident factors;**
- ❑ **Take the measures** necessary for the safety and health protection of workers, including prevention of occupational risks;
- ❑ **Evaluate the risks** to the safety and health of workers, inter alia in the choice of work equipment, the chemical substances or preparations used, and the fitting-out of work places;
- ❑ **Be in possession of an assessment of the risks** to safety and health at work, including those facing groups of workers exposed to particular risks.

\*According to Framework Directive 89/391/EEC

# OSH Specific Directives

OSH Specific Directives	OSH Specific Directives
89/654/EEC - workplace	93/103/EC - work on board fishing vessels
2009/104/EC - use of work equipment by workers	98/24/EC - chemical agents at work
89/656/EEC - personal protective equipment	1999/92/EC - explosive atmospheres
90/269/EEC - manual handling of loads	2002/44/EC - physical agents (vibration)
90/270/EEC - display screen equipment	2003/10/EC - physical agents (noise)
2004/37/EC - carcinogens or mutagens at work	2004/40/EC - physical agents (electromagnetic fields)
2000/54/EC - biological agents at work	2006/25/EC - physical agents (artificial optical radiation)
92/57/EEC - temporary or mobile construction sites	2009/148/EC - exposure to asbestos at work
92/58/EEC - safety and/or health signs at work	92/29/EEC - medical treatment on board vessels
92/85/EEC - pregnant workers and workers who have recently given birth or are breastfeeding	94/33/EC - protection of young people at work
92/91/EEC - mineral-extracting industries through drilling	91/383/EEC - improvements in OSH of workers with a fixed-duration employment relationship or a temporary employment relationship
92/104/EEC - surface and underground mineral-extracting industries	

# Key challenges of EU Strategy on OSH 2014-2020

- I. Enhancing the capacity of micro and small enterprises to put in place effective and efficient risk prevention measures;
  - II. Improving the prevention of work-related diseases by tackling existing, new and emerging risks;
  - III. Tackling demographic change.
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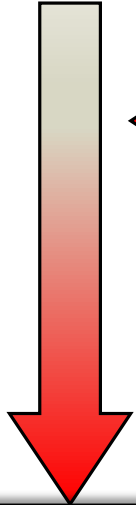
## **7 STRATEGIC OBJECTIVES**

- Further consolidate national strategies;
- Facilitate compliance with OSH legislation, particularly by micro/small enterprises;
- Better enforcement of OSH legislation;
- Simplify existing legislation;
- Address the ageing of the workforce, emerging new risks, prevention of work-related and occupational diseases;
- Improve statistical data collection and develop the information base;
- Better coordinate EU and international efforts to address OSH.

# Hazard, Risk factors and Risks

**HAZARD**

Anything that has the potential to cause harm



**RISK FACTORS**

Factors that increase or reduce the likelihood of the hazard causing harm and the severity of the consequences

**RISK**

The chance, high or low, that somebody may be harmed by the hazard

# What is risk assessment?

- **A systematic approach to identifying and controlling hazards:**
  - Identifying the elements of an activity that can cause harm;
  - Evaluating the risks arising from those hazards;
  - Introducing measures that will reduce the risk of injury to an acceptable level;
- **A risk assessment does not necessarily eliminate all hazards**
  - The aim is to reduce the risk of injury to as low a level as possible.

**There are many different models/methods of risk assessment!**

EU-OSHA Risk  
Assessment model



# Practical guidelines on risk assessment

- ✓ A risk assessment is to identify how to protect workers and then put in place the necessary measures;
- ✓ RA should be structured to ensure that all relevant hazards and risks are addressed (e.g. not overlooking secondary tasks, such as cleaning)
- ✓ RA must cover all workers, including those exposed to particular risks;
- ✓ When a risk is identified, RA should begin from first prevention principles, by questioning whether the risk can be eliminated;
- ✓ It is essential that employees are consulted and involved in the process because they know their workplace and are the ones who will have to implement any changes in working conditions/ practices;

# Step 1. Identify the hazards and those at risk

- Look and listen at *all* the workplace(s);
- Talk to those doing the job;
- Find out about *all* the work processes: production line, maintenance and cleaning, delivery and “off-site” activities;
- Check the records (accidents at work/occupational diseases/absenteeism);
- Read relevant literature:
  - ❖ Guidance from labour inspectorates;
  - ❖ Trade literature;
  - ❖ Health and safety websites;
  - ❖ Machinery instructions and chemical data sheets.



# Workplace hazards

- **Environmental hazards:** lighting, ventilation, height etc.
- **Equipment hazards:** maintenance, operation, storage etc.
- **People hazards:** training, numbers, supervision etc.
- **Material hazards:** chemicals, gases, waste products etc.

**Visit the workplaces to see what could cause harm!**

For each hazard identified ask:

1. Who/which groups of people could be harmed?
2. How do these people interact with hazards?
3. How might they be harmed?

**Consider ALL workers**, including staff with disabilities, young and old workers, pregnant women and nursing mothers, untrained or inexperienced staff, maintenance workers/ shift workers etc.

# Exposure to hazards

## ➤ By task

- Production
- Maintenance
- Cleaning

## ➤ By contract

- Employed
- Part-time
- Contractors
- The public

## ➤ By shift

- Day shift
- Night shift
- Teleworkers

## ➤ By personal capabilities

- Young workers
- New workers
- Pregnant workers
- Nursing mothers
- Workers with disabilities
- Older workers

# Step. 2 Evaluate and prioritise the risks

## Questions to consider:

- What existing measures are in place?
  - Are they adequate?
- How likely it is that a hazard will cause harm?
  - What is the chance of someone being harmed?
- How serious that harm is likely to be?
  - Taking into account potential for long-term harm
- How often (and how many) workers are exposed?
  - One worker at risk? Or many?

# Prioritising the risks

	<b>Slightly Harmful / few exposed 1</b>	<b>Moderately Harmful / some exposed 2</b>	<b>Very Harmful / many exposed 3</b>
<b>Very Unlikely 1</b>	<b>Trivial 1</b>	<b>Tolerable 2</b>	<b>Moderate 3</b>
<b>Unlikely 2</b>	<b>Tolerable 2</b>	<b>Moderate 4</b>	<b>Substantial 6</b>
<b>Likely 3</b>	<b>Moderate 3</b>	<b>Substantial 6</b>	<b>Intolerable 9</b>

# Prioritising the risks

**This is a matter of judgement, and the most difficult part of the risk assessment!**

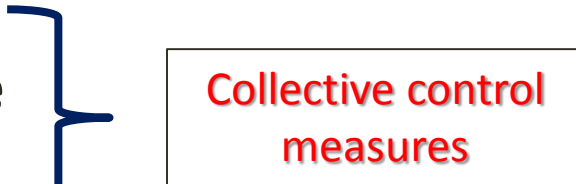
Factors to consider:

- Acute (short-term) harm v. Chronic (long-term) harm;
- Low frequency/high consequence v. High frequency/lower consequence;
- High risk for few v. Lower risk for many;
- Quick and easy solutions first v. Investment in most serious issues.

# Step 3. Decide on preventive action

➤ Hierarchy of prevention:

1. Elimination
2. Substitution
3. Combat risks at the source
4. Engineering controls
5. Organisational controls
6. Personal protective equipment



Collective control  
measures

- All preventive actions require training and supervision;
- Training alone will not provide prevention.

**Collective preventive measures should be prioritised of individual measures!**

# Step 3. Decide on preventive action

- Treat the source not the symptom;
- Solutions should not create new hazards or risks;
- Sources of information:
  - Labour inspectorate;
  - Employer organisations/sector bodies;
  - Worker organisations;
  - International organisations.

**“Off-the-shelf” solutions do not exist, interventions have to be adapted to the unique needs of the workplace!**

# Step 4. Take action

- ✓ Effective implementation involves effective planning;
- ✓ Have a prevention and protection Plan:
  - Who does what, when, where, and how (and how much);
- ✓ Employers are responsible for putting preventive measures in place
  - Workers should be included from the planning stage.

**BOTH Management Leadership and Worker Participation  
are important for workplace health and safety!**



# Step 5. Monitor and review the situation

- ❑ Monitor performance of preventive measures;
  - What gets measured gets done;
  - Monitor the work system (people, equipment, task, environment);
- ❑ Risk Assessments need to be reviewed:
  - When significant changes occur;
  - When evidence that assessment is incorrect (e.g. after accident);
  - When existing preventive measures not effective;
  - Regularly check that findings are still relevant.

# Reviewing - documentation

- Proportionate recording of risk assessment is essential;
- Information from the risk assessment will need to be shared to workers, other employers, inspectorates;
- What to record?
  - ✓ Who did the assessment;
  - ✓ What they found: hazards, risks, those facing particular risks;
  - ✓ The action plan;
  - ✓ Who has been informed and involved: worker representatives, other employers.

# Risk assessment documentation

## Why do we need to document risk assessments?

- Passing information to the persons concerned: workers, managers, subcontractors, inspectors;
- Assessing whether necessary measures have been introduced;
- Producing evidence for supervisory authorities;
- Revising measures if circumstances change.

## What information should be recorded?

- ✓ Name and function of the person(s) carrying out the examination;
- ✓ The hazards and risks identified;
- ✓ Groups of workers facing particular risks;
- ✓ An estimation/evaluation of the risks;
- ✓ The necessary preventive and protective measures;
- ✓ Responsibility for the introduction of the measures;
- ✓ Details of the involvement of workers and their representatives.

# OiRA – Online interactive Risk Assessment

OiRA = a web platform by EU-OSHA that enables the creation of sectoral risk assessment tools in any language in a standardised way.

OiRA sectoral tools:

- Enable micro and small enterprises to carry out risk assessments;
- Are free to download and can be easily accessed by clicking on the relevant link;
- Are accompanied by a short description and the name of the OiRA partner who developed it.
- Can be searched by country, language and sector.

<https://oiraproject.eu>

# Examples of OiRA tools

**EU level:** 12 OiRA tools (cleaning, hairdressing, leather and tanning, 2 on live performances-productions, 2 on live performances-venues, maritime transport, private security, 3 on sport sector);

**Bulgaria:** 38 OiRA tools (air transport, treatment of wastewater/sewerage, construction, courier services, crop and animal production, educational establishments, forestry, freight transport by road, HR, human health activities etc.);

**Grecia:** 7 OiRA tools (butchers, catering, commercial shops, hairdressing, laundry/dry cleaners sector, private security, working in offices);

**Ireland:** -

**Romania:** -

# Conclusion

- ✓ RA goal: **a safe and healthy workforce;**
- ✓ The risk assessment process is a means to an end, not an end in itself: **preventive and protective measures;**
- ✓ The RA should be **proportionate to the dangers** in the workplace;
- ✓ Failing to **properly identify and assess the hazards and risks** puts people at risk;
- ✓ **Action Plan with measures must be implemented**, based on the risk assessment.

Questions?