

Towards Sustainable and Green Transportation and Logistics - continuing vocational training for logistics companies

Transportation and logistics have an essential role in the green transition, particularly in reaching the goals of climate change mitigation. Emissions of transport sector are about 22% of all GHG emissions of EU, and biggest share of emissions (71%) comes from road transportation. Transport is also the only sector, where the GHG emissions are higher now than in 1990 (+25%). So urgent actions are needed also in promoting the skills for low emission, sustainable transportation.

Savo Consortium for Education will organize continuous training for personnel of transportation and logistics SME's, both drivers and clerks ("office workers"). Aim of the trainings is to provide green skills for the participants and to promote the green transition on the company level.

Trainings will be organised mainly online and they also include assignments to be done on the job. Funding for the training is provided by The Service Centre for Continuous Learning and Employment (SECLE), that promotes the competence development of working-age people and the availability of skilled labour.

Before planning on the training contents, we asked about the green skills requirements both from transport companies and their clients that buy transport services. For the training we have also gathered a steering and guidance group of experts from transportation sector. Their task is to bring the aspects and needs of working life to the planning and implementation of the continuous training.

From green skills to green transition

Below is presented the green skills and contents of the training:

Green Skills, learning objectives	Contents of the training programme
To anticipate the changes in operational environment and prepare for the future	Overview to the low emission future of transportation <ul style="list-style-type: none"> • Technology • Legislation and other regulation • Low carbon roadmaps and commitments of the transportation sector
To understand, calculate and report carbon footprint of a company and/or a transport service	The GHG emissions of road transportation <ul style="list-style-type: none"> • Tools for calculating the carbon footprint • Reporting and communicating the carbon footprint to the clients • Identifying the means to minimize the carbon footprint
To cooperate with the clients in lowering the emissions and improving resource efficiency of transportation	<ul style="list-style-type: none"> • Different ways to improve the resource efficiency of transportation, their impact on emissions and in costs • How to set the price for different actions and e.g. clients flexibility/choices • Communication with the clients, environmental communication
To know the alternative low emission technologies in professional road transportation	Field trip to company/companies that use e.g. gas, electric or other alternative technology in professional transportation

In the table below is presented, what kind of changes the training aims to promote on company level:

Green Skill of the participant	Change on the company level practices
To anticipate the changes in operational environment and prepare for the future	Proactive management, anticipating the changes in decision making (e.g. investments, recruitments, skills development)
To understand, calculate and report carbon footprint of a company and/or a transport service	Calculating, reporting and monitoring (+ minimizing) the carbon footprint of the company and/or transportation services provided
To cooperate with the clients in lowering the emissions and improving resource efficiency of transportation	Active communication and co-operation with clients to improve the resource efficiency and minimize the emissions
To know the alternative low emission technologies in professional road	Understanding and adopting alternative low emission technologies in road transportation

How does the training meet the Green Competences?

The contents and the learning objectives were defined mainly based on answers from working life. But if we scrutinise the contents from the perspective of Green Comp, how well do they meet?

First of the four green competences is embodying sustainability values, which includes valuing sustainability, supporting fairness and promoting nature.

In the continuous training this competence can be included in the introduction part, day one. While presenting the situation on climate change and the predictions of the future impacts, there is a good opportunity to discuss also about the fairness of the situation, while the least emitting countries are mostly affected by the impacts of climate change.

Green competencies	
1. Embodying sustainability values	1.1 Valuing sustainability
	1.2 Supporting fairness
	1.3 Promoting nature
2. Embracing complexity in sustainability	2.1 Systems thinking
	2.2 Critical thinking
	2.3 Problem framing
3. Envisioning sustainable future	3.1 Futures literacy
	3.2 Adaptability
	3.3 Exploratory thinking
4. Acting for sustainability	4.1 Political agency
	4.2 Collective action
	4.3 Individual initiative

The second competence, embracing complexity in sustainability, is very strongly included in the training programme. As the transportation and logistics is considered from many different perspectives: regulation, technology, economy and co-operation with customers. As students apply all these aspects simultaneously in their own companies/working places, they will need to understand systems, assess information critically, compare different aspects and find suitable solutions for sustainability problems.

The training very strongly aims to improve the third green competence – envisioning sustainable future. The future of logistics and transport is viewed from many different aspects, e.g. development of technology, regulation and customer needs. One of the assignments for the participants is to make a future plan or scenario for their own company: how do these different aspects effect on the company and how can these changes be anticipated on a company level in e.g. investments and other decisions.

Fourth of the green competences is acting for sustainability. The training aims to improve also these competences, particularly competences of collective action. One of the goals of the training is to learn and encourage co-operation with the clients to lower the emissions of transportation.

As a conclusion: green competences provide a good framework also for continuous training for people in working life. But the green competences must be concretized enough on practical level examples for each industry in order to be comprehensible and relevant for the target group.