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FutureDRV Profile

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FutureDRV:
EQF compatible core profile
for a future professional driver (freight and passenger) under level 4 of automation



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Developed by the FutureDRV project consortium
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Purpose and structure of the FutureDRV profile

The European profile “FutureDRV” (freight/passenger transport) based on learning outcomes gives an update and insight into professional drivers’ competence requirements until the year 2035 and beyond. Besides the time dimension it takes level 4 of automated driving as a reference to define knowledge, skills and competences in this professional field. The profile aims to enhance the future employability of professional drivers which is driven by massively changing qualification requirements reflecting developments in the context of technology, automation, ICT or new forms of learning. All having an enormous impact on the job profile of future professional drivers. In any case a well-qualified future workforce requires a joint effort and the engagement of different groups of stakeholders. Therefore the FutureDRV profile not only addresses a single set of competences/measures, but focusses on the professional driver profession and its future development as a whole.¹

The learning areas and work tasks described in the FutureDRV profile are not defined as qualification units in the framework of curricula. They do not reflect the driver “CPC”, the Europe-wide mandatory initial qualification for professional drivers, either. In contrast, the FutureDRV profile is far more comprehensive than the requirements of the European directive 2003/59/EC and tries to describe not only the minimum requirements on future professional drivers, but the whole set of competences potentially needed in order to perform the tasks of a professional driver competently in the upcoming future.

In order to serve different purposes the FutureDRV profile has been defined by differentiating between

- **“entry requirements”** that reflect the absolute minimum of competences expected of professional drivers, also in a future of automated and autonomous driving, and
- **“core requirements”** which equate to a proficient qualification profile to fulfil the entire range of future competence needs to be expected from a professional in the field of professional driving.

This split into entry and core requirements reflects the results of the FutureDRV research that led to the definition of extreme scenarios describing potential future developments of the professional driver profession².

Entry requirements can be considered as those requirements needed in order to ensure a minimum of safety by drivers accompanying otherwise autonomously driving trucks and buses. They can, however, not be considered as sufficient in order to perform all potential tasks of a professional driver competently and do not reflect that also in the future there will remain driving situations that cannot be automated, but need to be performed by well-skilled drivers. That’s why the profile also describes core requirements that should

¹ In addition to the Future Driver profile, “FutureDRV Learning Solutions” and “FutureDRV Recommendations” were formulated addressing different stakeholders with suggestions how to prepare professional drivers for their future. A “FutureDRV TIMELINE” was developed as well, putting a time dimension to upcoming changes.

² The “Entry Requirements” and the “Core Requirements” are based on the research activities of the FutureDRV project (c.f. IO1 report “FutureDRV Background Information on Research Activities and the 4 FutureDRV Scenarios”. You can find this report in the FutureDRV website download section <https://www.project-futuredrv.eu/index.php?id=5> (available as of August 2019).

be added on top of the entry requirements according to the actual tasks to be performed by a concrete (group of) drivers in the future. In this way, the profile allows for the specification of function-specific profiles defining, for instance, not only a more service-oriented truck driver transporting primarily goods to end users or a bus driver driving a tourist bus on long distances and providing also additional services to passengers, but also a comprehensive professional driver profile to be used, for instance, for national qualification schemes. Sub-competence areas can be considered as training modules. See figure 1 to see how those profiles could look. A digital version of the FutureDRV profile is available on the FutureDRV website www.project-futuredrv.eu. Please get in touch with the FutureDRV project consortium if you want to specify a concrete profile based on the FutureDRV profile.

The profile is divided into “Work Tasks” that reflect job-specific competences while “Transversal Work Tasks” reflect competences that are necessary for and affect all tasks/work processes. The following areas have been defined:

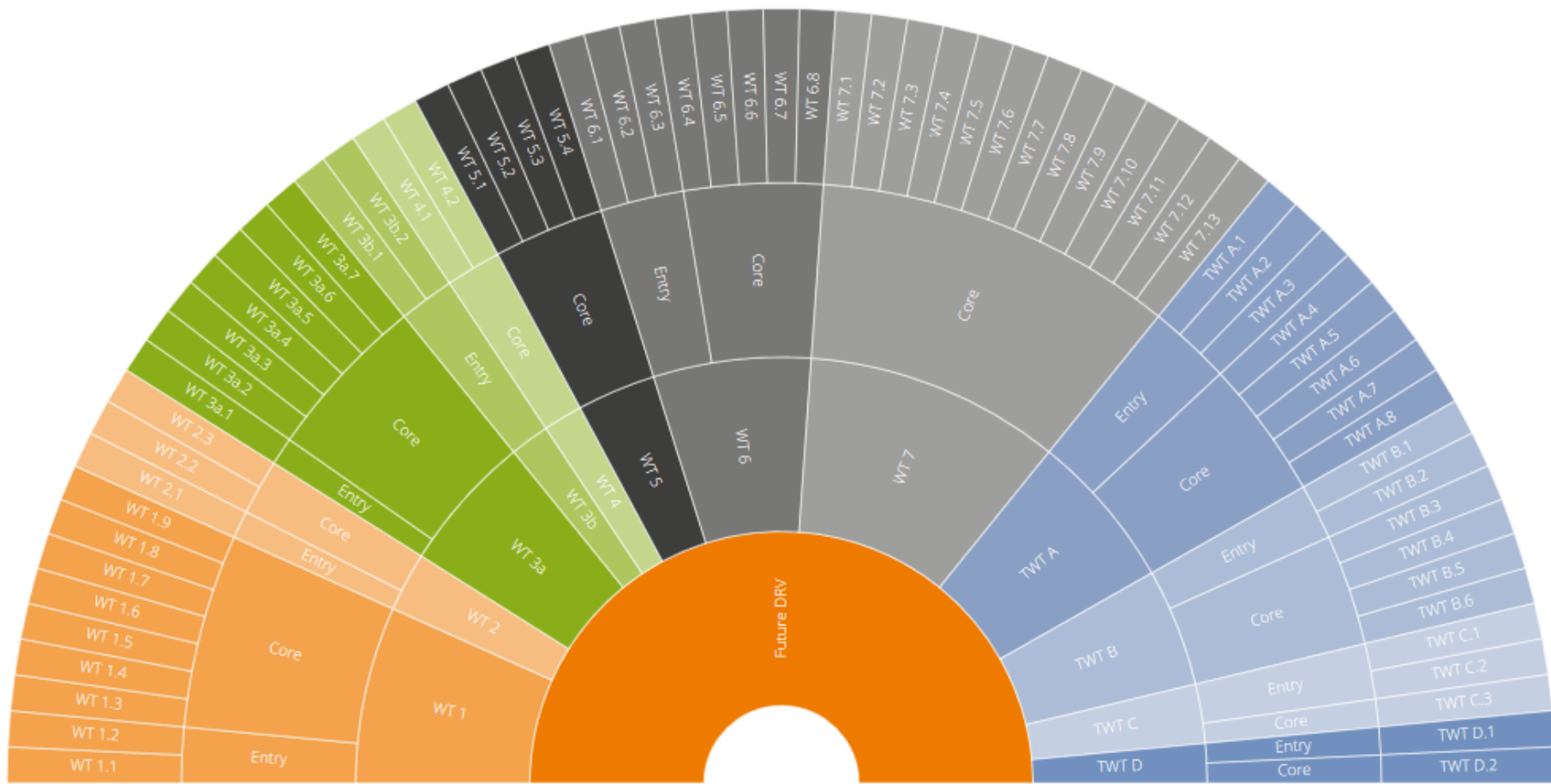
Work Tasks

- WT 1) Monitoring and manoeuvring the vehicle
- WT 2) Performing pre-departure tasks
- WT 3a) Loading and unloading
- WT 3b) Passenger Safety
- WT 4) Planning driving times and routes
- WT 5) Maintenance of vehicle and vehicle combinations
- WT 6) Digitalised and automated work records
- WT 7) Specialisations

Transversal Work Tasks

- TWT A) Customer relations
- TWT B) Cooperation with supervisors, colleagues, authorities and the public
- TWT C) Occupational health and safety and a healthy lifestyle
- TWT D) Continuous vocational education and training

Further specifications of these tasks/ work processes are strongly dependent on the kind of service accomplished by the driver and its embedding into the overall logistics chain. These specifications have not been further elaborated in the framework of this profile, but can be subject to a more concrete set of professional requirements depending on a drivers' concrete tasks and responsibilities. (See also figure 1 on how those specifications can be displayed in the profile.)



click center to zoom back

Figure 1: Visualisation of requirement profiles on the FutureDRV profile

Intention of the FutureDRV profile

The FutureDRV profile intends to support the European professional driving sector in diverse ways:

- It aspires to become a major reference on future skill needs within professional driving within the upcoming 15 to 20 years because it presents a vision of the future professional driver profession considering megatrends, trends and innovations.
- It intends to ensure the employability of professional drivers by making sure that transition processes are facilitated with appropriate VET measures in time (e.g. up-to-date VET programmes, new HR strategies, shifts in legal or organisational frameworks).
- It can be used to show future perspectives of the recruitment process and of career decisions of professional drivers.
- It provides a valuable planning tool for employers, social partners, training providers, authorities, policy makers, etc. at meso and macro level. At meso level, employers will have tools at hand to lay grounds for a forward-looking HRD³ strategy related to professional driving. Similarly, VET providers will be able to plan ahead of time to provide the industry with well-suited training programmes for a professional driver workforce. At macro level, public authorities and social partners are supported in their decision making processes when revising occupational standards or legally required qualification requirements within professional driving.⁴
- It promotes and contributes to the further practical application of the EQFs learning outcomes (LO) approach and ECVET principles by exclusively applying the LO approach in order to facilitate the validation of continuous training within professional driving as an integral part of workers' learning biography.
- It ensures the comparability and transparency of additionally awarded professional driver certificates such as the formal VET programmes for professional drivers in France, Germany or Austria.
- It can have an impact on existing and future legislation on professional driver qualification such as EC Directive 2003/59, but also related fields such as the legal frameworks of ADR training (e.g. revision of existing regulations with regard to changing qualification requirements, but also new learning approaches such as digital learning).
- It makes a major contribution to the realisation of common qualification standards for professional drivers across Europe, as aspired by Directive 2003/59/EC and related European initiatives.

³ Human Resources Development.

⁴ Combined with all the other FutureDRV project outcomes (e.g. Learning Solutions, Recommendations, Timeline).

Profile development

The enclosed “FutureDRV profile (freight/passenger transport)” has been developed in the framework of the European project *FutureDRV*. The profile is based on an analysis of the actual tasks a future driver will need to perform under level 4 of automated driving in order to act competently in the workplace. This analysis was built on the results of an exploration of trends and innovations and their impact on professional driver qualification requirements (e.g. social, technological, economical, ecological, political and learning-related trends) carried out by desk-based research, literature research, interview scenarios (expert Delphi) with transport experts and validation loops within the project consortium and additional experts in the field. Furthermore, existing and evolving VET solutions with a focus on innovative elements were explored in order to identify trends within professional driver qualification. Another source for the development of the new profile were the project results of former Erasmus+ projects within professional driving⁵.

The results of the exploration phase led to the development of scenarios on the future role and tasks of professional drivers (freight and passenger transport). These scenarios were evaluated by several online surveys with national and international transport experts (e.g. training providers, employers, stakeholder organisations, social partners, scientists).⁶ Together with subject matter experts, all analysed results were converted by the FutureDRV consortium into a profile that fulfils the requirements of the European Qualification Framework. This means the profile is – in order to ensure cross-border transparency and comparability – based on a description of abilities future drivers need in order to implement their tasks competently. Those abilities are described in the learning outcomes in terms of the EQF categories “knowledge”, “skills” and “competences”:

- “*Knowledge*” means the outcome of the assimilation of information through learning. Knowledge is the body of facts, principles, theories and practices that is related to a field of work or study. In the context of the European Qualifications Framework, knowledge is described as theoretical and/or factual.
- “*Skills*” means the ability to apply knowledge and use know-how to complete tasks and solve problems. In the context of the European Qualifications Framework, skills are described as cognitive (involving the use of logical, intuitive and creative thinking) or practical (involving manual dexterity and the use of methods, materials, tools and instruments).
- “*Competence*” means the proven ability to use knowledge, skills and personal, social and/or methodological abilities in work or study situations and in professional and personal development. In the context of the European Qualifications Framework, competence is described in terms of responsibility and autonomy. Sometimes it is pointed out to be the decisive factor in the process of referencing qualifications to a qualification frameworks level.

*We thank all those who have been involved in the development of this profile
for their contributions and commitment!*

⁵ For example the Erasmus+ projects “ProfDRV”: www.project-profdrv.eu and “ICT-DRV”: www.project-icdrv.eu.

⁶ You can find further information on the analyses carried out on the FutureDRV project website <https://www.project-futuredrv.eu/index.php?id=5>.



EQF compatible core profile:

IO1 FutureDRV PROFILE

(as of 19 August 2019)

Work Tasks

- WT 1) Monitoring and manoeuvring the vehicle
- WT 2) Performing pre-departure tasks
- WT 3a) Loading and unloading
- WT 3b) Passenger Safety
- WT 4) Planning driving times and routes
- WT 5) Maintenance of vehicle and vehicle combinations
- WT 6) Digitalised and automated work records
- WT 7) Specialisations

Transversal Work Tasks

- TWT A) Customer relations
- TWT B) Cooperation with supervisors, colleagues, authorities and the public
- TWT C) Occupational health and safety and a healthy lifestyle
- TWT D) Continuous vocational education and training



Work Task 1: Monitoring and manoeuvring the vehicle

(The following learning outcomes have been prepared under the assumption that regular driving license training is further developed according to the technical developments in the context of autonomous driving and postulates those as a pre-requirement to the ones listed here that are considered additional professional competences in this field necessary to implement commercial transports.)

Entry requirements

WT 1.1 Monitoring a vehicle on the road

The driver is able to:

- name national legal regulations with regard to road traffic
- describe professional drivers' special responsibility within road traffic
- differentiate and describe vehicle's technologies (e.g. vehicle systems interacting with traffic office route information, touchscreen computer/terminal, basics in cloud computing)
- differentiate and explain the information given by the various on-board systems and screens
- explain different kinds of situations in which it might be necessary to take control of the vehicle
- explain the functioning of the autonomous driving system (e.g. braking and steering behaviour, reaction to different traffic situations, reaction timing)
- explain the capabilities of the autonomous driving system (e.g. braking in dangerous situations, recognition of surrounding traffic)

The driver is able to:

- use vehicle technologies such as on-board vehicle computers and interpret information given by the various systems and screens
- reboot the vehicle, if necessary, in the event of a problem
- take control of the vehicle, if and when required, in order to manoeuvre the vehicle to a safe side position in case of system failure
- interpret reactions of the autonomous driving system and assess interference necessity (e.g. deviating braking behaviour compared to human driver)
- trust into the autonomous driving system
- handle the autonomous driving system with regard to system settings and parameters (e.g. economical driving mode), if applicable

The driver considers valid national laws as well as company-internal regulations when monitoring the vehicle on the road. He/she is able to use vehicle technologies and interprets information provided by these systems.

He/she is aware of different kinds of situations that might require him/her to take control of the vehicle and manoeuvre it to a safe side position in case of system failure.

WT 1.2 Behaviour after/during accidents and emergency situations on the road (entry level)

The driver is able to:

- describe und differentiate different kinds of accident and emergency situations as well as their risk potential and appropriate behaviour within such situations
- describe digital tools available to provide support in emergency situations (e.g. apps, bots)
- describe basic principles for safeguarding accident/ emergency areas
- name and describe basic principles for own safety in accident and emergency situations
- differentiate and describe dangerous situations that result from accidents and emergency situations and describe appropriate preventive measures
- name necessary information that needs to be forwarded to professional helpers at their arrival
- name documentation duties and relevant background information
- describe functioning of automatic emergency systems available in the truck and other vehicles

The driver is able to:

- evaluate emergency and accident situations and implement necessary steps, if applicable, under use of digital tools
- apply first aid in emergency and accident situations on the road, if applicable, using digital tools such as augmented reality support
- coordinate and becalm involved and concerned people
- anticipate dangerous situations and take preventive measures
- keep a professional attitude and behaviour also in difficult and stressful situations
- handle support provided by automatic emergency systems available in the truck and other vehicles

The driver autonomously and self-dependently initiates necessary steps in order to deal with accidents and emergency situations on the road. He/she considers a safety perspective and ensures his/her own safety. This includes among others calling the police and, if applicable, further rescue workers, giving first aid, safeguarding the place of accident/ emergency and the initiation of damage reducing measures.

Core requirements

WT 1.3 Adapting driving to different kinds of weather, road and traffic situations

The professional driver is able to:

- describe the characteristics of different loads and their effects on the vehicle

The professional is able to:

The professional driver is able to drive self-dependently and autonomously when extreme conditions occur and

<ul style="list-style-type: none"> • describe effects of weight with different kinds of points of gravity on drivability of the vehicle • differentiate and describe drivability of different kinds of vehicles • name and explain assistance systems to assess weather, road and traffic situations and their influence on driving behaviour of the autonomous vehicle 	<ul style="list-style-type: none"> • drive different kinds of vehicles safely under different extreme conditions without use of assistant systems of the automated driving system • make use of available assistant systems in the vehicle to handle extreme weather, road or traffic situations (e.g. ESP) • resume control of the vehicle, if the automated system is not reacting to extreme conditions as required • demonstrate situational awareness 	<p>resume control of the vehicle, if the automated system is not reacting as required.</p>
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WT 1.4 Monitoring of the vehicle with regard to the safe transport of different kinds of loads (truck)

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • describe the characteristics of different kinds of loads and their effects on the vehicle • describe the effects of loads with different kinds of points of gravity on drivability of the vehicle combination • explain drivability of different kinds of vehicles • name and explain assistant systems related to the load and load security (e.g. data provided by electronic lashing belt) 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • drive different kinds of vehicles safely with different kinds of loads with and without the automated driving system • interpret data provided by load-related assistant systems, assess reaction of the automated system and react accordingly • demonstrate situational awareness 	<p>The professional driver drives different kinds of vehicles self-dependently and autonomously under extreme conditions, if necessary. He/she applies his/her knowledge and skills in the area of driving physics and safe driving under extreme driving conditions, if required.</p>
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WT 1.5 Adapting driving in order to ensure passenger safety and comfort (bus)

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • explain the characteristics of the position of passengers within the vehicle (e.g. standing / seated, etc.) • explain the carriage of passengers taking into account the specific nature of different groups of passengers (e.g. children, people with disabilities) and their safety and comfort • name and explain assistant systems related to passenger safety 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • drive with different groups of passengers safely under different traffic conditions and resume control of the vehicle if the automated system is not reacting as required • drive the vehicle safely in different traffic situations under consideration of passenger safety and comfort without support of the automated driving system under consideration of related driving strategies (e.g. gentle braking, reducing centrifugal forces) 	<p>The professional driver drives considering different characteristics of the position of passengers and different groups of passengers and resumes control of the vehicle under extreme conditions, if required, and is applying his/ her knowledge and skills in the area of driving physics and safe driving under extreme driving conditions, if the automated system is not reacting as required.</p>
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<ul style="list-style-type: none"> • name and explain driving strategies relevant for passenger safety and comfort 	<ul style="list-style-type: none"> • make use of available assistant systems in the vehicle to handle extreme weather, road or traffic situations • interpret data provided by related assistant systems, assess reaction of the automated system and react accordingly • demonstrate situational awareness 	
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WT 1.6 Behaviour after/during accidents and emergency situations on the road (core level)

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • name legal requirements on steps and measures within accident and emergency situations • describe effects of different kinds of accident and emergency situations on road safety as well as economical effects • describe the necessity and possibilities of damage-reducing measures • explain de-escalation and becalming strategies • name necessary information and documentation for insurances and other bodies 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • document accident situations, if necessary, for insurance and further purposes, if applicable, through digital devices, apps, etc. • solve problems and make decisions 	<p>The professional driver autonomously and self-dependently initiates necessary steps in order to deal with accidents and emergency situations on the road according to legal requirements. He/she considers a safety and economic perspective and ensures his/her own safety (this includes calling the police and, if applicable, further rescue workers, giving first aid, safeguarding the place of accident/ emergency and the initiation of damage-reducing measures). He/she takes on a coordinating role and, if applicable, leads other involved people until the arrival of further rescue workers and/or police.</p>
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WT 1.7 Use of driving safety equipment and tools

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • describe available special equipment and tools such as snow chains and their operation • name (legal) regulations to be applied when using safety equipment 	<p>The professional is able to:</p> <ul style="list-style-type: none"> • operate special equipment effectively and safely • evaluate if special equipment needs to be used • apply (legal) regulations when using safety equipment 	<p>The professional driver autonomously and self-dependently assesses if special safety equipment is necessary for driving the vehicle, if applicable, under consultation with supervisors, and if this was not recognised by the automated system. He/she operates this special equipment effectively and safely.</p>
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WT 1.8 Implementing driving manoeuvres in special traffic situations (truck)

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • name and describe different kinds of driving manoeuvres in special traffic situations (e.g. construction sites, etc.) and how to implement them • name and describe assistant systems in order to handle special traffic situations (e.g. remote control of the truck, communication with other digital systems such as ramp) • name and describe use of infrastructure systems such as digital codes or light barriers 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • implement driving manoeuvres competently in special traffic situations, if necessary • handle assistant systems to cope with special traffic situations competently • recognise digital infrastructure systems supporting, for instance, automated loading/unloading and position the truck accordingly 	<p>The professional driver can implement different types of driving manoeuvres such as backing the vehicle against a platform, shunting, coupling/uncoupling of different trailers and semi-trailers, parking autonomously, backing up swap-bodies, if necessary, considering relevant safety measures.</p> <p>If necessary (e.g. on ferries, construction sites), he/she works together with other people like flagmen.</p>
<p>WT 1.9 Implementing driving manoeuvres in special traffic situations (bus)</p>		
<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • explain different kinds of driving manoeuvres in special traffic situations (e.g. manoeuvring around tight bends, narrow streets, steep hills etc.) and their correct implementation • name and describe assistant systems in order to handle special traffic situations (e.g. remote control of the bus, communication with other digital systems such as bus terminals) 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • implement driving manoeuvres competently in special traffic situations, handle assistant systems to cope with special traffic situations competently 	<p>The professional driver implements different kinds of driving manoeuvres (such as manoeuvring around tight bends, narrow streets, steep hills etc.) confidently and under consideration of relevant safety measures.</p> <p>If necessary (e.g. on ferries, at bus terminals), he/she works together with other people like flagmen.</p>



Work Task 2: Performing pre-departure tasks

Entry requirements

WT 2.1 Work with GPS, toll and other kinds of digital devices

The driver is able to:

- name legal regulations with regard to the application of GPS, toll devices, tachographs and other ICT devices inside the vehicle
- explain the available ICT devices on board and how to use them efficiently for his/her work
- name what devices are needed in different situations and the related (legal) regulations
- name possible errors of different kinds of ICT devices and describe how to react to them

The driver is able to:

- use standard ICT devices (GPS, toll devices, on-board computers, etc.) properly and, if applicable, handle related errors

The driver autonomously and self-dependently operates available and necessary ICT technology such as GPS, toll devices and tachographs. He/she applies relevant legal regulations and implements them practically.

Core requirements

WT 2.2 Implementation of pre-departure checks

The professional driver is able to:

- name the checks necessary prior to departure
- explain how to conduct different relevant checks, if applicable, under use of digital devices and tools

The professional driver is able to:

- implement relevant departure checks on different vehicles and vehicle combinations, if applicable, under use of digital tools/ devices

The professional driver autonomously and self-dependently implements regular departure checks on his/her vehicle/ vehicle combination in order to ensure vehicle, transport and road safety.

<ul style="list-style-type: none"> • explain how the different vehicle systems (car2car communication, assistance systems) work and recognise inconsistencies when corrections have to be made • describe what measures have to be implemented for different kinds of necessary corrections • explain occupational health and safety measures that need to be complied with during departure checks (e.g. wearing protection gloves) • explain usage of personal protective equipment (PPE) during departure checks • name and explain digital tools (e.g. apps, telematic system, AR applications, bots) supporting the departure checks' implementation 	<ul style="list-style-type: none"> • recognise inconsistencies in what the system reports • conduct diagnostic checks (react to diverse warning signals) • control the appearance of the vehicle (with regard to cleanliness), if applicable, under use of digital tools/ devices • assess the check results and choose possible necessary correction measures, if applicable, under use of relevant apps or bots • implement necessary occupational health and safety measures during departure checks and, if applicable, correction measures • handle different kinds of digital support systems and devices during departure check and for recording of the departure check (e.g. measuring systems, apps, AR applications) 	
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WT 2.3 Takeover of a vehicle or a vehicle combination

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • name what needs to be checked when taking over a vehicle or a vehicle combination • describe in which conditions a vehicle/ vehicle combination has to be in order to be safe • describe what he/she can do in order to assure safety • name and differentiate whom to inform about difficulties, if necessary • describe how to record the takeover of a vehicle or a vehicle combination • name what information needs to be received and/or handed over during takeover of a vehicle/ vehicle combination 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • implement all necessary checks and assess the results, if applicable, under use of digital tools/ devices • communicate defects to the appropriate contact person • make a digital record of the takeover of a vehicle or a vehicle combination • effectively communicate and cooperate with colleagues involved in the takeover 	<p>The professional driver implements the takeover autonomously and self-dependently, if applicable, together with another person involved in the takeover. He/she especially checks the vehicle's safety and, if applicable, load security in order to ensure vehicle, transport, and road safety.</p> <p>If necessary, he/she initiates necessary finishing works, maintenance activities or other necessary steps or implements them him/herself. He/she makes decisions considering professional drivers' responsibility in road traffic and shows professional behaviour and integrity.</p>
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<ul style="list-style-type: none">• explain about the use of personal protective equipment (PPE) during takeover and takeover checks• name and explain digital tools (e.g. apps, telematic system, AR applications, bots) supporting the takeover		
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Work Task 3a: Loading and unloading (incl. prior and subsequent tasks) (truck)

Entry requirements

WT 3a.1 Handling of pre-loaded load carriers and related automated systems

The driver is able to:

- describe functioning of handover and takeback mechanisms in automated warehouse systems and related processes
- show and explain relevant warnings and indicators regarding basic load parameters (e.g. axle weights, application of load security, locks)

The driver is able to:

- handle handover and takeback systems in the truck and, if applicable, in warehouses
- interpret load related warnings and indicators and react accordingly
- handle handover processes within automated warehouse

The driver handles initiation of loading/ unloading in automated warehousing systems and hubs, handover and takeback of the truck/ load carrier and checks basic parameters regarding load and transport safety autonomously and self-dependently.

Core requirements

WT 3a.2 Loading and unloading of different kinds of transported goods

The professional driver is able to:

- describe physical essentials for driving with load
- describe purpose and specification of a load plan
- describe (legal) regulations/ provisions with regard to loading and unloading in general and with regard to related responsibilities
- describe (legal) regulations/ provisions with regard to the use of different devices used during loading and unloading

The professional driver is able to:

- check that different kinds of goods are roadworthy and secured for transport on the vehicle under consideration of axle load limits and gross vehicle weight
- control whether the automated load is correctly distributed and secured, spread and, if necessary, calculate a load plan

The professional driver carries out loading/unloading autonomously and self-dependently. He/she uses and applies necessary tools and utilities (e.g. steering equipment, automated systems). He/she takes care for a safe and damage-free loading/unloading process and fulfills economic, legal and company specific requirements with regard to the loading/unloading of goods. If applicable, he/she supervises other workers

<ul style="list-style-type: none"> • name common labels/ markings and their meaning on transported goods and/or where to receive (further) relevant information about goods • describe basic communication rules with regard to supervising other people • distinguish ADR labelling of goods and relevant expected quantity • name rules/ prohibitions on mixed loading • describe software applications for creating a load distribution plan • describe automated (un)loading processes, systems and facilities 	<ul style="list-style-type: none"> • use different utilities such as (automated or remote controlled) forklifts, hand lifts, etc. • check and assess loading done by others or automatically • work with and supervise others during loading and unloading • solve problems and make decisions • advise the customer in packing / loading of goods • obtain axle load data from systems installed in the vehicle • create a load distribution plan using software application • handle different kinds of automated warehousing and (un)loading systems as well as related transport equipment and (infra)structures • handle digital information systems and devices supporting loading and unloading processes and timing 	<p>and/or automated systems during loading and unloading of the own vehicle.</p>
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WT 3a.3 Load security

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • describe physical essentials for driving with loads • describe common load security methods, their physical basis and their application • describe major load security tools and devices, e.g. webbings, friction mats, corner protectors, digital tools, etc., their characteristics, specifications, limitations and application as well as equipment to protect loads • name existing standards on load security tools • describe legal requirements and responsibilities with regard to load security • describe formulas and the calculation of necessary load security measures for different circumstances and tools • describe purpose and specification of a load distribution plan 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • assess/check the usability of load security tools and devices • assess/check, if load is secured adequately with (digital) tools and utilities for transport • assess different kinds of automated loads for transport on the loading compartment • prepare a load security plan by using digital tools • read digital vehicle documents in order to receive information on axel loads and further vehicle specifications • demonstrate thoroughness, consciousness of law and attention to detail and work methodically • exercise initiative and resourcefulness • solve problems and make decisions 	<p>The professional driver is able to secure different kinds of cargo autonomously and self-dependently considering related physical essentials, legal requirements and transport safety. He/she applies/uses different utilities, (e.g. tension belts, non-slip mats, pallets) and digital devices to decide autonomously about the necessary load security for specific goods. He/she checks autonomously the capability of available load security tools/utilities and, if necessary, initiates steps for their replacement and shows professional conduct and behaviour.</p>
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<ul style="list-style-type: none"> • describe measurement and calculation maths • describe software applications for calculating the required lashing equipment • describe possibilities for checking the lashing forces applied to the lashing means 	<ul style="list-style-type: none"> • obtain axle load data from systems installed in the vehicle • obtain information on the applied lashing force from electronic displays on lashing equipment 	
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WT 3a.4 Preparation and recording of loading and unloading

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • describe different ways/methods of recording loads and what criteria they have to meet/what information they need to contain • describe relevant legal regulations • describe the criteria a vehicle has to meet before loading different kinds of goods • describe software applications for creating and reading freight documents 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • read and interpret digital loading instructions/transport documents with regard to loading and unloading orders, times, kinds and weights of goods, expected quantities and to plan loading and unloading accordingly • check and, if necessary, optimise different kinds of goods in terms of quantity and judge the correctness of information provided on transport documents • handle possible procedures with regard to damage to the load (incl. information of appropriate persons, documentation) • prepare a vehicle for automated loading of different kinds of goods • demonstrate thoroughness, consciousness of law and attention to detail and work methodically • exercise initiative and resourcefulness • use software to create and read shipping documents 	<p>The professional driver plans and records loading/unloading self-dependently and autonomously and, if applicable, in cooperation with supervisors and clients.</p> <p>He/ she pays special attention to completeness and correctness of goods and records, restrictions with regard to combinations of goods, general transport restrictions, loading and unloading sequence and he/ she records possible damages and special characteristics.</p>
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WT 3a.5 Safety during loading and unloading

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • name dangerous situations during loading and unloading • name measures to prevent dangerous situations • list steps to be implemented after accidents 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • use personal protective equipment properly • supervise procedures and measures to prevent dangerous situations 	<p>The professional driver implements preventive health and safety measures during loading/unloading autonomously and self-dependently. He/she pays special attention to his/her own safety.</p>
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<ul style="list-style-type: none"> • list occupational health and safety regulations during loading and unloading • describe the use of personal protective equipment during loading and unloading • describe first aid measures during accidents related to loading and unloading 	<ul style="list-style-type: none"> • implement first aid measures • supervise and work together with other people 	<p>He/she initiates necessary measures and/or contributes to smooth safety measures in case of an accident or danger during loading/unloading.</p>
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WT 3a.6 Supervise and advise on weight and dimensional restrictions and related requirements on vehicle and load

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • name general legal regulations and restrictions with regard to weight and dimensional restrictions • describe weight and dimensional specifications that require special permits and markings • name ADR-relevant quantities • describe various types of digital transport records and authorisations • measurement/ calculation maths 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • check weight and dimension restrictions of his/her vehicle also with regard to legal regulations • communicate efficiently with supervisors • understand digital transport documents/authorisations and compare them with his/her own vehicle/ vehicle combination • read and understand legal and official records and texts • solve problems and make decisions 	<p>The professional driver checks if the load complies with weight and dimensional restrictions of the vehicle and if the vehicle (combination) fulfills the load requirements. He/she, if necessary, consults with supervisors and checks the availability, completeness and correctness of necessary transport records.</p> <p>He/she decides on the compliance of his/her vehicle with the load requirements considering his/her responsibility within road traffic and shows professional behaviour as well as integrity.</p>
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WT 3a.7 Treatment of transported goods during transport

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • describe different kinds of transported goods and, if applicable, their special demands during the transport process • describe how to communicate and cooperate with other people effectively • list various communication media relevant for work 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • identify goods with special requirements and advise on their loading process • supervise necessary measures in order to professionally transport goods with special requirements • properly hand over relevant information to other people, if necessary 	<p>During the entire transport, the professional driver treats the transported goods carefully and ensures their professional transportation. If applicable, he/she works together with supervisors/clients in order to ensure the necessary transport measures.</p>
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<ul style="list-style-type: none"> • describe possible measures that can be taken in order to protect, for instance, especially valuable goods • name common labels/markings and their meaning on transported goods and/or where to receive (further) relevant information for the treatment of goods during the transport process 	<ul style="list-style-type: none"> • communicate with other people via different communication media 	
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Work Task 3b: Passenger safety (bus)

Entry requirements

WT 3b.1 Passenger safety and safe transport of baggage

The driver is able to:

- designate safety-related vehicle systems for passenger service and related digital assistant systems
- name safety-relevant equipment in the vehicle (e.g. fire extinguisher, emergency exit, emergency hammer)
- designate legal regulations within the framework of passenger transport (e.g. compulsory use of seat belts)
- identify possibilities of baggage transport and their security
- identify parking facilities and restrictions for prams, wheelchairs, bicycles, etc.
- designate and explain safety instructions for passengers

The driver is able to:

- operate safety-relevant systems
- operate systems increasing passenger comfort
- assess and apply the functional capability of safety-relevant equipment on the vehicle
- safely stow and secure various types of baggage in the designated means of transport.
- safely stow and secure prams, wheelchairs, bicycles, etc. at the designated parking and transport places.
- instruct, assist or carry out the safe stowage of hand luggage in the passenger compartment, taking into account emergency exits, stairways, etc.
- explain safety instructions and instruct passengers to apply them

The driver is able to ensure safety of passengers at all stages of their trip with the bus/coach. He/she is able to safely stow and secure passengers' belongings in the bus/coach and related vehicles.

WT 3b.2 Handling passenger rights

The driver is able to:

- name legal regulations on passenger service

The driver is able to:

- apply and explain legal regulations with regard to passenger rights

The driver is able to conduct passenger service according to relevant passenger rights and act accordingly.

Core requirements

None



Work Task 4: Planning driving times and routes

Entry requirements

None

Core requirements

WT 4.1 Planning of and compliance with driving times/rest periods based on relevant legal regulations and the specifications of the transport order

The professional driver is able to:

- describe legal regulations for driving times and rest periods
- list driving times and major driving bans for major routes and necessary time reserves
- describe major road networks in his/her country (incl. urban areas, rush hours, topography, weak spots in the road network, major restrictions)
- list cases in which transports require special driving times (incl. legal restrictions)
- describe different possibilities of calculating driving times

The professional driver is able to:

- plan driving times, driving sequences and rest periods considering influencing aspects, e.g. rush hours, opening hours at clients', following transport orders' and passenger transport orders' assigned time windows
- practically apply legal regulations for driving times and rest periods
- estimate/calculate regular driving times from any starting point to any destination in his/her country
- compare routes based on needed driving time
- read restrictions on driving times from special authorisations
- communicate with supervisors and clients about time needs
- explain his/her planning/decisions to supervisors and manage time

The professional driver self-dependently and autonomously plans and, if applicable, consults the timely implementation of the transport order with supervisors and/or clients. He/she considers legal requirements on driving times/rest periods, possible driving bans, requirements of transport orders and route specifications. During the tour, he/she consequently applies relevant legal regulations, considers his/her responsibility in road traffic and shows professional behaviour as well as integrity. He/she checks the availability of all necessary transport records/authorisations and, if necessary, adapts the time planning consulting with supervisors.

	<ul style="list-style-type: none"> • solve problems and make decisions • calculate travel times using various calculation programs 	
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WT 4.2 Planning of routes considering economic and environmental aspects as well as transport specifications

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • list possible authorisations (customs and transport law) and where they are needed • describe effects of route planning on economical, environmental and safety aspects as well as on use of resources • describe factors to be considered within route planning and cases in which transports/ passenger transport require special routes (incl. legal restrictions and safety considerations) • describe special requirements on routes (e.g. custom controls, excursion routes) • describe effects of topography, traffic density and other aspects on the use of resources • describe major road networks in his/her own and neighbouring countries incl. urban areas, rush hours, topography, weak spots in the road network, major restrictions • show location of major towns and routes between major industrial areas • name information sources about gas station and charging station networks in his/her own country • describe different digital tools and applications supporting route planning 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • read (digital) maps • plan and follow routes according to map/ routing programme • use route planning technology within route planning • plan and compare routes based on economical, environmental and safety (load, passenger and own safety) aspects and under consideration of the transport / passenger transport order • take location of charging stations and charging time into consideration for route planning • estimate and/or calculate distance and driving times • check the availability of all necessary papers and authorisations for different routes • read route specifications from special authorisations • argue his/her planning/ decision towards supervisors • read legal and official documents and records • solve problems and make decisions • extract available travel times from various terminal devices • use digital tools in order to make booking such as of charging stations or parkings 	<p>The professional driver plans self-dependently and autonomously, if applicable, consulting supervisors and/or clients his/her transport route under consideration of economical, environmental and legal aspects as well as the transports special requirements.</p> <p>He/she checks the availability of necessary records and authorisations for the chosen route and the transport order and adjusts the route, if necessary, under consideration with supervisors accordingly.</p>
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<ul style="list-style-type: none">• describe different applications used within booking processes such as booking of charging stations, parkings• describe various terminal devices to determine available travel times		
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Work Task 5: Maintenance of vehicle and vehicle combinations

Entry requirements

None

Core requirements

WT 5.1 Regular checks of vehicle/ vehicle combination and identification of defects

The professional driver is able to:

- list warning systems and describe their meaning
- explain the processes and responsibilities applicable with regard to maintenance
- describe the basic functions of a power train and suspension linkages
- name and explain different warnings and indicators related to maintenance aspects in the vehicle
- name and explain digital maintenance support systems (e.g. apps, telematics systems)

The professional driver is able to:

- implement small maintenance tasks on the vehicle (e.g. windscreen cleaning fluids)
- read and understand relevant diagnostic information and recognise its consequences
- assess, read and understand check results and choose appropriate measures and supervise/optimize decisions by the automatic system
- understand different warnings and indicators related to maintenance in the vehicle and react accordingly
- decide what maintenance activities can be performed by himself/herself and when
- make use of digital maintenance support systems (e.g. apps, bots, telematics systems)

The professional driver autonomously and self-dependently reacts to maintenance warnings and indicators accordingly.

He/she acts under special consideration of his/her responsibility in road traffic and shows integrity.

WT 5.2 Communication with help desk and preparation of damage reports

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • list and explain professional terminology and technical background to professionally and efficiently communicate defects and damages to the relevant persons • list necessary information that needs to be reported in case of damage/defect and differentiate according to recipient • explain functioning and requirements of bots used in communication with help desks etc. • explain digital tools used in order to record defects and damages • list channels used in order to communicate with other relevant entities about the vehicle 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • prepare a record of defects and damages for the relevant entities (e.g. service provider, help desk, police, insurance) • communicate information about the vehicle and its condition through different channels (such as direct communication, written/ voice recorded, bots) 	<p>The professional driver self-dependently and autonomously provides the relevant entities, if applicable, with information about the vehicle's overall condition, existing defects/damages and about possible necessary repairs, checks and/or maintenance work.</p>
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WT 5.3 Vehicle cleaning and care

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • differentiate cleaning services for cleaning supplies for vehicle cleaning and different vehicle areas • differentiate different cleaning facilities such as pressure washer, truck wash, brushes, brooms, etc. • name quality standards with regard to cleaning facilities • describe effects of different kinds of cleaning supplies on different vehicle elements and on the environment • describe standards about cleanliness for safety & service-related safety and environmental protection requirements 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • decide about the usage of appropriate cleaning supplies for different areas of the vehicle • handle different cleaning facilities professionally and with care • clean different areas of the vehicle depending on its specific demands • dispose of residues appropriately • make bookings for cleaning facilities and services via digital devices 	<p>The professional driver takes care of the cleanliness of the vehicle/ vehicle combinations autonomously and self-dependently. He/she carries out usual cleaning works on the vehicle and initiates further necessary cleaning measures by consulting supervisors, if applicable. He/she pays special attention to environmental aspects.</p>
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WT 5.4 Fuelling and charging a vehicle

<p>The professional driver is able to:</p>	<p>The professional driver is able to:</p>	<p>The professional driver refuels/recharges the vehicle and, if applicable, the trailer autonomously and self-</p>
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<ul style="list-style-type: none"> • differentiate and describe different types of fuels and alternative energy sources, their specifications, their use and their impact on economic and environmental aspects • describe safety measures during refuelling/charging • explain the use of personal protection equipment (PPE) during refuelling/charging (e.g. gloves) • name branch specific and company-internal regulations regarding refuelling/charging vehicles/vehicle combinations • differentiate different tanks/charging ports and how they are used 	<ul style="list-style-type: none"> • refuel/charge his/her vehicle/ vehicle combination correctly, considering safety, ecological and economic considerations • choose the correct fuel and/or alternative power source for his/ her vehicle • choose the correct tank/plug • make bookings for fuelling and charging facilities via digital devices 	<p>dependently, considering company specific regulations and, if necessary, consults with supervisors. He/she pays attention to economic and environmental aspects.</p>
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Work Task 6: Digitalised and automated work records

Entry requirements

WT 6.1 Handling profession records

The driver is able to:

- list and differentiate the necessary vehicle records, company records and personal records

The driver is able to:

- recognise missing and/or wrong information on records (HQ)
- exercise initiative

The driver uses the necessary digital devices for vehicle, company and personal records required for monitoring the vehicle and recognises missing and/or wrong information.

WT 6.2 Controlling driving times and rest periods

The driver knows:

- list and differentiate different kinds of devices or systems to record driving times and rest periods
- describe procedures in case of errors on recording devices (LQ+HQ)
- name legal regulations with regard to recording duties and period
- describe handling of special situations with the recording device (e.g. change of vehicles, errors)
- name evidence such as certificates about absence from work
- describe how to calculate driving times and rest periods

The driver can:

- use devices/systems for recording driving times and rest periods
- check driving times and rest periods recorded by the devices/systems in order to detect and handle errors on recording device/system
- inform supervisors and takes care of an appropriate alternative documentation of his/her driving times and rest periods in case of errors

The driver uses available digital recording devices for recording his/her driving times and rest periods.

In case of errors on the recording device, he/ she informs supervisors and takes care of an appropriate alternative documentation of his/ her driving times and rest periods.

WT 6.3 Controlling daily work and record-keeping

<p>The driver is able to:</p> <ul style="list-style-type: none"> describe different kinds of records used by professional drivers (accident records, vehicle takeover records, etc.) and their usual content and data 	<p>The driver is able to:</p> <ul style="list-style-type: none"> work with different kinds of applied digital systems for record-keeping 	<p>The driver works with different types of applied digital systems for record-keeping and checks different types of records.</p>
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Core requirements

WT 6.4 Handling and forwarding of load records (truck)		
<p>The professional driver is able to:</p> <ul style="list-style-type: none"> name and differentiate records that are necessary for different kinds of loads (e.g. ADR) name and differentiate information that needs to be included in load records explain who receives what part of the load records name and describe tasks and the organisational structure of the business and internal processes 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> read and understand relevant information in load records recognise and obtain missing information by appropriate means of communication check load records in terms of completeness and correctness demonstrate organisational skills, thoroughness and attention to detail exercise initiative 	<p>The professional driver understands different records, extracts relevant information and decides which information needs to be forwarded to supervisors. He/she informs supervisors about missing or expiring papers in time and also initiates necessary steps for the renewal of personal papers in time.</p>
WT 6.5 Handling professional records		
<p>The professional driver is able to:</p> <ul style="list-style-type: none"> name how and where to obtain and maintain professional records name and differentiate necessary special authorisation records (e.g. special permissions for wide or heavy loads or process and information required in international passenger transfer) 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> read and understand the different records and extract relevant information decide which information (e.g. inspections, redoing periodic training) needs to be forwarded to supervisors apply for professional records at appropriate authorities and bodies 	<p>The professional driver understands different professional records, extracts relevant information and can decide which information needs to be forwarded to supervisors and/or what steps need to be taken for their renewal.</p>

	<ul style="list-style-type: none"> • demonstrate organisational skills, thoroughness and attention to detail 	
WT 6.6 Controlling daily work and record-keeping		
<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • explain widely recognised applications for appropriate record-keeping • name and describe organisational structures and internal processes with regard to the different records • describe the meaning and purpose of different kinds of record measurement and calculation maths • describe the fundamental parameters (e.g. driven distance, arrival/departure times, fuel consumption, etc.) used for record-keeping within professional driving 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • read, understand and check different kinds of (digital) records (e.g. at customer) • exercise initiative • demonstrate organisational skills, thoroughness and attention to detail • use digital tools and programmes for record-keeping 	<p>The professional driver self-dependently and autonomously prepares necessary (digital) records such as accident records, and together with the necessary information forwards them to supervisors.</p>
WT 6.7 Handling customs (truck)		
<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • name different customs necessary for different kinds of transports • describe contents of customs, their meanings and purpose • name consequences of missing customs papers • describe organisational structures and internal processes with regard to handling of customs • name and describe electronic applications, websites and other relevant tools relevant for handling customs 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • deal with customs declaration (offices and electronic systems) at customs borders • check if there are customs records and/or individual information missing for customs declaration • work together with supervisors in order to complete custom records, if applicable, using relevant digital devices and/or applications • demonstrate organisational skills, thoroughness and attention to detail • exercise initiative 	<p>The professional driver checks possible necessary customs papers with regard to completeness and correctness and informs supervisors about missing documents in order to initiate necessary steps.</p> <p>He/she implements necessary customs declarations on customs borders autonomously and self-dependently.</p>
WT 6.8 Handling border controls (bus)		

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • name different personal documents necessary for different cross-border passenger transports (e.g. within / outside the EU) • describe contents of personal documents, their meanings and purpose • name consequences of missing personal papers • describe organisational structures, processes and internal processes with regard to handling of cross-border passenger transport • name and describe border control and related (electronic) procedures and processes 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • deal with border control (offices and electronic systems) • check if there are personal records and/or individual information missing for cross-border passenger transport • demonstrate organisational skills, thoroughness and attention to detail • inform, instruct and support passengers in handling (electronic) border control processes and procedures • exercise initiative 	<p>The professional driver is able to check necessary personal records of passengers with regard to completeness and correctness for cross-border passenger transport and to initiate necessary steps in case of deviations.</p>
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Work Task 7: Specialisations⁷

Entry requirements

None

Core requirements

WT 7.1 Food transport

WT 7.2 Tank lorry transports

WT 7.3 Transport of living animals

WT 7.4 Log and long timber transport

WT 7.5 Transport of vehicles

WT 7.6 Heavy duty and oversize transports

WT 7.7 Bulk cargo transports

WT 7.8 Transports of dangerous goods

⁷ To be further explored and specified. Please find further information on this overview in the project ProfDRV project paper „Professional driving a heterogeneous field” available at www.project-profdrv.eu.

WT 7.9 Relocation and furniture transports

WT 7.10 Disposal transport

WT 7.11 School bus transport

WT 7.12 Other specialisations within freight transport

WT 7.13 Other specialisations within passenger transport



Transversal Work Task A: Customer relations

Entry requirements

TWT A.1 Communication and behaviour with customers (entry level)

The driver is able to:

- explain the standards of appearance for professional drivers
- explain the effects and the importance of conduct on overall cooperation with customers
- name and describe the (basic) professional terminology and concepts

The driver is able to:

- communicate effectively and professionally with customers
- assess his/her own appearance and adapt it accordingly, if necessary
- distinguish between confidential and regular information

The driver applies basic branch-specific communication standards, pays attention to a neat outward appearance and has a friendly behaviour. Furthermore, he/she shows the necessary confidentiality with regard to handling information about and from the client and his/her own company.

TWT A.2 Handling complaints and conflicts with customers (entry level)

The driver is able to:

- describe major reasons for complaints and conflicts with clients, how they come up and how to react to them
- name first signs of possible conflicts
- name escalation contacts in case of conflicts and complaints within regular transport/ logistics company structures

The driver is able to:

- communicate competently and professionally in cases of conflicts with or complaints from customers
- remain friendly and calm in cases of conflict
- efficiently and professionally communicate with customers
- differentiate what kind of information about conflicts and complaints needs to be forwarded to supervisors
- communicate effectively in national language of employer

The driver acts competently, customer-friendly and in conflicts and with complaints demonstrates a solution-oriented manner. He/she acts based on his/her professional competence as a skilled transport worker/bus driver.

TWT A.3 Customer service in busses/coaches (entry level)

<p>The driver is able to:</p> <ul style="list-style-type: none"> • name legal regulations in the context of passenger transport • explain occupational health and safety regulations with regard to working with passengers • name events that require the preparation of customer records and explain related records (e.g. confirmation of delays) • describe different kinds of assistance measures to support customers with special requirements during transport 	<p>The driver is able to:</p> <ul style="list-style-type: none"> • apply occupational health and safety regulations in the context of working with passengers • prepare different kinds of records relevant in the context of customer service (e.g. confirmation of delays) • recognise customers' need for special assistance • implement different kinds of assistance measures to support customers with special requirements during transport 	<p>The driver is able to autonomously and self-dependently provide basic services to customers related to safety, customer rights and special requirements.</p>
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Core requirements

TWT A.4 Communication and behaviour with customers (core level)		
<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • describe professional communication models and processes, if applicable, differentiated by different groups of customers (e.g. age groups) • describe organisational structures, internal processes, his/her own role and decision-making prerogatives • describe the relationship between the customer and the company • describe possible areas of sales for the company 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • express him/ herself in a professional and customer group (e.g. age groups) appropriate manner, under usage of his/ her professional expertise • apply communication models and processes such as active listening • explain technical and transport-specific aspects and discuss and explain options with regard to his/ her tasks within the transport process competently • recognise and make use of sales opportunities, e.g. present the company to a new client • solve problems and make decisions 	<p>The professional driver shows a professional and competent behaviour at the customers'. He/she acts autonomously and self-dependently within his/her decision-making framework. In coherence with company-specific regulations, he/she consults, if necessary, with supervisors. He/she identifies and makes use of opportunities to promote their own company as a potential business partner for clients/customers.</p>
TWT A.5 Handling complaints and conflicts with customers (core level)		

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • explain communication and behaviour rules as well as de-escalation strategies in case of conflicts and complaints • describe organisational structures, internal processes and their own role and decision-making framework between customer and their own company • describe problem-solving strategies 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • facilitate de-escalation of conflicts, if necessary • contribute to conflict and complaint management in a result-oriented manner • contribute actively to problem solving • practice active listening • demonstrate people skills, negotiate and persuade • solve problems and make decisions 	<p>The professional driver actively contributes to conflict management, resolution and/or de-escalation with his/her behaviour and with his/her implemented steps. If necessary, he/she consults with supervisors in order to solve a situation.</p>
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TWT A.6 Customer service (truck)

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • name legal regulations about work performed at the customers' • explain occupational health and safety regulations with regard to working with customers • describe different kinds of sales and delivery services provided in the context of transport orders • describe different kinds of transport records and, if applicable, digital tools and devices regularly used to prepare them 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • organise his/ her own and others' work • supervise other people, work under supervision and in a team with other people and provide support • effectively communicate with and instruct others, explain tasks and strategies to others • work with different kinds of equipment usually used by customers and/ or use technical equipment after short briefings • apply occupational health and safety regulations with regard to working with customers • work with different kinds of necessary transport records • apply digital tools and devices regularly used to prepare transport records • identify and effectively provide sales and delivery services to customers • contribute actively to problem solving 	<p>The professional driver works with clients self-dependently and autonomously, e.g. during loading/unloading, load security or necessary administrative tasks related to the transport order. He/she instructs the client, if necessary, and/or he/she provides support and works carefully with equipment provided by the customer. He/she provides special non-haulage services to clients, accordingly with company service offer.</p>
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TWT A.7 Customer service in busses/ coaches (core level)

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • describe different kinds of services (sales, touristic and support services) provided by bus companies • describe use of on-board/ digital devices and applications to handle purchase orders, payments, communication with service providers, bookings, etc. • describe use of digital sightseeing and entertainment devices used in coaches • describe regular passenger demands • describe different kinds of major tourist information alongside bus/coach routes • describe opportunities to market their own company during a coach trip • describe strategies and processes to handle customer requests on the trip • name (online) information resources on touristic and other service-related information • describe sales strategies related to passenger transport related (accompanying) services 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • support passengers in placing orders for subsequent or future trips (e.g. bus tickets, cabs) • use on-board/ digital devices and applications to handle passengers purchase orders and payments (e.g. tickets, catering, merchandising) • use on-board/ digital devices and applications to handle bookings (e.g. hotel, sightseeing, events) and orders related to the implemented transport order/ trip • communicate effectively with other service providers (e.g. tour guides, restaurants, taxi companies) in order to realise stations of a trip • handle digital sightseeing and entertainment devices to be used in the bus as part of service • provide (individual) special services and guidance to passengers according to the company service offers • present points of interest to passengers according to prepared touristic information • identify and make use of sales opportunities for the company • act as an ambassador of the company and promote the companies' image 	<p>The professional driver provides accompanying non-transport related and non-compulsory services such as touristic information and special product sales to clients, in accordance with company service offers.</p>
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TWT A.8 Attitude and conduct of the professional driver in public

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • explain standards of outward appearance for professional drivers and his/ her vehicle in public • explain the effects and importance of outward appearance on the profession's image • name and describe professional terminology and concepts 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • express him/ herself in a professional and friendly manner and under usage of his/her professional expertise • assess his/her own appearance and adapt it accordingly, if necessary • apply communication models and processes 	<p>In public, the professional driver acts as a skilled transport worker competently and professionally. He/she acts as a representative of his/ her company and of professional driving. He/she contributes in this way actively to the image of his/ her company and of the professional driver image in public. He/ she is able to</p>
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<ul style="list-style-type: none"> • explain the effects of negative appearance in public • explain communication standards • describe communication models and processes 	<ul style="list-style-type: none"> • explain technical and transport-specific aspects 	<p>apply communication models and processes and explain technical and transport-specific aspects.</p>
<p>TWT A.9 Continuous maintenance of customer relations in line with corporate policy</p>		
<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • describe possible customer satisfaction measures • describe the parameters of customer satisfaction • describe tasks and the organisational structure of business and internal processes 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • develop ideas on how to increase customer satisfaction • understand and implement customer requirements 	<p>The professional driver contributes actively to company-specific customer satisfaction measures. He/she implements the necessary measures within his/her work and contributes to the development of possible measures to increase customer satisfaction.</p>



Transversal Work Task B: Cooperation with supervisors, colleagues, authorities and the public

Entry requirements

TWT B.1 Behaviour during stop-and-search operations of authorities and with inspectors (entry level)

The driver is able to:

- list legal regulations with regard to stop-and-search operations
- describe necessary records and checks for/ within stop-and-search operations

The driver is able to:

- effectively communicate (e.g. by using language, technology or symbols)

The driver supports the work of different types of inspectors. He/she supports the performance of inspections and further operations and shows a professional and friendly attitude and behaviour.

TWT B.2 Behaviour in violent situations caused by others

The driver is able to:

- list risks of (cyber) violence related to professional driving
- describes emergency contacts, necessary steps in emergencies and information to be provided
- list routes and areas of high risk
- list loads that require special attention with regard to security
- list loads that require special attention with regard to security
- list indicators for cyber attacks related to the vehicle/ vehicle combination

The driver is able to:

- apply self-protection strategies when confronted with violent persons and situations
- apply de-escalation strategies
- apply preventive measures against (cyber) violence
- cope professionally and under special consideration of self-protective measures in violent situations and in cases of potential cyber attacks
- make decisions and show situative awareness
- apply de-escalation strategies
- estimate the risk potential of unknown situations and places with regard to physical and cyber risks

The driver acts defensively in violent situations caused by others, e.g. violent acts, robbery or kidnapping. He/she is able to identify indicators of cyber attacks and act responsibly. Furthermore, he/she contributes to the avoidance of such situations, e.g. by showing a cautious choice of parking spaces or apply cyber security measures.

<ul style="list-style-type: none"> • describe preventive measures and behaviour against (cyber) violence • describe de-escalation strategies and immediate actions 		
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Core requirements

TWT B.3 Cooperation with colleagues		
<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • explain basic communication principles • list professional terminology • list different areas of necessary confidentiality • describe tasks and the organisational structure of the business and of internal processes • describe necessary areas of confidentiality about the company • explain occupational health and safety regulations • describe strategies to communicate criticism and explain problem solving strategies • describe possible areas of sales and recruitment opportunities for the company 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • communicate effectively (e.g. by using language, technology or symbols) • show respect towards colleagues • apply occupational health and safety regulations on work of him/herself and others • maintain confidentiality • supervise, work under supervision and in a team with other people and provide support under supervision • instruct others in different work-related situations, e.g. loading/unloading • identify and make use of sales/ recruitment opportunities for the company • act as an ambassador of the company and promote the companies' image 	<p>The professional driver works self-dependently and autonomously with colleagues in different situations (e.g. loading and unloading, load security, passenger safety, passenger comfort) or during vehicle takeovers. He/she supervises colleagues in situations like loading and unloading, load security or during vehicle takeovers, works as a team and/ or provides support. He/she identifies and makes use of opportunities to promote their own company as a potential employer for other drivers and business partner for clients.</p>
TWT B.4 Cooperation with supervisors/employers		
<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • describe professional terminology and transport-related concepts 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • communicate effectively in the national language • speak in a clear and concise manner 	<p>The professional driver forwards all relevant information to supervisors additional to those related to the transport</p>

<ul style="list-style-type: none"> • list legal regulations related to transport and professional driving • list major aspects of labour law • describe organisational structures and processes in transport companies • explain problem-solving strategies • describe strategies to communicate criticism 	<ul style="list-style-type: none"> • discuss decisions professionally with supervisors • argue and discuss his/her decisions to/with supervisors/ employers • explain facts objectively and professionally • differentiate what information must be provided for supervisors/ employers and when • argue his/her own point of view self-confidently and professionally • contribute actively to problem solving • efficiently communicate criticism and suggestions • solve problems and make decisions 	<p>order and has a professional attitude towards criticism/problem solving.</p>
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TWT B.5 Behaviour during stop-and-search operations of authorities and with inspectors (core level)

<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • list legal regulations with regard to road transport • list professional terminology and concepts • describe general parameters of the transport and logistics/passenger branch • describe communication standards, models and processes • explain problem-solving and conflict management strategies • explain the effects and importance of outward appearance on social interaction 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • discuss official records and criticism professionally, self-confidently and courteously with inspectors • explain his/her own point of view self-confidently, courteously and professionally and politely communicate suggestions • explain facts objectively and professionally • contribute actively to problem solving • accept failure and related criticism professionally • demonstrate understanding of legislation and compliance 	<p>The professional driver works hand in hand with different types of inspectors. He/she supports the performance of inspections and further operations and shows a professional and friendly attitude and behaviour. The professional driver acts defensively when dealing with problems and takes the necessary steps for trying to solve them.</p>
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TWT B.6 Responsibility and behaviour of the professional driver towards the public

<p>The professional driver is able to:</p>	<p>The professional driver is able to:</p>	<p>The professional driver has a responsibility to the public. His/her professional conduct is therefore aimed at</p>
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<ul style="list-style-type: none"> • describe the effect of road transport on environment • name the relevant legal regulations • name ethical considerations and norms • describe the importance of his/ her work for road safety • describe effects of failures within his/ her work on road safety • name trends with regard to transport and energy 	<ul style="list-style-type: none"> • reflect his/her own behaviour based on his/her awareness of his/her role in society, the economy and the environment and integrate this attitude and responsibility into daily work 	<p>ensuring road safety and protecting the environment and transport infrastructure. He/she orientates his/her professional conduct towards the relevant legal regulations and ethical standards and acts responsibly towards public, superiors, employers, customers and other persons within the scope of his/her professionalism.</p>
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Transversal Work Task C: Occupational health & safety and a healthy lifestyle

Entry requirements

TWT C.1 Assessment of personal physical and mental state and, if necessary, initiation of appropriate measures

The driver is able to:

- describe symptoms of fatigue and stress and their effects
- describe measures for dealing with fatigue and stress
- describe measures for physical/mental preparation for the tour
- name rules and regulations with regard to drugs and alcohol
- describe the effects of drugs/alcohol on health and the ability to drive/ accompany autonomously driving vehicles
- describe the effects of illnesses/medication on the ability to drive/ accompany autonomously driving vehicles
- describe (digital) tools (integrated in the vehicle and others) for medical supervision of the personal fitness to drive/ accompany autonomously driving vehicles and their measures
- name possibilities for medical treatments (e.g. docstop) that are accessible for professional drivers on tour
- describe tasks and the organisational structure of the business and internal processes

The driver is able to:

- recognise indicators for his/her personal state of health (e.g. fatigue, pain, stress), if applicable, with help of (digital) tools
- deal with fatigue and stress and/ or initiate necessary measures
- prepare him/ herself mentally and physically for the tour
- recognise changing physical/mental situations, if applicable, with help of (digital) tools, and react appropriately
- handle (digital) tools for medical supervision of the personal fitness to drive and interpret provided data

The driver is able to assess his/her physical and mental condition, if applicable, under use of digital tools, and autonomously and self-dependently applies necessary measures in case of impairments. He/she informs and consults with the appropriate reference contact about impairments.

He/she makes decisions based on his/her responsibility in road traffic and shows professional behaviour and integrity.

TWT C.2 Compliance with occupational health and safety measures

<p>The driver is able to:</p> <ul style="list-style-type: none"> • explain requirements and regulations on occupational health and safety with regard to his/ her job • explain elements of personal protective equipment and its use • explain dangerous situations in his/ her job and their risk potential • explain possible risks of injuries and damages • describe measures to prevent risks • describe first aid measures 	<p>The driver is able to:</p> <ul style="list-style-type: none"> • apply measures to prevent risks • apply first aid measures • recognise dangerous situations • use personal protective equipment correctly • recognise deficits with regard to occupational health and safety 	<p>The driver recognises situations that require occupational health and safety measures and self-dependently applies appropriate measures. He/she raises the awareness for deficiencies and/or conspicuous features.</p>
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Core requirements

TWT C.3 Preventive measures to maintain physical and mental performance at work		
<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • describe risks that result from lack of exercise and a poor diet especially with regard to professional driving • describe physical fitness measures that can also be carried out under working conditions of professional drivers • name basics of a healthy diet and implementation possibilities under working conditions • describe reasons and possibilities for ensuring a good work-life-balance • describe reasons, possibilities and regulations for medical checks • list smart digital device with regard to personal health 	<p>The professional driver is able to:</p> <ul style="list-style-type: none"> • actively apply measures for physical/mental fitness and for a healthy diet besides his/her daily work • critically monitor his/her own diet and fitness, if applicable, under consultation of the appropriate competent persons, and, if applicable, initiate preventive and/or countermeasures • recognise in good time when medical examinations are required on the basis of legal regulations and a self-critical self-assessment • handle smart digital devices in the field of personal health (e.g. smart watches) 	<p>The professional driver is able to self-dependently and autonomously apply measures in order to prevent physical/mental impairments which are caused, for example, by poor nutrition or insufficient exercise.</p> <p>He/she shows a self-critical behaviour in this regard and shows initiative and creativity when applying appropriate measures.</p>



Transversal Work Task D: Continuous vocational education and training

Entry requirements

TWT D.1 Updating vocational knowledge, skills and competences according to legal requirements

The driver is able to:

- list legal requirements on continuous and further vocational education and training for professional drivers and related necessary proofs and certificates

The driver is able to:

- determine necessary continuous vocational education and training needs and requirements for the implementation of his/ her tasks

The driver takes care of updating his/ her vocational knowledge, skills and competences based on legal requirements.

Core requirements

TWT D.2 Taking advantage of learning opportunities provided within their own field of work

The professional driver is able to:

- explain the necessity and purpose of continuous and further vocational education and training for professional drivers
- identify formal continuous vocational education and training opportunities for professional drivers
- identify non-formal continuous vocational education and training opportunities for professional drivers
- describe strategies for self-regulated learning
- identify learning possibilities on the workplace

The professional driver is able to:

- differentiate and compare different kinds of learning opportunities and choose the appropriate one
- recognise and make use of non-formal learning opportunities and learning possibilities on the workplace
- apply strategies for self-regulated learning in the framework of different kinds of learning opportunities
- implement necessary steps to proof legally required continuous training proofs and certificates
- effective use of different technologies that foster learning

The professional driver autonomously and self-dependently takes care of updating his/ her vocational knowledge, skills and competences based on legal requirements and with regard to changes and innovations in and related to his/ her work area. He/she takes advantage of different kinds of learning and is able to select learning opportunities suiting his/her own learning preferences and opportunities.