Greece

# **Quality Assurance in Higher VET**

Presented on the examples of the ICT, the Electrician and the Automobile Repair qualification group

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**Quality Assurance in Higher Vocational Education and Training** 











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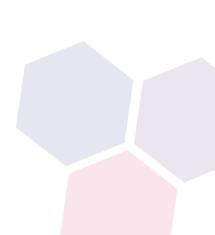
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# **Example 1: ICT qualification group**

The qualification group "ICT" in a nutshell:

Qualification awarding body	National Organisation for the Certification of Qualifications and Vocational Guidance (EOPPEP)
Legal basis	Law 2209/1992 on the National System of Vocational Education and Training & Law 4186/2013 on the Restructure of Secondary Education
NQF/ EQF level	NQF/ EQF Level 5
ISCED-2011	Post-secondary (non-tertiary) non-formal education ISCED 4
Qualification focus	Basic training on high-level technical qualification; acquisition of ICT/subject-specific knowledge, skills and entrepreneurial competences <sup>1</sup>
Entitlements	Setting up a company and training apprentices; holders can also be employed by companies/ enterprises/ organisations and the public sector

The "ICT" qualification group<sup>i</sup> is a rapidly growing field of transversal qualifications, related to all economic sectors and professions in Greece, hence one of the most popular qualification groups within the Greek initial vocational education and training ("IVET") system. It is highly relevant to labour market demands as it is provides specialised ICT technical/ subject-specific knowledge and skills, as well as rudimentary know-how on entrepreneurship. As a result of growing automation and productivity gains, demand for a higher level of ICT skills is expected to grow, whilst jobs requiring lower level of technical skills are expected to diminish. Consequently, there is a corresponding need to increase the quality and relevance of available ICT skills in the labour market.

ICT qualifications are classified at level 5 of the National and European Qualifications Framework. Notably, there are various ICT qualification specialties at level 5, such as: <u>Web Designer-Developer</u>, <u>Video Game Developer</u> and Technician (<u>Computer Systems</u>/ <u>Computer Networks</u>/ <u>Computer and Office Electronic Machines</u>/ <u>Telecommunications</u>/ <u>Internet</u>/ <u>Multimedia Applications</u>/ <u>IT Applications</u>). The main tasks/ functions of this qualification are the following: a) Use and technical support of ICT systems; b) Installation, maintenance and use of ICT software and networks; c) Development of multimedia applications; d) Upgrading and updating of software applications; e) Website development; f) User support; g) Systems and database administration.

In order to acquire this qualification candidates participate in accreditation examinations which lead to the attainment of a Vocational Training Diploma at Level 5. Prior to that, candidates must have successfully completed a four semester study programme of theoretical and laboratory training, and one semester of Internship or Apprenticeship. In Greece, no professional license is required for the ICT qualification group. Main providers of this post-secondary (non-tertiary) education, leading to ICT qualifications at level 5, are the public and private Vocational Training Institutes (IEK).

The presentation of the quality assurance (QA) mechanism below follows the **lifecycle of qualifica-tion**, i.e. from needs analysis to review of qualification. In order to structure the information herein, we use the four phases of the **European Quality Assurance Reference Framework (EQARF)**<sup>2</sup>:

Phase 1: planning Phase 2: implementation Phase 3: evaluation Phase 4: review

 <sup>&</sup>lt;sup>1</sup> Including the ability to supervise others, develop initiatives, collaborate/communicate effectively, operate according to professional ethics, etc.
 <sup>2</sup> EQARF is a reference instrument aimed at helping the Member States and VET providers promote and monitor

<sup>&</sup>lt;sup>2</sup> EQARF is a reference instrument aimed at helping the Member States and VET providers promote and monitor the continuous improvement of their VET systems and/or VET provision based on common European references (cf. <u>http://www.eqavet.eu/gns/policy-context/european-quality-assurance-reference-framework.aspx</u>).





### **1. PLANNING**

### **Needs analysis**

1. Labour market information: Do you collect data at this stage of the qualification development process? If so which data? How do you collect data? Who is in charge of collecting data? Are stakeholders involved? What are the roles of companies and of business organisations?	In view of assisting labour market accession, public and private Voca- tional Training Institutes ("IEK") in Greece, are tasked with providing high-level qualifications. This is achieved by a long qualification de- velopment process corresponding to specific job profiles <sup>3</sup> based on specialties with high labour market demand that reflect the needs of the economy and the proposals of stakeholders. The National Organ- isation for the Certification of Qualifications & Vocational Guidance <sup>4</sup> ("EOPPEP"), which accredits and licences all Vocational Education and Training ("VET") providers in Greece, is responsible for the de- velopment of job profiles, upon which the study programmes and the curricula are based. These job profiles are developed with the input of the stakeholders and are later certified by EOPPEP. The modera- tors of the relevant working-groups, set-up by the Education Ministry, are responsible for the research. Labour market information is col- lected via: a) Desk research (literature review, sectoral studies, voca- tional monographs, and data from stakeholders and the National Statistical Service); b) A variation of the expert-based "Delphi sur- veys" with semi-structured questionnaires; c) Interviews with profes- sionals in the ICT qualification group; d) Review/ feedback from rele- vant professional organizations of Employers and Employees. The whole process is developed after consultation with advisory commit- tees of experts, representatives of chambers, employers/ employees associations, etc. The major social partners that co-sign the National General Collective Agreement are highly involved in this phase, as their representatives sit on advisory committees and the board of EOPPEP.
<b>2. Justification</b> : Is it necessary to justify the introduction of a new programme/qualification or update an existing one? Who is in charge of the justification/ motivation report? Are stakeholders involved?	The job profiles related to the ICT qualification group are novel; thus, their introduction or update doesn't require any justification. By and large, EOPPEP is in charge of the justification report every six years, with the active contribution of the relevant stakeholders. It is included in the qualification report developed by EOPPEP, which describes the updating process.
3. Piloting / pre-testing: Is there a pilot stage before qualification is "formally" introduced? If so, who is involved in this phase? How is the qualification tested/ piloted/ evaluated? What does this pilot	No pilot stage and/ or pre-testing is foreseen when a new ICT qualifi- cation is formally introduced.

<sup>&</sup>lt;sup>3</sup> An occupational (or job) profile in Greece includes, inter alia, the definition of the job and/or speciality, background history, current legal framework, job functions and the required knowledge, skills and competencies for exercising the occupation or speciality, as well as proposed pathways for acquiring the qualification and indicative ways of accessing them.

<sup>&</sup>lt;sup>4</sup> EOPPEP is the national authority for the accreditation of VET and the certification of qualifications. It aims at linking VET with labour market needs, upgrading people's occupational qualifications and enhancing their employment perspectives. EOPPEP is also the statutory body for the development and implementation of the Hellenic Qualifications Framework (NQF) in alignment with the European Qualifications Framework (EQF). <u>http://www.eoppep.gr/index.php</u> /<u>en/eoppep-en</u>



phase involve? What consequences does it have?

### 2. IMPLEMENTATION

### 2.1 Design of new and updating of existing curricula and training regulations

2.1.1 Legal basis / competent authority: Who is responsible for the design of the curriculum/ training regulation? What exactly is legally regulated (examination areas, KSC standards, etc.)?	The detailed curricula of each ICT qualification specialty are devel- oped by the General Secretariat for Lifelong Learning (hereinafter referred to as the "GSLL") which also supervises their implementa- tion, and are later certified by EOPPEP. The GSLL is also responsi- ble for drawing up the training regulation and the Minister of Educa- tion for their approval. The training regulation concerns the following: the organisation of all aspects of education/training, internships/ ap- prenticeships, the quality assurance procedures/ criteria and the in- ternal/ external evaluation. Based on the training regulation per spe- cialty, EOPPEP is responsible for the training accreditation examina- tions and the certification of the Vocational Training Institutes (here- inafter referred to as "IEKs") graduates.
2.1.2 Standards for the process of designing curricular and training regulations: Are there standard procedures for the development of qualifications? Are there templates to be used?	The GSLL is responsible for the training curricula/regulation design process. Curricula are drawn up by GSLL taking into account any existing job profile and/or the required vocational standards, in accordance with the ECVET <sup>5</sup> guidelines. There are Curricular Templates and Training Regulation Templates for each specialty. The law specifies the standard procedures for designing curricula/ regulations in terms of: (a) All matters of organizing the students' education/training, i.e. study programmes, internships/ apprenticeships etc. (b) Quality assurance, i.e. responsible bodies, procedures, criteria; (c) Transparency of administrative/ teaching processes and decisions; (d) Processes of internal evaluation and improvement, formative/ student assessment (i.e. research and external evaluation). EOPPEP, within its competence of accrediting job profiles and curricula standards, is planning to develop standards/ specifications for modularised curricula with credits, based upon the accredited occupational profiles. These procedures are relatively new, thus they haven't been fully implemented yet.
2.1.3 Review and update of curricula: Are curricula regularly assessed	According to Greek law <sup>6</sup> , all curricula are to be regularly assessed, revised and updated, at least once every six years, by the GSLL and
and reviewed?	EOPPEP. This process is relatively new and given the challenge of restructuring the Greek VET system and improving its quality assur- ance, it has not been fully implemented yet (e.g. updating the learn- ing outcomes in the job profiles remains pending).
2.1.4 Involvement of key stake- holders:	The involvement and engagement of all key stakeholders is a matter of high priority in Greece. All major social partners, both from the

<sup>&</sup>lt;sup>5</sup> The European Credit System for Vocational Education and Training (ECVET) is a "technical framework for the transfer, recognition and, where appropriate, accumulation of individuals' learning outcomes with a view to achieving a qualification." More information at: <u>http://ec.europa.eu/education/policy/vocational-policy/ecvet\_en.htm</u>

<sup>&</sup>lt;sup>6</sup> Law 4186/2013 (Government Gazette 193/issue A'/17-9-2013): "Restructuring of Secondary Education and other regulations". It contains regulations regarding Upper Secondary Schools, Vocational Upper Secondary Schools, the National Organisation of Examinations, the organisation and operation of bodies in non-formal education, the certificates of vocational education and training and the professional rights, the organisation of the regional bodies of non-formal education of the Ministry of Education and Religious Affairs.





Are stakeholders (social partners, companies, sector organisations, pedagogical experts, VET providers, etc.) involved in the design of new / in the update of existing curricula/ training regulations?	Employers' and the Employees' side, in partnership with their scien- tific or/and VET centres, pedagogical experts and representatives of EOPPEP, the Ministry of Education and all the other competent au- thorities, are involved in the development of curricula for IVET qualifi- cation attainment. Furthermore, representatives of the social partners are regular members of the Governing Board of EOPPEP, which is the national organisation for the accreditation of VET and the certifi- cation of qualifications.
<b>2.1.5 Link to the labour market</b> : How is the curriculum linked to labour market needs? How is it guaranteed that the curriculum complies with labour market and company needs?	Relevance to labour market needs is assured via the involvement of labour market actors in the development of job profiles, based upon which the curricula are shaped, and via the emphasis on work-based training and compulsory apprenticeships/internships, and via regular updating of the curricula, as needed, and at least once every six years. The GSLL nominates experts and organises expert working groups for each specialty. These working groups review the curricu- lum with the active participation of the social partners and other rele- vant stakeholders. Furthermore, in response to the skill matching challenge, the Ministry of Education is establishing a new system for early identification of labour market needs and skill demands, in which the social partners will play an important advisory role.
2.1.6 Application of learning outcome concept: Are LOs used in curricula/ training regulations? How are they defined? Which domains of learning are used? Who is involved in the definition and what role do they have? Who is involved in the design of curricula/training regulations? How is the cooperation coordinated?	In an effort to upgrade VET provision, by increasing transparency and strengthening accountability of qualifications, all new and/or updated vocational education and training curricula, are to be designed based on Learning Outcomes (LOs). A methodology <sup>7</sup> was developed in 2006 for analysing job profiles (in functions) by incorporating the LO approach, which lead to 202 detailed job profiles based on learning outcomes, as of yet. LOs are used also when describing qualifications in the national qualification levels (classified in knowledge, skills and competencies) <sup>8</sup> , new curricula, and/ or when designing assessment approaches.
2.1.7 Information in curricula and training regulations: What information is provided in curricula/training regulations (e.g. title, duration, entry requirements, learning contents, costs, etc.)?	The ICT qualification curricula and training regulation are illustrated in the respective 'study guide' per specialty. Each study guide includes a distinct job profile, matching of specialties with vocational classifica- tions, a detailed curriculum, the LOs expressed as knowledge, skills and competencies for each subject, a timetable for the teaching ma- terials in line with the LOs, information on credits, costs, duration of study and teacher qualification, instructions for teachers/ trainers on knowledge assessment, teaching methods and learning tools, as well as specifications for the exams and the assessment of knowledge and guidelines for the certification of the LOs.

<sup>&</sup>lt;sup>7</sup> Ministerial Decree 110998/19-04-2006 (Gazette 566/B'/02-05-2006) "On the Accreditation of Occupational Profiles"

<sup>&</sup>lt;sup>8</sup> EOPPEP has developed a methodology for designing LOs based on KSC standards, using EQF definitions. The LOs constitute the qualifications of each level of the National Quality Framework (N.Q.F.) which includes a set of skills, competences and knowledge. Thus, LOs are used for describing qualifications and referring national qualification levels to the EQF.





2.1.8 Pathways, progression and bridges (permeability): What does this certificate entitle its holder to do (on the labour market and within the education system)?	Holders of a 'Vocational Training Diploma' ( <i>Diploma Epaggelmatikis Eidikotitas I.E.K.</i> ) <sup>9</sup> in specializations within the ICT qualification group at EQF level 5 may work either as self-employed or as employees of the private and public <sup>10</sup> sector, in their own specialty, and in accordance with the applicable legal framework <sup>11</sup> . They can start and run their own business in their respective ICT profession and train apprentices. In Greece, no professional license is provisioned for the ICT qualification group at level 5. Holders of ICT qualification diplomas in most specializations are also exempt from the obligation to present certificates like the ECDL in order to occupy administrative posts in the public sector. In addition, according to the Hellenic NQF <sup>12</sup> , there is no provision for permeability between post-secondary vocational training at level 5 and tertiary academic education at levels 6–8. Holders of this type of qualification do not have access to upper levels of education/ training.
2.1.9 Entrepreneurial attitude and skills: Do they play a role in the curriculum? In what way are they imparted?	Teaching is organized in ICT specialties and each specialty offers its own distinct package of subjects/ courses. Within the curricula of most specializations leading to ICT qualifications, specific courses/ modules are included, aiming to cultivate an entrepreneurial mind-set and develop entrepreneurial skills (e.g. Communication Techniques, Entrepreneurship, Interdisciplinary Assignment/ Projects, etc.), as well as the instruction of the English language which is considered a pre-requisite for success in the global market. Capacity building ap- proaches combine theoretical knowledge with practical training.
2.1.10 Companies as learning sites: What is the share of practical learning (work-based, work-place learning)? How is it organised? How is the quality of the practical learning phases assured? How are they assessed? How are they linked to the theoretical tuition?	Training includes 4 semesters of theoretical, laboratory and mixed courses, as well as 1 semester of apprenticeship or internship which is counted for the obtainment of professional rights. Learning is shared in 1200 hours of specialized theoretical, practical laboratory and mixed training, and six months (960 hours, i.e. 6 – 8 hours per day/ 5 days per week) of apprenticeship/ internship, which is mandatory and can be subsidised by national and/or EU funds. Only trainees, who have completed 120 daily wages in the specialization they are enrolled in, can be exempted from the 5 <sup>th</sup> semester of apprenticeship, if they choose to. In this way, the programmes help trainees gain initial working experience in the ICT sector, relevant to their training, and ease their transition to work. Practical learning occurs in appropriately equipped laboratories and during the Apprenticeship/Internship, which takes place either in parallel with the final (2) semesters of study, or in a fifth semester, following the completion of

<sup>&</sup>lt;sup>9</sup> The Vocational Training Diploma can be acquired after the completion of 4/5 semesters of study (depending on whether the Apprenticeship/ Internship will take place in parallel or after the 4 semesters of training) at a public/private Vocational Training Institute (I.E.K.) attested by a Vocational Training Certificate (V.E.K.), and success in the theoretical and practical parts of the vocational training accreditation examinations organised and operated by EOPPEP.

<sup>&</sup>lt;sup>10</sup> The 'Vocational Training Diploma' is recognised as qualification for appointment in the public sector falling in the category 'secondary education' according to the Presidential Decree no.50/2001 (Greek Official Gazette 39/vol. A/ 5-3-2001).

<sup>&</sup>lt;sup>11</sup> Legal basis: Law 2009/1992 on the National System of Vocational Education and Training & Law 4186/2013 on the Restructure of Secondary Education

<sup>&</sup>lt;sup>12</sup> Hellenic Qualification Framework (H.Q.F.): <u>http://en.nqf.gov.gr/index.php/en/</u> | The Greek Qualification Register: <u>http://proson.eoppep.gr/en</u>





	study; it can extend maximum to 1 year. Hitherto, theoretical subjects are taught only in classrooms and laboratory courses exclusively in laboratory centres, while mixed courses combine both (theoretical training and skills acquisition). Since 2013, public IEKs may also offer distance learning curricula <sup>13</sup> .
	The ratio of theoretical, laboratory and mixed hours of training, as provided by the study guides, must be completed upon the end of each semester. <sup>14</sup> Work-based learning takes place during the internship/ apprenticeship (at a workplace, i.e. private company, relevant departments of the public sector, etc.) where the trainees can acquire professional experience relevant to their ICT specialization. Quality assurance, and supervision, coordination and evaluation of internship Coordinators' who are designated members of the IEK teaching staff. The Internship Coordinator is responsible for monitoring the work of the trainees, ensuring the quality of the working environment and the physical attendance of the trainee, documenting and filing relevant monthly progress reports.
2.1.11 Entry requirements: Who is accepted to the programme/qualifications? What criteria do learners have to fulfil (e.g. age, pre-qualification, etc.)? Is prior learning recognised?	Access to programmes leading to ICT qualifications at level 5 can be granted to everyone who is at least 18 years old, and a graduate of formal (non-compulsory) upper secondary education, general and/or vocational. Graduates of the General Upper-Secondary Schools ( <i>GEL-Geniko Lykeio</i> ) are entitled to enrol in the ICT programmes of IEK, in order to acquire initial training, while graduates of Vocational Upper-Secondary Schools ( <i>EPAL-Epaggelmatiko Lykeio</i> ), Vocational Schools ( <i>EPA.S-Epagelmatiki Sholi</i> ) and Vocational Training Schools ( <i>SEK-Sholi Epagelmatiki Katartisis</i> ) <sup>15</sup> , in order to complete their vocational training. Admission requirements include an upper-secondary school certificate (or a university degree) and a duly submitted application with the candidate's specialisation preference accompanied with the required supporting documents. Prior vocational training certified by an EPA.S or EPAL school degree, in a specialty related to the one applied for, may grant admission to the 3 <sup>rd</sup> semester of study (e.g. IEK operated by OAED - the Manpower Employment Organisation). Several criteria are taken into account for the selection of candidates such as: a) the grade of the upper-secondary school degree/ certificate; b) relevant work experience; c) social criteria (e.g. age, large family members, single parents, etc.), d) date of graduation from upper-secondary General or Vocational school. Prior learning of candidate trainees in the workplace is awarded points as "professional experience" counting towards their selection. Candidates with certified qualification can be exempt, upon their request and approval by the IEK Director, from respective subjects, excluding the professional foreign language terminology courses.

<sup>&</sup>lt;sup>13</sup> According to Law 4186/2013, IEK may offer distance learning courses for ICT qualification, upon the development and accreditation of appropriate study programmes and educational materials which fall under the jurisdiction of the GSLL.

<sup>&</sup>lt;sup>14</sup> Upon Ministerial Decision 5954/23-6-2014

<sup>&</sup>lt;sup>15</sup> The three-year long alternance programmes (Vocational Training Schools, SEK) leading to qualifications EQF level 3, which were introduced and offered by the Ministry of Education at upper secondary level in 2013-14, have been discontinued.





### 2.2 Implementation of tuition

2.2.1 Teachers and trainers	Cooperative and primary advantion teachers, adult trainers, areasist
2.2.1 Teachers and trainers: Who can teach in the programme leading to the qualification in question? Which qualifications are they required to have? Is there obligatory in-service training for these teachers?	Secondary and primary education teachers, adult trainers, special scientific personnel (e.g. special education teachers, teaching assistants, etc.), and professionals having the statutory formal qualifications required, can teach in the programmes leading to ICT qualification at level 5, provided that they are members of the Register of Adult Educators kept by EOPPEP. As of 2014, in an effort to upgrade the qualifications of educators and the quality of services provided, educational proficiency became a prerequisite for the teaching staff of public and private Vocational Training Institutes (IEK). Hence, teachers and trainers must be certified as Adult Educators in the context of Lifelong Learning ("LLL") and in order to obtain their certification of educational attainment they must first hold a tertiary educational system, granting ICT professional rights, and 3 years of appropriate professional and/ or teaching experience related to their specialization. After they become evaluated and validated in terms of the required knowledge skills and ability to work as trainers, they obtain their certification, or equivalent, or are members of the former adult educator sub-registries, or university professors, or have at least 150 hours of teaching experience with adults. A list of the required trainer qualifications by subject is included in the study guides of the programmes leading to ICT qualification at level 5. Recruitment of IEK teachers/ trainers depends highly upon their relevant professional and/or teaching experience in the subjects they wish to teach. If their formal education is irrelevant with ICT qualification is valid for 10 years only. The online Register of Adult Educators in-cludes individual e-portfolios of all its members illustrating their qualifications, but it is the instructors' responsibility to update titles in ICT, performance, social skills and social criteria are taken into account. In-service training is not obligatory, and their certification is valid for 10 years only. The online Regis
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<b>2.2.2 Equipment and tools</b> : Is there special equipment required for the tuition?	The study guides of programmes leading to ICT qualification, per speciality, include an indicative list of minimum special requirements in terms of educational means and tools, i.e. the required ICT infra- structure and software applications, educational methodologies, as well as any additional materials (i.e. internship materials) for the theo- retical, laboratory and mixed courses. Teaching of specialized cours- es may be carried out with innovative methods (web teaching, e-





<b>2.2.3 Teaching and training</b> <b>materials</b> : Who compiles these materials? Who guarantees that the contents are relevant and up-to-date?	learning, simulations, case studies, role playing etc.), while the labor- atory and part of the mixed subjects are taught in the Laboratory Centres which are fully equipped with the required ICT infrastructure and software applications, ensuring the right environment for the transformation of the trainees theoretical knowledge in concrete vo- cational skills and the ability to perform real work-based tasks. Neither certified teaching materials nor textbooks are used in the IEK, due to the nature of the training provided. IEK teachers/ trainers are independent and autonomous in finding, preparing, updating and distributing teaching materials to the trainees. They are however guided by the relevant curricula, syllabus and suggested training content of all the theoretical/ laboratory modules which are tailored to the intended LOs of each course and are outlined in the respective study guides per ICT specialty. The GSLL supervises the implemen- tation of the curricula, evaluates, reassesses and updates them at least every six years, and their certification is conducted by EOPPEP. IEK instructors are assisted in compiling their teaching/training mate- rials, as well as in all their duties by the Director of each IEK who provides guidelines, and also by their colleagues through teamwork, which is highly encouraged.
2.2.4 Pedagogy: Which teaching methods are used? How much practical training (in companies, but also in laboratories, workshops, etc.) is foreseen?	The use of appropriate teaching methods and adult education tech- niques, as well as the suitability and regular updating of the instruc- tors' teaching skills, constitute required conditions for ensuring the quality of training. For this reason, the respective curricula (shown in the study guides per specialty) include clear instructions regarding the qualifications of instructors for each course and the educational means, methodologies and tools. Nevertheless, the selection of the most appropriate training methods and their proper implementation remains at the discretion of the IEK teachers/ trainers. The hours of practical training, within the framework of laboratory courses, fluctuate according to the specialization of each ICT qualifi- cation programme, but in every, and all cases, it is above 50% of the total hours of training provided, and it can even reach as high as above 80% of the total training. In addition to that, a mandatory peri- od of six months (up to one year) of internship/ apprenticeship in private companies/ public organisations is foreseen.
<b>2.2.5 Learners' support</b> : Are career guidance and/or individualised and target-group oriented counselling services offered? What support service for potential drop-outs is foreseen?	In terms of support measures, tuition in public IEK is offered free of charge. Other measures include the incentives offered to trainees on accessing/ continuing their training, according to geographical, income, social and other criteria, and the honours/ awards provided upon performance criteria. Hitherto, within public IEK, the Director assigns the vocational guidance programs to the teaching staff members <sup>16</sup> . Therefore, the responsibility for career guidance, counselling services and/ or support services belongs to the teacher who assumes this role under supervision of the IEK Director. In the public

<sup>&</sup>lt;sup>16</sup> Ministerial Decision 5954/2-7-2014 (Gazette 1807/issue B'/2-7-2014): "Regulation of Operation of Vocational Training Institutes (IEK) falling under the General Secretariat of Lifelong Learning". Since 30/06/2013, responsibility for the organisation/ operation of public IEK was transferred from the General Secretariat for Lifelong Learning (GSLL) to the Regional Authorities. The GSLL keeps the authority to formulate/ supervise their educational framework (Law 3879/2010).







IEK, these programs and services are usually offered exclusively on
a needs basis. Career offices and systematic support services for
potential drop-outs can be found in the private IEKs which are also
linked with companies, and inform the students about labour market
needs/ demands. EOPPEP <sup>17</sup> , as the National Authority for Vocational
Guidance, offers considerable support in lifelong career development
for youngsters and adults. Through the Lifelong Career Development
Portal <sup>18</sup> on EOPPEP's website, students/graduates can: access use-
ful information about the labour market and education/training oppor-
tunities in Greece and Europe, chat with career guidance counsellors,
complete tests on their interests, values and professional decisions
and develop e-Portfolios. Nevertheless, accessing and benefiting
from these services remains the learners' responsibility.

### 2.3 Assessment for certification

<b>2.3.1 Examiners</b> : Who is involved in the exam (single examiners/group of examiners)? What qualifications/which (professional) background are examiners required to have? Are they allowed to teach as well? How are they selected? How is their work assessed/ monitored?	EOPPEP creates and maintains a Register (i.e. a database) of quali- fied Assessors for the certification of IEK graduates. Candidates qual- ify for entry in the Register based on their relevant educational back- ground, and/or professional license and appropriate working experi- ence, and only after they have been successful tested, in terms of their theoretical and/or practical assessment skills. Professionals, IEK trainers and public school teachers with ICT qualification relevant to the specializations, have the right to participate as evaluators/ exam- iners, unless there is case of incompatibility (e.g. if they were the teachers/trainers of the candidates examined, etc.). EOPPEP nomi- nates the examiners from the respective Register. In the theoretical part, 2 examiners are assigned to each paper, and in cases of sub- stantial score deviations, the paper advances automatically to re- grading from a third assessor. In the practical part, candidates are
	nates the examiners from the respective Register. In the theoretical part, 2 examiners are assigned to each paper, and in cases of sub- stantial score deviations, the paper advances automatically to re- grading from a third assessor. In the practical part, candidates are assessed by a group of 3 examiners who are named according to their specialization. In order to succeed in this part, they have to re- ceive at least two passing grades. The examiners' work is monitored and assessed during the exams, by two auditors, who conduct on- the-spot checks in 50% of the total number of examination centres (via random sampling).
2.3.2 Entry requirement: Who has access to the exam? Do candidates have to fulfil certain requirements (e.g. age, pre- qualification, etc.)? Is prior learning recognised?	EOPPEP organises common examinations for public and private IEK graduates of all specialities, at national/regional level, according to the exam regulations per speciality <sup>19</sup> . Every candidate holding a Vocational Training Certificate (V.E.K.) after the successful completion of theoretical and practical training (5 or 4 semesters of study) at an IEK, has access to the certification exams. However, in order to complete their training, learners have to attend at least 85% of their programme and individual courses, and also fulfil the 6-month internship

 <sup>&</sup>lt;sup>17</sup> National Euroguidance Centre: <u>http://www.eoppep.gr/index.php/en/counseling-a-vocational-guidance-en/eurogui</u>





<ul> <li>2.3.3 Standards (KSC):</li> <li>Who defines the standards? How are the jinked to the Los? How are they linked to the Los? How are they linked to the Los? How are they linked to the labour market needs of each sector. All the above form the basis for the KSC (knowledge, skills and competencies) standards definition. The national examinations for the certification of the IEK graduates and the accreditation of their vocational training are based on the respective occupational profiles and curricula which are designed in terms of LOs. As a result, the assessment criteria for both the theoretical and practical part of the exams are also based on LOs which are expressed in KSC standards.</li> <li>2.3.4 Transparency of processes, assessment instruments, evaluation criteria: is it necessary to make this information public?</li> <li>The examination regulations (Rules of Certificate applications, exam schedules and respectialty) and the evaluation process/ procedures, including information on exam registration/ certificate applications, exam schedules and respectialty, are available via EOPPEP's website and are openly accessible to the public<sup>20</sup>. The examinations per say are not public, but two auditors are assigned to inspect them via random on-the-spot-checks for quality assurance purposes.</li> <li>2.3.5 Appropriateness of assessment procedures?</li> <li>Which/How many assessment intendor (many assessment procedures)?</li> <li>Do they correspond to real work-life situations?</li> <li>For the theoretical part, candidates are required to answer a number of questions are used? Do they correspond to real work-life.</li> <li>These questions are part of the list of subjects included in the Rules of Certification per specialty, which are notified to the public at least 20 days before the tests via EOPPEP's website. The topics of the theoretical exams are selected by the Central Examination Committee for the Certification of Vocational Training (KEEPEK) of EOPPEP, via electronic b</li></ul>		requirement. The scope of the exams is the certification of the gradu- ates' qualifications, i.e. the outputs or results of their vocational train- ing. Prior learning, however, is not recognised in terms of credit awards for the exams. Registration to the examinations includes an online subscription to the candidates' register for participation in the exams, an application, and proof of identity. Upon successful exami- nation results, IEK graduates are awarded the Vocational Training Diploma at EQF level 5, which is recognised both in Greece and in EU member states.
processes, assessment instruments, evaluation criteria: Is it necessary to make this information public?Training for each specialty) and the evaluation process/ procedures, including information on exam registration/ certificate applications, exam schedules and results, as well as a list of exam questions/ sub- jects/ cases for each speciality, are available via EOPPEP's website and are openly accessible to the public <sup>20</sup> . The examinations per say are not public, but two auditors are assigned to inspect them via ran- dom on-the-spot-checks for quality assurance purposes.2.3.5 Appropriateness of assessment procedures: Which/How many assessment methods/ instruments are used? Do they correspond to real work- life situations?For the theoretical part, candidates are required to answer a number of questions in writing (or orally for candidates with special assess- ment needs), assessing their knowledge of the cognitive aspects of their training, and establishing whether they are able to use the knowledge acquired to exercise their profession in real work-life. These questions are part of the list of subjects included in the Rules of Certification per specialty, which are notified to the public at least 20 days before the tests via EOPPEP's website. The topics of the theoretical exams are selected by the Central Examination Commit- tee for the Certification of Vocational Training (KEEPEK) of EOPPEP, via electronic ballot, on the day of the exams. In the practical part, trainees are examined on topics selected by their group of assessors, based on a list of target skills and competencies, as described in the respecialty. Practical examinations take place in laboratories and/or real workplaces which are selected by EOPPEP. The assessment methods/instruments correspond to real work-life situations, since the trainees' skills/competencies are assessed a	Who defines the standards? How are they linked to the LOs? How are they linked to the labour market? Are assessment criteria based on LOs and to what extent are they used in the assessment	the respective job profiles and curricula, which take into account the labour market needs of each sector. All the above form the basis for the KSC (knowledge, skills and competencies) standards definition. The national examinations for the certification of the IEK graduates and the accreditation of their vocational training are based on the respective occupational profiles and curricula which are designed in terms of LOs. As a result, the assessment criteria for both the theo- retical and practical part of the exams are also based on LOs which
assessment procedures: Which/How many assessment methods/ instruments are used? Do they correspond to real work- life situations? bit e situations? of questions in writing (or orally for candidates with special assess- ment needs), assessing their knowledge of the cognitive aspects of their training, and establishing whether they are able to use the knowledge acquired to exercise their profession in real work-life. These questions are part of the list of subjects included in the Rules of Certification per specialty, which are notified to the public at least 20 days before the tests via EOPPEP's website. The topics of the theoretical exams are selected by the Central Examination Commit- tee for the Certification of Vocational Training (KEEPEK) of EOPPEP, via electronic ballot, on the day of the exams. In the practical part, trainees are examined on topics selected by their group of assessors, based on a list of target skills and competencies, as described in the respective job profiles, curricula and Rules of Certification for each specialty. Practical examinations take place in laboratories and/or real workplaces which are selected by EOPPEP. The assessment methods/instruments correspond to real work-life situations, since the trainees' skills/competencies are assessed against the successful	processes, assessment instruments, evaluation criteria: Is it necessary to make this	Training for each specialty) and the evaluation process/ procedures, including information on exam registration/ certificate applications, exam schedules and results, as well as a list of exam questions/ subjects/ cases for each speciality, are available via EOPPEP's website and are openly accessible to the public <sup>20</sup> . The examinations per say are not public, but two auditors are assigned to inspect them via ran-
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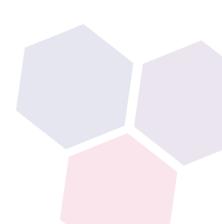
<sup>&</sup>lt;sup>20</sup> Access at: <u>http://www.eoppep.gr/index.php/el/qualification-certificate/certificate-of-qualifications/certificate-graduates</u>







Who is in charge of the	awarding Vocational Training Diplomas. A Central Examination
assessment? What rights does	Committee for the Certification of Vocational Training (K.E.E.P.E.K.)
this institution have?	is established by decree of the Board of EOPPEP in order to conduct
	the certification exams, which are final examinations of the graduates
	in a theoretical and a practical part, in accordance with the Rules of
	Certification of Vocational Training for each specialty. K.E.E.P.E.K. is
	comprised of representatives of EOPPEP, social partners (employer
	and employee associations), and the Ministry of Education. In more
	detail, EOPPEP is in charge for the following: a) certification proce-
	dures; b) selection of examination centres/premises for the exams; c)
	grading participants; d) organization and operation of the examination
	centres; e) quality assurance of the certification process; f) placement
	of candidates as exam participants and appointment of examiners; g)
	exam fees; h) announcement of the exam results and awarding titles.
2.3.7 Complaint management:	The assessment results are announced on EOPPEP's website and
Is it possible to view the	also posted outside the examination centres as written announce-
assessment results? What can	ments. No review or appeal process is provided by the legislative
learners do if they do not agree	framework. Candidates can only request to view their theoretical ex-
with the assessment?	amination papers within one month after the announcement of re-
	sults, but, the announced scores are final and no changes are stipu-
	lated by the legislative framework of the certification process. If can-
	didates are successful in either the theoretical or the practical part of
	the exams, then they can keep their successful scores for the follow-
	ing six consecutive exam periods, during which they will only partici-
	pate in the part in which they failed.







# **3. EVALUATION**

**Monitoring process** 

<b>1. Internal evaluation</b> : Statistical data on drop-outs and failure/success rates in the exam, satisfaction rate of individuals and employers with the programme, the examination and the acquired skills/competences; results of complaint management. Are the results of internal evaluation measure made public?	According to the newly reactivated National Quality Assurance Framework <sup>21</sup> , namely the p <sup>3</sup> , an annual self-assessment is mandatory for all public IEK. This includes an evaluation in terms of compliance with the p <sup>3</sup> fundamental principles of quality, and alignment improvements. The internal evaluation of IEK is based on formative (on-going) evaluations of their policies/ procedures and management, by the GSLL/ executive management authorities, and measurable performance results against the quality indicators of p <sup>3</sup> , i.e. trainers'/ learners' performance, participation/ placement/ completion/ satisfaction rates in VET programmes, use of support services/ innovative teaching methods, certification/ recognition of qualification by the labour market, utilisation of acquired skills at the workplace, and graduate unemployment rates, based on trainee/ trainer/ graduate/ employer surveys. Results are to be documented regularly in a special database, in order to create benchmarks and support the continuous improvement of the services provided. They are also notified to the GSLL, for the overall annual report on LLL. IEK implementing self-assessment and improvement measures based on the identified areas for improvement and in accordance with the Cycle of Quality, can apply to obtain the p <sup>3</sup> mark (license) which is valid for 2 years. The p <sup>3</sup> framework was reactivated as of recently, thus the aforementioned procedures haven't been implemented yet.
2. External evaluation: Information on occupation obtained by individuals after completion of training, according to type of training and individual criteria (transition), type of employment. Are the results of external evaluation measure made public? On which level is external evaluation carried out (national/ regional/ provider)? Is it carried out systematically? Are graduate surveys made? How is the feedback of the labour market taken into account? To what extent and how are LOs used in this process?	Graduate and employer surveys, including labour market feedback and information on type/ rates of employment after training, as well as managerial reviews by the GSLL and management authorities, are to be conducted systematically at provider level, as part of the annual self-assessment of IEK. Their results and materials documenting the findings are evaluated externally by a team of specially trained as- sessors, assigned by EOPPEP. Surveys may be conducted also at national level, the results of which are notified to local IEKs, in order to take measures for improvement. Moreover, in compliance with the applicable provisions for IEK licencing/ operation requirements, GSLL may conduct or delegate regular/ unannounced inspections during the implementation of the programmes, and charge penalties based on the result reports, which are notified to the Regional Authorities and published on the official website of the GSLL within 30 days. During inspections, class schedules are assessed according to the curriculum, and in accordance with the intended LOs of each course, as are also the qualifications of instructors, and the teaching means/ methods/ equipment. P <sup>3</sup> was reactivated as of recently, thus the

<sup>&</sup>lt;sup>21</sup> The  $p^3$  ( $\pi^3$ ) framework for quality assurance in lifelong learning denotes "quality, always and everywhere". The " $\pi$ " stands for quality (*poiótita*) in educational inputs, processes and outputs: (a) Quality of inputs, i.e. human/financial natural resources used in education/training provision, infrastructure, teaching materials, programs, and teachers; (b) Quality procedures, i.e. selection of trainees/ trainers, teaching methods, vocational guidance counselling services, implementation; (c) Quality of outputs, i.e. outcomes of learning, knowledge/skills/competencies acquired after completion of training, labour market integration, etc.





# 4. REVIEW

afore-mentioned procedures haven't been fully implemented yet.

### Conclusions

Although the implementation of the annual self-assessments of the Vocational Training Institutes (IEK) is still incomplete, since the National Quality Assurance Framework (P<sup>3</sup>) was re-activated just recently, its pilot implementation<sup>22</sup> has already led to the creation and implementation of general regulations on the operation of IEK<sup>23</sup> which stipulate continuous monitoring, evaluation and improvement of the qualification cycle. Pursuant to these rules, IEK are expected to refine their quality indicators and apply measurement and evaluation in order to form plans for improvement, by using the Cycle of Quality (with its 5 stages: planning, implementation, measurement, evaluation and review) and the P<sup>3</sup> scoring tool that assists in prioritizing improvements. These processes of self-assessment together with the external inspections/ evaluations and the national benchmarking, as well as the re-assessment of their structures and student performance will lead to the improvement of IEK systems/ procedures, including the alignment of course timetables with the certified ICT curricula and intended LOs, trainer qualification, training means/ methods/ equipment.

For the purpose of ensuring responsiveness to the changing needs of the economy, the effectiveness of the training programmes is to be evaluated against the degree of certification of the qualification acquired and the degree of usefulness of the acquired skills at the workplace, in order to lead to their review. Feedback from the labour market is to be collected systematically not only in the planning phase of the development of job profiles and curricula, but since the labour market actors are members of the Governing Board of EOPPEP and the advisory committees, their feedback is requested and included in the revision/ updating of programmes during the whole development cycle of qualifications. Certified programmes leading to ICT qualification at level 5 are to be adjusted to the specific job profiles within the specialties that are in demand in the labour market and their respective curricula are to be reassessed, evaluated and, if deemed necessary, renewed at least every six years. Currently, the Ministry of Education, in collaboration with the stakeholders, is creating a new system for early identification of labour market needs and skill demands in order to improve their matching with the qualification acquired by vocational training.

Another outcome of the pilot implementation and evaluation of the p<sup>3</sup> quality assurance framework was the creation and implementation of a uniform selection and evaluation system for IEK trainers (Register of Educators of non-formal Adult Education), with requirements of teaching competence (Educational Attainment certification process of Adult Educators) and a common point system (criteria) for all IEK in Greece, which also provides for the establishment of a system for the continuous education, evaluation and skill updating of educators and staff involved in non-formal vocational education and training.

<sup>&</sup>lt;sup>22</sup> The 1<sup>st</sup> pilot phase took place in 2011 and its results were evaluated in 2012; the 2<sup>nd</sup> pilot phase occurred in 2013, and lead to a revised edition of  $p^3$  and an action plan for its establishment as of the end of 2015. <sup>23</sup> Ministerial Decision 5954/2.7 2014 (Carotte 4907/insue P/0.7 2014). (Decision of Counting of C

<sup>&</sup>lt;sup>23</sup> Ministerial Decision 5954/2-7-2014 (Gazette 1807/issue B'/2-7-2014): "Regulation of Operation of Vocational Training Institutes (IEK) falling under the General Secretariat of Lifelong Learning".



# **Example 2: Electrician qualification group**

The qualification group "Electrician" in a nutshell:

Qualification awarding body	National Organisation for the Certification of Qualifications and Vocational Guidance (EOPPEP)
Legal basis	Law 2209/1992 on the National System of Vocational Education and Training & Law 4186/2013 on the Restructure of Secondary Education
NQF-level / EQF-level	NQF/ EQF level 5
ISCED-2011	Post-secondary (non-tertiary) education at ISCED 4
Qualification focus	Basic training on specialized technical IVET qualification; acquisition of electricity/ energy and electronics/ automation subject-specific skills, and basic entrepreneurial <sup>24</sup> competencies
Entitlements	Setting up a company and training apprentices; may work either as self- employed, or, as employees of companies/ enterprises/ organisations in their specialty.

The "Electrician" qualification group is very important within the Greek skilled crafts sector, and it can be achieved via the following 3 specialties/ professions: <u>Technician of Internal Electrical Facilities</u>, <u>Household Appliances Electrician</u> and <u>Automations Technician</u>. Training for these 3 specialties is provided by the Vocational Training Centres (IEKs), and leads to the certification of the relevant qualifications at NQF/EQF level 5. The technological evolutions in this sector are rapid and continuous, thus, professionals are called upon to upgrade their qualification constantly. Professions in the Greek electricity sector are part of the construction industry, and as such, they are a very significant economic sector in Greece. About 10.000 enterprises and more than 15.000 employees and self-employed professionals are occupied in this industry. For the past few years several electrician enterprises have closed down as a result of the impact that the economic crisis has had in the construction industry.

This qualification group is highly relevant to labour market needs, as it is provides specialised technical/ subject-specific knowledge and electricity/ energy and electronics/ automation subject-specific skills, as well as rudimentary entrepreneurial know-how. The main tasks/ functions of the Electrician qualification group at level 5 are the following: a) construction, repair or maintenance of internal electrical/ automation installations, b) installation of various types of electrical supplies, c) connecting or disconnecting electrical & automation devices, d) control of electrical/ automation installations. Holders of the Electrician qualification certification are entitled to work as Basic Electrician Technicians. After one year of work experience as basic technician, they have the right to work as a Master Electrician.

The presentation of the quality assurance (QA) mechanism follows the **lifecycle of qualification**, i.e. from needs analysis to review of qualification. In order to structure the information herein, we use the four phases of the **European Quality Assurance Reference Framework (EQARF)**<sup>25</sup>:

Phase 1: planning Phase 2: implementation Phase 3: evaluation Phase 4: review

<sup>&</sup>lt;sup>24</sup> i.e. ability to supervise others, develop initiatives, collaborate/ communicate effectively, operate according to professional ethics, etc.

<sup>&</sup>lt;sup>25</sup> The EQARF is a reference instrument to help Member States and VET providers to promote and monitor continuous improvement of their VET systems and/or VET provision based on common European references (cf. <u>http://www.eqavet.eu/gns/policy-context/european-quality-assurance-reference-framework.aspx</u>).





### **1. PLANNING**

### **Needs analysis**

1. Labour market information: Do you collect data at this stage of the qualification development process? If so which data? How do you collect data? Who is in charge of collecting data? Are stakeholders involved? What are the roles of companies and of business organisations?	In view of assisting labour market accession, public and private Voca- tional Training Institutes ("IEK") in Greece, are tasked with providing high-level qualifications. This is achieved by a long qualification de- velopment process corresponding to specific job profiles <sup>26</sup> based on specialties with high labour market demand that reflect the needs of the economy and the proposals of stakeholders. The National Organ- isation for the Certification of Qualifications & Vocational Guidance <sup>27</sup> ("EOPPEP"), which accredits and licences all VET providers in Greece, is responsible for the development of job profiles, upon which the study programmes and the curricula are based. These job profiles are developed with the input of the stakeholders and are later certified by EOPPEP. The moderators of the relevant working- groups, set-up by the Education Ministry, are responsible for the re- search. Labour market information is collected via: a) Desk research (literature review, sectoral studies, vocational monographs, and data from stakeholders and the National Statistical Service); b) A variation of the expert-based "Delphi surveys" with semi-structured question- naires; c) Interviews with professionals in the Electrician qualification group; d) Review/ feedback from relevant professional organizations of Employers and Employees. The whole process is developed after consultation with advisory committees of experts, representatives of chambers, employers/ employees associations, etc. The major social partners that co-sign the National General Collective Agreement are highly involved in this phase, as their representatives sit on the com- mittees and the board of EOPPEP.
2. Justification: Is it necessary to justify the introduction of a new programme/ qualification or update an existing one? Who is in charge of the justification/ motivation report? Are stakeholders involved?	The job profiles related to the Electrician qualification group are nov- el; thus, their introduction or update doesn't require any justification. By and large, EOPPEP is in charge of the justification report every six years, with the active contribution of the relevant stakeholders. It is included in the qualification report developed by EOPPEP, which describes the updating process.
3. Piloting / pre-testing: Is there a pilot stage before the qualification is "formally" introduced? If so, who is involved in this phase? How is the qualification tested/ piloted/ evaluated?	No pilot stage and/ or pre-testing is foreseen when a new Electrician qualification is formally introduced.

<sup>&</sup>lt;sup>26</sup> An occupational (or job) profile in Greece includes, inter alia, the definition of the job and/or speciality, background history, current legal framework, job functions and the required knowledge, skills and competencies for exercising the occupation or speciality, as well as proposed pathways for acquiring the qualification and indicative ways of accessing them.

<sup>&</sup>lt;sup>27</sup> EOPPEP is the national authority for the accreditation of VET and the certification of qualifications. It aims at linking VET with labour market needs, upgrading people's occupational qualifications and enhancing their employment perspectives. EOPPEP is also the statutory body for the development and implementation of the Hellenic Qualifications Framework (NQF) in alignment with the European Qualifications Framework (EQF). <u>http://www.eoppep.gr/index.-php/en/eoppep-en</u>





# 2. IMPLEMENTATION

### 2.1 Design of new and updating of existing curricula and trainings regulations

2.1.1 Legal basis / competent authority: Who is responsible for the design of the curriculum/training regulation? What exactly is legally regulated (examination areas, KSC standards, etc.)?	The detailed curricula of each Electrician qualification specialty are developed by the General Secretariat for Lifelong Learning (hereinafter referred to as the "GSLL") which also supervises their implementation, and are later certified by EOPPEP. The GSLL is also responsible for drawing up the training regulation and the Minister of Education for their approval. The training regulation concerns the following: the organisation of all aspects of education/training, internships/ apprenticeships, the quality assurance procedures/ criteria and the internal/ external evaluation. Based on the training regulation per specialty, EOPPEP is responsible for the training accreditation examinations and the certification of the Vocational Training Institutes (here-inafter referred to as "IEK") graduates.
2.1.2 Standards for the process of designing of curricular and training regulations: Are there standard procedures for the development of qualifications? Are there templates to be used?	The GSLL is responsible for the training curricula/regulation design process. Curricula are drawn up by GSLL taking into account any existing job profile and/or the required vocational standards, in accordance with the ECVET <sup>28</sup> guidelines. There are Curricular Templates and Training Regulation Templates for each specialty. The law specifies the standard procedures for designing curricula/ regulations in terms of: (a) All matters of organizing the students' education/training, i.e. study programmes, internships/ apprenticeships etc. (b) Quality assurance, i.e. responsible bodies, procedures, criteria; (c) Transparency of administrative/ teaching processes and decisions; (d) Processes of internal evaluation and improvement, formative/ student assessment (i.e. research and external evaluation). EOPPEP, within its competence of accrediting job profiles and curricula standards, is planning to develop standards/ specifications for modularised curricula with credits, based upon the accredited occupational profiles. These procedures are relatively new, thus they haven't been fully implemented yet.
<b>2.1.3 Review and update of</b> <i>curricula</i> : Are curricula regularly assessed and reviewed?	According to Greek law <sup>29</sup> , all curricula are to be regularly assessed, revised and updated, at least once every six years, by the GSLL and EOPPEP. This process is relatively new and given the challenge of restructuring the Greek VET system and improving its quality assurance, it has not been fully implemented yet (e.g. updating the learning outcomes in the job profiles remains pending).
<b>2.1.4 Involvement of key stake- holders:</b> Are stakeholders (social partners, companies, sector organisations,	The involvement and engagement of all key stakeholders is a matter of high priority in Greece. All major social partners from the Employ- ers' and the Employees' side, in partnership with their scientific or/

<sup>28</sup> The European Credit System for Vocational Education and Training (ECVET) is a "technical framework for the transfer, recognition and, where appropriate, accumulation of individuals' learning outcomes with a view to achieving a qualification." More information at: <u>http://ec.europa.eu/education/policy/vocational-policy/ecvet\_en.htm</u>

<sup>&</sup>lt;sup>29</sup> Law 4186/2013 (Government Gazette 193/issue A'/17-9-2013): "Restructuring of Secondary Education and other regulations". It contains regulations regarding Upper Secondary Schools, Vocational Upper Secondary Schools, the National Organisation of Examinations, the organisation and operation of bodies in non-formal education, the certificates of vocational education and training and the professional rights, the organisation of the regional bodies of non-formal education of the Ministry of Education and Religious Affairs.





pedagogical experts, VET providers, etc.) involved in the design of new / in the update of existing curricula/training regulations? Note: If you refer to stakeholder involvement in each criterion, there is no need to have a separate criterion for this.	and VET centres, pedagogical experts and representatives of EOPPEP, the Ministry of Education and all the other competent authorities, are involved in the development of curricula for IVET qualification attainment. Furthermore, representatives of the social partners are regular members of the Governing Board of EOPPEP, which is the national organisation for the accreditation of VET and the certification of qualifications.
<b>2.1.5 Link to the labour market</b> : How is the curriculum linked to labour market needs? How is it guaranteed that the curriculum complies with labour market and company needs?	Relevance to labour market needs is assured via the involvement of labour market actors in the development of job profiles, based upon which the curricula are shaped, and via the emphasis on work-based training and compulsory apprenticeships/internships, and via regular updating of the curricula, as needed, and at least once every six years. The GSLL nominates experts and organises expert working groups for each specialty. These working groups review the curricu- lum with the active participation of the social partners and other rele- vant stakeholders. Furthermore, in response to the skill matching challenge, the Ministry of Education is establishing a new system for early identification of labour market needs and skill demands, in which the social partners will play an important advisory role.
2.1.6 Application of learning outcome concept: Are LOs used in curricula/training regulations? How are they defined? Which domains of learning are used? Who is involved in the definition and what role do they have? Who is involved in the design of curricula/training regulations? How is the cooperation coordinated?	In an effort to upgrade VET provision, by increasing transparency and strengthening accountability of qualifications, all new and/or updated vocational education and training curricula, are to be designed based on Learning Outcomes (LOs). A methodology <sup>30</sup> was developed in 2006 for analysing job profiles (in functions) by incorporating the LO approach, which lead to 202 detailed job profiles based on learning outcomes, as of yet. LOs are used also when describing qualifications in the national qualification levels (classified in knowledge, skills and competencies) <sup>31</sup> , new curricula, and/ or when designing assessment approaches.
2.1.7 Information in curricula and training regulations: What information is provided in curricula/training regulations (e.g. title, duration, entry requirements, learning contents, costs, etc.)?	The Electrician qualification curricula and training regulation are illus- trated in the respective 'study guide' per specialty. Each study guide includes a distinct job profile, matching of specialties with vocational classifications, a detailed curriculum, the LOs expressed as knowledge, skills and competencies for each subject, a timetable for the teaching materials in line with the LOs, information on credits, costs, duration of study and teacher qualification, instructions for teachers/ trainers on knowledge assessment, teaching methods and learning tools, as well as specifications for the exams and the as- sessment of knowledge and guidelines for the certification of the LOs.

<sup>&</sup>lt;sup>30</sup> Ministerial Decree 110998/19-04-2006 (Gazette 566/B'/02-05-2006) "On the Accreditation of Occupational Profiles"

<sup>&</sup>lt;sup>31</sup> EOPPEP has developed a methodology for designing LOs based on KSC standards, using EQF definitions. The LOs constitute the qualifications of each level of the National Quality Framework (N.Q.F.) which includes a set of skills, competences and knowledge. Thus, LOs are used for describing qualifications and referring national qualification levels to the EQF.







2.1.8 Pathways, progression and bridges (permeability): What does this certificate entitle its holder to do (on the labour market and within the education system)?	Holders of the 'Vocational Training Diploma' ( <i>Diploma Epaggelmatikis Eidikotitas I.E.K.</i> ) <sup>32</sup> in the Electrician qualification group at level 5, may work in their own specialty, as self-employed or as employees in small or big industries and companies, in the public <sup>33</sup> or private sector, in accordance with the applicable legal framework <sup>34</sup> . According to national legislation, qualification holders are entitled to work as Basic Electricians and after 1 year of full-time working experience as basic technicians, they have the right to work as a Master Electricians. They can start and run their own business in their respective Electrician profession and train apprentices, e.g. Automation Technicians in production/maintenance of automated installations or systems, Household Appliances Electricians in installation/ connection/ disconnection of electrical supplies for domestic appliances and their inspection/ repair/ maintenance, and Electrician of Internal Facilities in maintenance of electrical installations of constructions/ buildings/ complexes, etc. In accordance with the Hellenic NQF <sup>35</sup> , holders of this type of qualification at level 5 do not have access to upper levels of education/ training (levels 6–8).
<b>2.1.9 Entrepreneurial attitude</b> <b>and skills</b> : Do they play a role in the curriculum? In what way are they imparted?	Teaching is organized in specialties and each Electrician specialty offers its own distinct package of subjects/ courses. Within all special- izations leading to Electrician qualifications, specific courses/ mod- ules are included in the curricula, aiming to cultivate an entrepreneur- ial mind-set and develop entrepreneurial skills (e.g. Communication Techniques, Entrepreneurship, Business Dexterity, Laboratory Or- ganisation and Operation, etc.), as well as the instruction of English and Computer use which is considered a pre-requisite for success in the new economy. Capacity building approaches combine theoretical knowledge with practical training.
2.1.10 Companies as learning sites: What is the share of practical learning (work-based, work-place learning)? How is it organised? How are practical learning phases quality assured? How are they assessed? How are they linked to the theoretical tuition?	Training includes 4 semesters of theoretical, laboratory and mixed courses, as well as 1 semester of apprenticeship or internship which is counted for the obtainment of professional rights. Learning is shared in 1200 hours of specialized theoretical, practical laboratory and mixed training, and six months (960 hours, i.e. 6 – 8 hours per day/ 5 days per week) of apprenticeship/ internship, which is mandatory and can be subsidised by national and/or EU funds. Only trainees, who have completed 120 daily wages in the specialization they are enrolled in, can be exempted from the 5 <sup>th</sup> semester of apprenticeship, if they choose to. In this way, the programmes help trainees gain initial working experience in the Electrician sector, relevant to

<sup>&</sup>lt;sup>32</sup> The Vocational Training Diploma can be acquired after the completion of 4/5 semesters of study (depending on whether the Apprenticeship/ Internship will take place in parallel or after the 4 semesters of training) at a public/private Vocational Training Institute (I.E.K.) attested by a Vocational Training Certificate (V.E.K.), and success in the theoretical and practical parts of the vocational training accreditation examinations organised and operated by EOPPEP.

<sup>&</sup>lt;sup>33</sup> The 'Vocational Training Diploma' is recognised as qualification for appointment in the public sector falling in the category 'secondary education' according to the Presidential Decree no.50/2001 (Greek Official Gazette 39/vol. A/ 5-3-2001).

<sup>&</sup>lt;sup>34</sup> Legal basis: Law 2009/1992 on the National System of Vocational Education and Training & Law 4186/2013 on the Restructure of Secondary Education

<sup>&</sup>lt;sup>35</sup> Hellenic Qualification Framework (H.Q.F.): <u>http://en.nqf.gov.gr/index.php/en/</u> | The Greek Qualification Register: <u>http://proson.eoppep.gr/en</u>





	their training, and ease their transition to work. Practical learning occurs in appropriately equipped laboratories and during the Apprenticeship/Internship, which takes place either in parallel with the final (2) semesters of study, or in a fifth semester, following the completion of study; it can extend maximum to 1 year. Hitherto, theoretical subjects are taught only in classrooms and laboratory courses exclusively in laboratory centres, while mixed courses combine both (theoretical training and skills acquisition). Since 2013, public IEKs may also offer distance learning curricula <sup>36</sup> . The ratio of theoretical, laboratory and mixed hours of training, as provided by the study guides, must be completed upon the end of each semester. <sup>37</sup> Work-based learning takes place during the internship/ apprenticeship (at a workplace, i.e. private company, relevant departments of the public sector, etc.) where the trainees can acquire professional experience relevant to their Electrician specialization. Quality assurance, and supervision, coordination and evaluation of internships fall under the responsibility of the IEK Directors or the
	'Internship Coordinators' who are designated members of the IEK teaching staff. The Internship Coordinator is responsible for monitor- ing the work of the trainees, ensuring the quality of the working envi- ronment and the physical attendance of the trainee, documenting and filing relevant monthly progress reports.
2.1.11 Entry requirements: Who is accepted to the programme/qualifications? What criteria do learners have to fulfil (e.g. age, pre-qualification, etc.)? Is prior learning recognised?	Access to programmes leading to Electrician qualifications at level 5 can be granted to everyone who is at least 18 years old, and a grad- uate of formal (non-compulsory) upper secondary education, general and/or vocational. Graduates of the General Upper-Secondary Schools ( <i>GEL-Geniko Lykeio</i> ) are entitled to enrol in the Electrician programmes of IEK, in order to acquire initial training, while gradu- ates of Vocational Upper-Secondary Schools ( <i>EPAL-Epaggelmatiko Lykeio</i> ), Vocational Schools ( <i>EPA.S-Epagelmatiki Sholi</i> ) and Voca- tional Training Schools ( <i>SEK-Sholi Epagelmatikis Katartisis</i> ) <sup>38</sup> , in order to complete their vocational training. Admission requirements include an upper-secondary school certificate (or a university degree) and a duly submitted application with the candidate's specialization preference accompanied with the required supporting documents. Prior vocational training certified by an EPA.S or EPAL school de- gree, in a specialty related to the one applied for, may grant admission to the 3 <sup>rd</sup> semester of study (e.g. IEK operated by OAED - the Manpower Employment Organisation). Several criteria are taken into account for the selection of candidates such as: a) the grade of the upper-secondary school degree/ certificate; b) relevant work experience; c) social criteria (e.g. age, large family members, single par- ents, etc.), d) date of graduation from upper-secondary General or Vocational school.

<sup>&</sup>lt;sup>36</sup> According to Law 4186/2013, IEK may offer distance learning courses for Electrician qualification, upon the development and accreditation of appropriate study programmes and educational materials which fall under the jurisdiction of the GSLL.

<sup>&</sup>lt;sup>37</sup> Upon Ministerial Decision 5954/23-6-2014

<sup>&</sup>lt;sup>38</sup> The three-year long alternance programmes (Vocational Training Schools, SEK) leading to qualifications EQF level 3, which were introduced and offered by the Ministry of Education at upper secondary level in 2013-14, have been discontinued.





Prior learning of candidate trainees in the workplace is awarded
points as "professional experience" counting towards their selection.
Candidates with certified qualification can be exempt, upon their re-
quest and approval by the IEK Director, from respective subjects,
excluding the professional foreign language terminology courses.

### 2.2 Implementation of tuition

2.2.1 Teachers and trainers: Who can teach in the programme leading to the qualification in question? Which qualifications are obligatory in-service training for these teachers? University professionals having the required statutory formal qualification, can teach in programmes leading to Electrician qualification at level 5, provided they are members of the Register of Adult Educators kept by EOPPEP. As of 2014, educational proficiency became a prerequi- site, thus, teachers/ trainers, before entering the Register. They may also have to attend a Teacher's Training programme, unless they already hold a Bachelor's in adult educators, or are members of the former adult educator sub-registries, or university professors, or have at least 150 hours of teaching experience with adults. A list of required trainer qualifications by subject is included in the study guides of programmes leading to the Electrician qualification. The Automations Technician specialty requires trainers with qualifica- tion at level 5 minimum, and 3 years of relevant working experience. The other two specialties require a relevant Bachelor's diploma/ de- gree (preferably in Electricial Engineering) and 5 years of certified working experience in the respective specialty or theoretical courses and practical courses. Professionals holding lower than level 6 quali- fication, e.g. IEK Vocational Training Diploma at level 5, or Vocational School Certificate ( <i>Ptychio EPA.S.</i> ) and or Vocational Upper- Secondary School Degree ( <i>EPA.LPtychio Epaggelinatikis Eidikoti- tas</i> ) at level 4, and have 10 years of working experience, the subjects they wish to teach. For their selection, and in line with the courses they wish to teach. For their selection, and in line with the courses they wish to teach. For their selection, and in line with the courses they wish to teach. For their selection, and in line with the courses they wish to teach. For their selection of their qualification. In public IEKs, the selection of trainares is carried out by a com





	surance Systems (ISO 9000) which describe their specific teacher/ trainer selection processes and procedures in detail.
<b>2.2.2 Equipment and tools</b> : Is there special equipment required for the tuition?	The study guides of programmes leading to Electrician qualification, per speciality, include an indicative list of the minimum special re- quirements in terms of educational means and tools, i.e. required electrical infrastructure, tools and equipment, educational methodolo- gies, as well as any additional educational materials (i.e. internship materials) for the theoretical, laboratory and mixed courses. For the theoretical courses video projectors, slide projectors etc. are used as educational tools and highly-specialized courses may be carried out with innovative methods (e-learning, simulations, case studies, role playing etc.), while laboratory and part of mixed subjects are taught in the Laboratory Centres which are fully equipped with electrical supplies (cables, terminal blocks, electrical tape, fuses, etc.) and meas- uring instruments (ammeters, voltmeters, watt meters, multimeters, power factor meters/cos meters, lamps of various types with all necessary components, and automation programs with PLC.
2.2.3 Teaching and training materials: Who compiles these materials? Who guarantees that the contents are relevant and up-to-date?	Neither certified teaching materials nor textbooks are used in IEKs, due to the nature of the training provided. IEK teachers/ trainers are independent and autonomous in finding, preparing, updating and distributing teaching materials to the trainees. They are, however, guided by the relevant curricula, syllabus and suggested training content of all the theoretical/ laboratory modules which are tailored to the intended LOs of each course and are outlined in the respective study guides per Electrician specialty. The GSLL supervises the im- plementation of the curricula, evaluates, reassesses and updates them at least every six years, and their certification is conducted by EOPPEP. IEK instructors are assisted in compiling their teach- ing/training materials, as well as in all their duties by the Director of each IEK who provides guidelines, and also by their colleagues through teamwork, which is highly encouraged.
2.2.4 Pedagogy: Which teaching methods are used? How much practical training (in companies, but also in laboratories, workshops, etc.) is foreseen?	The use of appropriate teaching methods and adult education tech- niques, as well as the suitability and regular updating of the instruc- tors' teaching skills, constitute required conditions for ensuring the quality of training. For this reason, the respective curricula (shown in the study guides per specialty) include clear instructions regarding the qualifications of instructors for each course and the educational means, methodologies and tools. Nevertheless, the selection of the most appropriate training methods and their proper implementation remains at the discretion of the IEK teachers/ trainers. Hours of practical training, within the framework of laboratory cours- es, fluctuate according to the specialization of each Electrician quali- fication programme, but in every, and all cases, it is above 50% of the total hours of training provided, and it can even reach as high as above 80% of total training. In addition to that, a mandatory period of six months (up to one year) of internship/ apprenticeship in private companies/ public organisations is foreseen.





2.2.5 Learners' support: Are career guidance and/or individualised and target-group oriented counselling services offered? What support service for potential drop-outs is foreseen?	In terms of support measures, tuition in public IEK is offered free of charge. Other measures include the incentives offered to trainees on accessing/ continuing their training, according to geographical, income, social and other criteria, and the honours/ awards provided upon performance criteria. There are career guidance/ support offices in every private IEK which connect the training centre with enterprises and inform the students about labour market needs/ demands. Within public IEK, hitherto, the Director assigns the vocational guidance programs to the teaching staff members <sup>39</sup> . Therefore, the responsibility for career guidance, counselling services and/ or support services belongs to the teacher who assumes this role under the supervision of the IEK Director. In public IEK, these services are usually offered only on a needs basis and upon request. EOPPEP <sup>40</sup> , as the National Authority for Vocational Guidance, offers considerable support in lifelong career Development for youngsters and adults. Through the Lifelong Career Development Portal <sup>41</sup> on EOPPEP's website, students/graduates can: access useful information about the labour market and education/training opportunities in Greece and Europe, chat with career guidance counsellors, com-
	mation about the labour market and education/training opportunities

### 2.3 Assessment for certification

2.3.1 Examiners:	EOPPEP creates and maintains a Register (i.e. a database) of quali-
Who is involved in the exam (single examiners/group of examiners)? What qualifications/which (professional) background are examiners required to have? Are they allowed to teach as well? How are they selected? How is their work assessed/ monitored?	fied Assessors for the certification of IEK graduates. Candidates qual- ify for entry in the Register based on their relevant educational back- ground, and/or professional license and appropriate working experi- ence, and only after they have been successful tested, in terms of their theoretical and/or practical assessment skills. Professionals, IEK trainers and public school teachers with Electrician qualification rele- vant to the specializations, have the right to participate as evaluators/ examiners, unless there is case of incompatibility (e.g. if they were the teachers/trainers of the candidates examined, etc.). EOPPEP nominates the examiners from the respective Register. In the theoret- ical part, 2 examiners are assigned to each paper, and in cases of substantial score deviations, the paper advances automatically to re- grading from a third assessor. In the practical part, candidates are assessed by a group of 3 examiners who are named according to their specialization. In order to succeed in this part, they have to re- ceive at least two passing grades. The examiners' work is monitored and assessed during the exams, by two auditors, who conduct on-

<sup>&</sup>lt;sup>39</sup> Ministerial Decision 5954/2-7-2014 (Gazette 1807/issue B'/2-7-2014): "Regulation of Operation of Vocational Training Institutes (IEK) falling under the General Secretariat of Lifelong Learning". Since 30/06/2013, responsibility for the organisation/ operation of public IEK was transferred from the General Secretariat for Lifelong Learning (GSLL) to the Regional Authorities. The GSLL keeps the authority to formulate/ supervise their educational framework (Law 3879/2010).

<sup>&</sup>lt;sup>40</sup> National Euroguidance Centre: <u>http://www.eoppep.gr/index.php/en/counseling-a-vocational-guidance-en/euro-guidance-national-centre</u>

<sup>&</sup>lt;sup>41</sup> Lifelong Career Development Portal: <u>http://e-stadiodromia.eoppep.gr/</u>





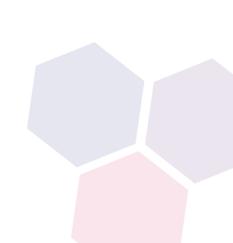
	the-spot checks in 50% of the total number of examination centres (via random sampling).
2.3.2 Entry requirement: Who has access to the exam? Do candidates have to fulfil certain requirements (e.g. age, pre- qualification, etc.)? Is prior learning recognised?	EOPPEP organises common examinations for public and private IEK graduates of all specialities, at national/regional level, according to the exam regulations per speciality <sup>42</sup> . Every candidate holding a Vocational Training Certificate (V.E.K.) after the successful completion of theoretical and practical training (5 or 4 semesters of study) at an IEK, has access to the certification exams. However, in order to complete their training, learners have to attend at least 85% of their programme and individual courses, and also fulfil the 6-month internship requirement. The scope of the exams is the certification of the graduates' qualifications, i.e. the outputs or results of their vocational training. Prior learning, however, is not recognised in terms of credit awards for the exams. Registration to the examinations includes an online subscription to the candidates' register for participation in the exams, an application, and proof of identity. Upon successful examination results, IEK graduates are awarded the Vocational Training Diploma at EQF level 5, which is recognised both in Greece and in EU member states.
2.3.3 Standards (KSC): Who defines the standards? How are they linked to the LOs? How are they linked to the labour market? Are assessment criteria based on LOs and to what extent are they used in the assessment process?	EOPPEP is responsible for defining the LOs (learning outcomes) in the respective job profiles and curricula, which take into account the labour market needs of each sector. All the above form the basis for the KSC (knowledge, skills and competencies) standards definition. The national examinations for the certification of the IEK graduates and the accreditation of their vocational training are based on the respective occupational profiles and curricula which are designed in terms of LOs. As a result, the assessment criteria for both the theo- retical and practical part of the exams are also based on LOs which are expressed in KSC standards.
2.3.4 Transparency of processes, assessment instruments, evaluation criteria: Is it necessary to make this information public?	The examination regulations (Rules of Certification of Vocational Training for each specialty) and the evaluation process/ procedures, including information on exam registration/ certificate applications, exam schedules and results, as well as a list of exam questions/ subjects/ cases for each speciality, are available via EOPPEP's website and are openly accessible to the public <sup>43</sup> . The examinations per say are not public, but two auditors are assigned to inspect them via random on-the-spot-checks for quality assurance purposes.
2.3.5 Appropriateness of assessment procedures: Which/How many assessment methods/ instruments are used? Do they correspond to real work- life situations?	For the theoretical part, candidates are required to answer a number of questions in writing (or orally for candidates with special assess- ment needs), assessing their knowledge of the cognitive aspects of their training, and establishing whether they are able to use the knowledge acquired to exercise their profession in real work-life. These questions are part of the list of subjects included in the Rules of Certification per specialty, which are notified to the public at least 20 days before the tests via EOPPEP's website. The topics of the theoretical exams are selected by the Central Examination Commit-

 <sup>&</sup>lt;sup>42</sup> A new Certification System has been established for the graduates of Vocational Training Institutes (IEK) and Vocational Training Schools (SEK) with the Joint Ministerial Decision 2944 (Gazette B 1098/30-04-2014).
 <sup>43</sup> Access at: <u>http://www.eoppep.gr/index.php/el/qualification-certificate/certificate-of-qualifications/certificate-of</u>





<b>2.3.6 Competent institution</b> : Who is in charge of the assessment? What rights does this institution have?	tee for the Certification of Vocational Training (KEEPEK) of EOPPEP, via electronic ballot, on the day of the exams. In the practical part, trainees are examined on topics selected by their group of assessors, based on a list of target skills and competencies, as described in the respective job profiles, curricula and Rules of Certification for each specialty. Practical examinations take place in laboratories and/or real workplaces which are selected by EOPPEP. The assessment methods/instruments correspond to real work–life situations, since the trainees' skills/competencies are assessed against the successful completion of work-based tasks relevant to their professional duties. EOPPEP is the body responsible for assessing IEK graduates and awarding Vocational Training Diplomas. A Central Examination Committee for the Certification of Vocational Training (K.E.E.P.E.K.) is established by decree of the Board of EOPPEP in order to conduct the certification exams, which are final examinations of the graduates in a theoretical and a practical part, in accordance with the Rules of Certification of Vocational Training for each specialty. K.E.E.P.E.K. is comprised of representatives of EOPPEP, social partners (employer and employee associations), and the Ministry of Education. In more detail, EOPPEP is in charge for the following: a) certification procedures; b) selection of examination centres/premises for the examis; c) grading participants; d) organization and operation of the examination centres; e) quality assurance of the certification process; f) placement of candidates as exam participants and appointment of examination
<b>2.3.7 Complaint management</b> : Is it possible to view the assessment results? What can learners do if they do not agree with the assessment?	The assessment results are announced on EOPPEP's website and also posted outside the examination centres as written announce- ments. No review or appeal process is provided by the legislative framework. Candidates can only request to view their theoretical ex- amination papers within one month after the announcement of re- sults, but, the announced scores are final and no changes are stipu- lated by the legislative framework of the certification process. If can- didates are successful in either the theoretical or the practical part of the exams, then they can keep their successful scores for the follow- ing six consecutive exam periods, during which they will only partici- pate in the part in which they failed.







# **3. EVALUATION**

#### **Monitoring process**

<b>1. Internal evaluation</b> : Statistical data on drop-outs and failure/success rates in the exam, satisfaction rate of individuals and employers with programme, the examination and the acquired skills/competences; results of complaint management. Are the results of internal evaluation measure made public?	According to the newly reactivated National Quality Assurance Framework <sup>44</sup> , namely the p <sup>3</sup> , an annual self-assessment is mandatory for all public IEK. This includes an evaluation in terms of compliance with the p <sup>3</sup> fundamental principles of quality, and alignment improvements. The internal evaluation of IEK is based on formative (on-going) evaluations of their policies/ procedures and management, by the GSLL/ executive management authorities, and measurable performance results against the quality indicators of p <sup>3</sup> , i.e. trainers'/ learners' performance, participation/ placement/ completion/ satisfaction rates in VET programmes, use of support services/ innovative teaching methods, certification/ recognition of qualification by the labour market, utilisation of acquired skills at the workplace, and graduate unemployment rates, based on trainee/ trainer/ graduate/ employer surveys. Results are to be documented regularly in a special database, in order to create benchmarks and support the continuous improvement of the services provided. They are also notified to the GSLL, for the overall annual report on LLL. IEK implementing self-assessment and improvement measures based on the identified areas for improvement and in accordance with the Cycle of Quality, can apply to obtain the p <sup>3</sup> mark (license) which is valid for 2 years. The p <sup>3</sup> framework was reactivated as of recently, thus the aforementioned procedures haven't been implemented yet.
2. External evaluation:	Graduate and employer surveys, including labour market feedback
Information on occupation	and information on type/ rates of employment after training, as well
obtained by individuals after	as managerial reviews by the GSLL and management authorities, are
completion of training, according	to be conducted systematically at provider level, as part of the annual
to type of training and individual	self-assessment of IEK. Their results and materials documenting the
criteria (transition), type of	findings are evaluated externally by a team of specially trained as-
employment. Are the results of	sessors, assigned by EOPPEP. Surveys may be conducted also at
external evaluation measure	national level, the results of which are notified to local IEKs, in order
made public?	to take measures for improvement. Moreover, in compliance with the
On which level is external	applicable provisions for IEK licencing/ operation requirements, GSLL
evaluation carried out	may conduct or delegate regular/ unannounced inspections during
(national/regional/provider)? Is	the implementation of the programmes, and charge penalties based
external evaluation carried out	on the result reports, which are notified to the Regional Authorities
systematically? Are graduate	and published on the official website of the GSLL within 30 days.
surveys made? How is the	During inspections, class schedules are assessed according to the
feedback of the labour market	curriculum, and in accordance with the intended LOs of each course,
taken into account? To what	as are also the qualifications of instructors, and the teaching means/
extent and how are LOs used in	methods/ equipment. P <sup>3</sup> was reactivated as of recently, thus the
this process?	afore-mentioned procedures haven't been fully implemented yet.

<sup>&</sup>lt;sup>44</sup> The p<sup>3</sup> ( $\pi$ <sup>3</sup>) framework for quality assurance in lifelong learning denotes "quality, always and everywhere". The " $\pi$ " stands for quality (*poiótita*) in educational inputs, processes and outputs: (a) Quality of inputs, i.e. human/financial natural resources used in education/training provision, infrastructure, teaching materials, programs, and teachers; (b) Quality procedures, i.e. selection of trainees/ trainers, teaching methods, vocational guidance counselling services, implementation; (c) Quality of outputs, i.e. outcomes of learning, knowledge/skills/competencies acquired after completion of training, labour market integration, etc.





# 4. REVIEW

### Conclusions

Although the implementation of the annual self-assessments of the Vocational Training Institutes (IEK) is still incomplete, since the National Quality Assurance Framework (P<sup>3</sup>) was re-activated just recently, its pilot implementation<sup>45</sup> has already led to the creation and implementation of general regulations on the operation of IEK<sup>46</sup> which stipulate continuous monitoring, evaluation and improvement of the qualification cycle. Pursuant to these rules, IEK are expected to refine their quality indicators and apply measurement and evaluation in order to form plans for improvement, by using the Cycle of Quality (with its 5 stages: planning, implementation, measurement, evaluation and review) and the P<sup>3</sup> scoring tool that assists in prioritizing improvements. These processes of self-assessment together with the external inspections/ evaluations and the national benchmarking, as well as the re-assessment of their structures and student performance will lead to the improvement of IEK systems/ procedures, including the alignment of course timetables with the certified Electrician curricula and intended LOs, trainer qualification, training means/ methods/ equipment.

For the purpose of ensuring responsiveness to the changing needs of the economy, the effectiveness of the training programmes is to be evaluated against the degree of certification of the qualification acquired and the degree of usefulness of the acquired skills at the workplace, in order to lead to their review. Feedback from the labour market is to be collected systematically not only in the planning phase of the development of job profiles and curricula, but since the labour market actors are members of the Governing Board of EOPPEP and the advisory committees, their feedback is requested and included in the revision/ updating of programmes during the whole development cycle of qualifications. Certified programmes leading to Electrician qualification at level 5 are to be adjusted to the specific job profiles within the specialties that are in demand in the labour market and their respective curricula are to be reassessed, evaluated and, if deemed necessary, renewed at least every six years. Currently, the Ministry of Education, in collaboration with the stakeholders, is creating a new system for early identification of labour market needs and skill demands in order to improve their matching with the qualification acquired by vocational training.

Another outcome of the pilot implementation and evaluation of the p<sup>3</sup> quality assurance framework was the creation and implementation of a uniform selection and evaluation system for IEK trainers (Register of Educators of non-formal Adult Education), with requirements of teaching competence (Educational Attainment certification process of Adult Educators) and a common point system (criteria) for all IEK in Greece, which also provides for the establishment of a system for the continuous education, evaluation and skill updating of educators and staff involved in non-formal vocational education and training.

 <sup>&</sup>lt;sup>45</sup> The 1<sup>st</sup> pilot phase took place in 2011 and its results were evaluated in 2012; the 2<sup>nd</sup> pilot phase occurred in 2013, and lead to a revised edition of p<sup>3</sup> and an action plan for its establishment as of the end of 2015.
 <sup>46</sup> Ministerial Decision 5954/2-7-2014 (Gazette 1807/issue B'/2-7-2014): "Regulation of Operation of Vocational

Training Institutes (IEK) falling under the General Secretariat of Lifelong Learning".



# **Example 3: Automobile Repair qualification group**

Qualification awarding body	National Organisation for the Certification of Qualifications and Vocational Guidance (EOPPEP)
Legal basis	Law 2209/1992 on the National System of Vocational Education and Training & Law 4186/2013 on the Restructure of Secondary Education
NQF-level / EQF-level	NQF/ EQF level 5
ISCED-2011	Post-secondary (non-tertiary) education at ISCED 4
Qualification focus	Basic training on specialized technical IVET qualification; acquisition of automobile mechanics/engineering/electronics/automation/ systems, machine technology/craft applications, and green subject-specific skills, as well as entrepreneurial <sup>47</sup> competencies.
Entitlements	Setting up a company and training apprentices; may work either as self- employed, or, as employees in automobile service/ car repair and mainte- nance companies, in spare parts marketing companies, in garages for car assembly and accessory placement, or in power units using internal com- bustion engines, in public/ private vehicle control services and organisa- tions, as well as in car industries, according to their specialty.

The qualification group "Automobile Repair" in a nutshell:

The "Automobile Repair" qualification group is a considerably widespread group of technical qualifications in Greece, related with the following specialities/ professions: <u>Automobile Technician</u>, <u>Automobile Electrical Technician</u>, and <u>Automobile Paint and Body Repair Technician</u>. Training for these 3 specialities is provided by the Vocational Training Institutes (IEK), and comprises of 4 semesters of theoretical/ laboratory training and one semester of apprenticeship, leading to the certification of the relevant qualifications (Level 5). Qualifications of this type are acquired only via validation of training through certification exams. The automobile repair sector is a prevailing economic sector of Greece, in which, more than 10.000 enterprises are active, and about 25.000 employees and self-employed professionals are occupied.

The main tasks/functions of the Automobile Repair qualification group at level 5 are: a) car diagnostics and damage discovery b) check control c) repair and maintenance of all mechanical and electrical systems of the car d) automobile body repair and painting. According to national legislation, holders of the Automobile Repair qualification certification are entitled to work as sector licensed professionals. In the past few years several automobile service/ car repair and maintenance companies have closed down as a result of the economic crisis and the inability to adapt to the demands of the new economic environment. Most of the professionals in this sector are self-employed, and the low adaptability rate keeps reducing the number of auto repair companies. Nonetheless, prospects for the aforementioned professionals are relatively good if they demonstrate the required knowledge, skills and competencies.

The presentation of the quality assurance (QA) mechanism follows the **lifecycle of qualification**, i.e. from needs analysis to review of qualification. In order to structure the information herein, we use the four phases of the **European Quality Assurance Reference Framework (EQARF)**<sup>48</sup>:

Phase 1: planning Phase 2: implementation Phase 3: evaluation Phase 4: review

<sup>&</sup>lt;sup>47</sup> i.e. operate with autonomy in their field of work, supervise others, develop initiatives in fields of their specialty, collaborate/ communicate effectively with others, operate according to professional ethics, etc.

<sup>&</sup>lt;sup>48</sup> The EQARF is a reference instrument to help Member States and VET providers to promote and monitor continuous improvement of their VET systems and/or VET provision based on common European references (cf. <u>http://www.eqavet.eu/gns/policy-context/european-quality-assurance-reference-framework.aspx</u>).





### **1. PLANNING**

### **Needs analysis**

1. Labour market information: Do you collect data at this stage of the qualification development process? If so which data? How do you collect data? Who is in charge of collecting data? Are stakeholders involved? What are the roles of companies and of business organisations?	In view of assisting labour market accession, public and private Voca- tional Training Institutes ("IEK") in Greece, are tasked with providing high-level qualifications. This is achieved by a long qualification de- velopment process corresponding to specific job profiles <sup>49</sup> based on specialties with high labour market demand that reflect the needs of the economy and the proposals of stakeholders. The National Organ- isation for the Certification of Qualifications & Vocational Guidance <sup>50</sup> ("EOPPEP"), which accredits and licences all VET providers in Greece, is responsible for the development of job profiles, upon which the study programmes and the curricula are based. These job profiles are developed with the input of the stakeholders and are later certified by EOPPEP. The moderators of the relevant working- groups, set-up by the Education Ministry, are responsible for the re- search. Labour market information is collected via: a) Desk research (literature review, sectoral studies, vocational monographs, and data from stakeholders and the National Statistical Service); b) A variation of the expert-based "Delphi surveys" with semi-structured question- naires; c) Interviews with professionals in the Automobile Repair qualification group; d) Review/ feedback from relevant professional organizations of Employers and Employees. The whole process is developed after consultation with advisory committees of experts, representatives of chambers, employers/ employees associations, etc. The major social partners that co-sign the National General Col- lective Agreement are highly involved in this phase, as their repre- sentatives sit on the committees and the board of EOPPEP.
2. Justification: Is it necessary to justify the introduction of a new programme/ qualification or update an existing one? Who is in charge of the justification/motivation report? Are stakeholders involved?	The job profiles related to the Automobile Repair qualification group are novel; thus, their introduction or update doesn't require any justi- fication. By and large, EOPPEP is in charge of the justification report every six years, with the active contribution of the relevant stakehold- ers. It is included in the qualification report developed by EOPPEP, which describes the updating process.
3. Piloting / pre-testing: Is there a pilot stage before the qualification is "formally" introduced? If so, who is involved in this phase? How is the qualification tested/ piloted/ evaluated? What does this pilot	No pilot stage and/ or pre-testing is foreseen when a new Automobile Repair qualification is formally introduced.

<sup>&</sup>lt;sup>49</sup> An occupational (or job) profile in Greece includes, inter alia, the definition of the job and/or speciality, background history, current legal framework, job functions and the required knowledge, skills and competencies for exercising the occupation or speciality, as well as proposed pathways for acquiring the qualification and indicative ways of accessing them.

<sup>&</sup>lt;sup>50</sup> EOPPEP is the national authority for the accreditation of VET and the certification of qualifications. It aims at linking VET with labour market needs, upgrading people's occupational qualifications and enhancing their employment perspectives. EOPPEP is also the statutory body for the development and implementation of the Hellenic Qualifications Framework (NQF) in alignment with the European Qualifications Framework (EQF). <u>http://www.eoppep.gr/index.php-/en/eoppep-en</u>





phase involve? What consequences does this have?

### 2. IMPLEMENTATION

2.1 Design of new and updating of existing curricula and trainings regulations

2.1.1 Legal basis / competent authority: Who is responsible for the design of the curriculum/training regulation? What exactly is legally regulated (examination areas, KSC standards, etc.)?	The detailed curricula of each Automobile Repair qualification spe- cialty are developed by the General Secretariat for Lifelong Learning (hereinafter referred to as the "GSLL") which also supervises their implementation, and are later certified by EOPPEP. The GSLL is also responsible for drawing up the training regulation and the Minister of Education for their approval. The training regulation concerns the following: the organisation of all aspects of education/training, intern- ships/ apprenticeships, the quality assurance procedures/ criteria and the internal/ external evaluation. Based on the training regulation per specialty, EOPPEP is responsible for the training accreditation exam- inations and the certification of the Vocational Training Institutes (hereinafter referred to as "IEK") graduates.
2.1.2 Standards for the process of designing of curricular and training regulations: Are there standard procedures for the development of qualifications? Are there templates to be used?	The GSLL is responsible for the training curricula/regulation design process. Curricula are drawn up by GSLL taking into account any existing job profile and/or the required vocational standards, in accordance with the ECVET <sup>51</sup> guidelines. There are Curricular Templates and Training Regulation Templates for each specialty. The law specifies the standard procedures for designing curricula/ regulations in terms of: (a) All matters of organizing the students' education/training, i.e. study programmes, internships/ apprenticeships etc. (b) Quality assurance, i.e. responsible bodies, procedures, criteria; (c) Transparency of administrative/ teaching processes and decisions; (d) Processes of internal evaluation and improvement, formative/ student assessment (i.e. research and external evaluation). EOPPEP, within its competence of accrediting job profiles and curricula standards, is planning to develop standards/ specifications for modularised curricula with credits, based upon the accredited occupational profiles. These procedures are relatively new, thus they haven't been fully implemented yet.
<b>2.1.3 Review and update of</b> <i>curricula</i> : Are curricula regularly assessed and reviewed?	According to Greek law <sup>52</sup> , all curricula are to be regularly assessed, revised and updated, at least once every six years, by the GSLL and EOPPEP. This process is relatively new and given the challenge of restructuring the Greek VET system and improving its quality assurance, it has not been fully implemented yet (e.g. updating the learning outcomes in the job profiles remains pending).

<sup>&</sup>lt;sup>51</sup> The European Credit System for Vocational Education and Training (ECVET) is a "technical framework for the transfer, recognition and, where appropriate, accumulation of individuals' learning outcomes with a view to achieving a qualification." More information at: http://ec.europa.eu/education/policy/vocational-policy/ecvet en.htm

<sup>&</sup>lt;sup>52</sup> Law 4186/2013 (Government Gazette 193/issue A'/17-9-2013): "Restructuring of Secondary Education and other regulations". It contains regulations regarding Upper Secondary Schools, Vocational Upper Secondary Schools, the National Organisation of Examinations, the organisation and operation of bodies in non-formal education, the certificates of vocational education and training and the professional rights, the organisation of the regional bodies of nonformal education of the Ministry of Education and Religious Affairs.



tion levels to the EQF.



<b>2.1.4 Involvement of key stake- holders:</b> Are stakeholders (social partners, companies, sector organisations, pedagogical experts, VET providers, etc.) involved in the design of new / in the update of existing curricula/training regulations? Note: If you refer to stakeholder involvement in each criterion, there is no need to have a separate criterion for this.	The involvement and engagement of all key stakeholders is a matter of high priority in Greece. All major social partners from the Employ- ers' and Employees' side, in partnership with their scientific or/ and VET centres, pedagogical experts and representatives of EOPPEP, the Ministry of Education and all the other competent authorities, are involved in the development of curricula for IVET qualification attain- ment. Furthermore, representatives of the social partners are regular members of the Governing Board of EOPPEP, which is the national organisation for the accreditation of VET and the certification of quali- fications.
<b>2.1.5 Link to the labour market</b> : How is the curriculum linked to labour market needs? How is it guaranteed that the curriculum complies with labour market and company needs?	Relevance to labour market needs is assured via the involvement of labour market actors in the development of job profiles, based upon which the curricula are shaped, and via the emphasis on work-based training and compulsory apprenticeships/internships, and via regular updating of the curricula, as needed, and at least once every six years. The GSLL nominates experts and organises expert working groups for each specialty. These working groups review the curricu- lum with the active participation of the social partners and other rele- vant stakeholders. Furthermore, in response to the skill matching challenge, the Ministry of Education is establishing a new system for early identification of labour market needs and skill demands, in which the social partners will play an important advisory role.
2.1.6 Application of learning outcome concept: Are LOs used in curricula/training regulations? How are they defined? Which domains of learning are used? Who is involved in the definition and what role do they have? Who is involved in the design of curricula/training regulations? How is the cooperation coordinated?	In an effort to upgrade VET provision, by increasing transparency and strengthening accountability of qualifications, all new and/or updated vocational education and training curricula, are to be designed based on Learning Outcomes (LOs). A methodology <sup>53</sup> was developed in 2006 for analysing job profiles (in functions) by incorporating the LO approach, which lead to 202 detailed job profiles based on learning outcomes, as of yet. LOs are used also when describing qualifications in the national qualification levels (classified in knowledge, skills and competencies) <sup>54</sup> , new curricula, and/ or when designing assessment approaches.
2.1.7 Information in curricula and training regulations: What information is provided in curricula/training regulations (e.g. title, duration, entry requirements, learning contents, costs, etc.)?	The Automobile Repair qualification curricula and training regulation are illustrated in the respective 'study guide' per specialty. Each study guide includes a distinct job profile, matching of specialties with voca- tional classifications, a detailed curriculum, the LOs expressed as knowledge, skills and competencies for each subject, a timetable for the teaching materials in line with the LOs, information on credits, costs, duration of study and teacher qualification, instructions for teachers/ trainers on knowledge assessment, teaching methods and learning tools, as well as specifications for the exams and the as- sessment of knowledge and guidelines for the certification of the LOs.

<sup>&</sup>lt;sup>53</sup> Ministerial Decree 110998/19-04-2006 (Gazette 566/B'/02-05-2006) "On the Accreditation of Occupational Profiles" <sup>54</sup> EOPPEP has developed a methodology for designing LOs based on KSC standards, using EQF definitions. The LOs constitute the qualifications of each level of the National Quality Framework (N.Q.F.) which includes a set of skills, competences and knowledge. Thus, LOs are used for describing qualifications and referring national qualifica-







2.1.8 Pathways, progression and bridges (permeability): What does this certificate entitle its holder to do (on the labour market and within the education system)?	Holders of the 'Vocational Training Diploma' ( <i>Diploma Epaggelmatikis Eidikotitas I.E.K.</i> ) <sup>55</sup> in specializations within the Automobile Repair qualification group at level 5, may work in their own specialty, as self-employed or as employees in the private or public <sup>56</sup> sector. According to national legislation, qualification holders are entitled to work as legally licensed professionals in the automobile industry. They can start and run their own business in their respective profession and train apprentices, e.g. 'Automobile Technicians' in car service/ repair/maintenance, power units using internal combustion engines, vehicle control, car industries, 'Automobile Paint & Body Repair Technicians' in car maintenance/ repair/paint and 'Automobile Electrical Technicians' in car repair/assembly, accessory placement (garages), spare parts marketing, etc. In accordance with the Hellenic NQF <sup>57</sup> , holders of this type of qualification do not have access to upper levels of education/ training such as tertiary academic education at levels 6–8.
<b>2.1.9 Entrepreneurial attitude</b> <b>and skills</b> : Do they play a role in the curriculum? In what way are they imparted?	Teaching is organized in specialties and each Automobile Repair specialty offers its own distinct package of subjects/ courses. Within all specializations leading to Automobile Repair qualifications, specif- ic courses/ modules are included in the curricula, aiming to cultivate an entrepreneurial mind-set and develop entrepreneurial skills (e.g. Business Dexterity, Communication Techniques, Car Shop Organisa- tion and Operation, etc.), as well as the instruction of English and new technologies which is considered a pre-requisite for success in the new economy. Capacity building approaches combine theoretical knowledge with practical training.
2.1.10 Companies as learning sites: What is the share of practical learning (work-based, work-place learning)? How is it organised? How are practical learning phases quality assured? How are they assessed? How are they linked to the theoretical tuition?	Training includes 4 semesters of theoretical, laboratory and mixed courses, as well as 1 semester of apprenticeship or internship which is counted for the obtainment of professional rights. Learning is shared in 1200 hours of specialized theoretical, practical laboratory and mixed training, and six months (960 hours, i.e. 6 – 8 hours per day/ 5 days per week) of apprenticeship/ internship, which is mandatory and can be subsidised by national and/or EU funds. Only trainees, who have completed 120 daily wages in the specialization they are enrolled in, can be exempted from the 5 <sup>th</sup> semester of apprenticeship, if they choose to. In this way, the programmes help trainees gain initial working experience in the Automobile Repair sector, relevant to their training, and ease their transition to work. Practical learning occurs in appropriately equipped laboratories and during the Apprenticeship/Internship, which takes place either in parallel with the final (2) semesters of study, or in a fifth semester, following the completion of study; it can extend maximum to 1 year. Hitherto, theoreti-

<sup>&</sup>lt;sup>55</sup> The Vocational Training Diploma can be acquired after the completion of 4/5 semesters of study (depending on whether the Apprenticeship/ Internship will take place in parallel or after the 4 semesters of training) at a public/private Vocational Training Institute (I.E.K.) attested by a Vocational Training Certificate (V.E.K.), and success in the theoretical and practical parts of the vocational training accreditation examinations organised and operated by EOPPEP.

<sup>&</sup>lt;sup>56</sup> The 'Vocational Training Diploma' is recognised as qualification for appointment in the public sector falling in the category 'secondary education' according to the Presidential Decree no.50/2001 (Greek Official Gazette 39/vol. A/ 5-3-2001).

<sup>&</sup>lt;sup>57</sup> Hellenic Qualification Framework (H.Q.F.): <u>http://en.nqf.gov.gr/index.php/en/</u> | The Greek Qualification Register: <u>http://proson.eoppep.gr/en</u>





	cal subjects are taught only in classrooms and laboratory courses exclusively in laboratory centres, while mixed courses combine both (theoretical training and skills acquisition). Since 2013, public IEKs may also offer distance learning curricula <sup>58</sup> . The ratio of theoretical, laboratory and mixed hours of training, as provided by the study guides, must be completed upon the end of each semester. <sup>59</sup> Work-based learning takes place during the intern- ship/ apprenticeship (at a workplace, i.e. private company, relevant departments of the public sector, etc.) where the trainees can acquire professional experience relevant to their Automobile Repair speciali- zation. Quality assurance, and supervision, coordination and evalua- tion of internships fall under the responsibility of the IEK Directors or the 'Internship Coordinators' who are designated members of the IEK teaching staff. The Internship Coordinator is responsible for monitor- ing the work of the trainees, ensuring the quality of the working envi- ronment and the physical attendance of the trainee, documenting and filing relevant monthly progress reports.
2.1.11 Entry requirements: Who is accepted to the programme/qualifications? What criteria do learners have to fulfil (e.g. age, pre-qualification, etc.)? Is prior learning recognised?	Access to programmes leading to Automobile Repair qualifications at level 5 can be granted to everyone who is at least 18 years old, and a graduate of formal (non-compulsory) upper secondary education, general and/or vocational. Graduates of the General Upper- Secondary Schools ( <i>GEL-Geniko Lykeio</i> ) are entitled to enrol in the Automobile Repair programmes of IEK, in order to acquire initial training, while graduates of Vocational Upper-Secondary Schools ( <i>EPAL-Epaggelmatiko Lykeio</i> ), Vocational Schools ( <i>EPA.S-Epagelmatiki Sholi</i> ) and Vocational Training Schools ( <i>SEK-Sholi Ep- agelmatiki Sholi</i> ) and Vocational Training Schools ( <i>SEK-Sholi Ep- agelmatikis Katartisis</i> ) <sup>60</sup> , in order to complete their vocational training. Admission requirements include an upper-secondary school certifi- cate (or a university degree) and a duly submitted application with the candidate's specialization preference accompanied with the required supporting documents. Prior vocational training certified by an EPA.S or EPAL school degree, in a specialty related to the one applied for, may grant admission to the 3 <sup>rd</sup> semester of study (e.g. IEK operated by OAED - the Manpower Employment Organisation). Several criteria are taken into account for the selection of candidates such as: a) the grade of the upper-secondary school degree/ certificate; b) relevant work experience; c) social criteria (e.g. age, large family members, single parents, etc.), d) date of graduation from upper-secondary General or Vocational school. Prior learning of candidate trainees in the workplace is awarded points as "professional experience" counting towards their selection. Candidates with certified qualification can be exempt, upon their re- quest and approval by the IEK Director, from respective subjects, excluding the professional foreign language terminology courses.

<sup>&</sup>lt;sup>58</sup> According to Law 4186/2013, IEK may offer distance learning courses for Automobile Repair qualification, upon the development and accreditation of appropriate study programmes/ educational materials which fall under the jurisdiction of the GSLL.

<sup>&</sup>lt;sup>59</sup> Upon Ministerial Decision 5954/23-6-2014

<sup>&</sup>lt;sup>60</sup> The three-year long alternance programmes (Vocational Training Schools, SEK) leading to qualifications EQF level 3, which were introduced and offered by the Ministry of Education at upper secondary level in 2013-14, have been discontinued.





### 2.2 Implementation of tuition

2.2.4 Teachang and the	
2.2.1 Teachers and trainers: Who can teach in the programme leading to the qualification in question? Which qualifications are they required to have? Is there obligatory in-service training for these teachers?	University professors, secondary education teachers, adult trainers, special scientific personnel (e.g. special education teachers, etc.), and professionals having the required statutory formal qualification, can teach in programmes leading to Automobile Repair qualification at level 5, provided they are members of the Register of Adult Educators kept by EOPPEP. As of 2014, educational proficiency became a prerequisite, thus, instructors of public and private IEK must become evaluated and certified in terms of the required knowledge, skills and ability to work as adult trainers, before entering the Register. They may also have to attend a Teacher's Training programme, unless they already hold a Bachelor's in adult education, or are members of the former adult educator sub-registries, or university professors, or have at least 150 hours of teaching experience with adults. A list of required trainer qualifications by subject is included in the study guides of the programmes leading to Automobile Repair qualification at level 5. A relevant Bachelor's diplomal degree in Engineering or other related specialties (e.g. Automobile Engineering, Electrical Engineering, etc.) at EQF level 6, and 3 years of certified teaching or working experience in the respective subject' specially of the Automobile industry is mandatory for teaching theoretical courses. Secondary education teachers in vocational schools ( <i>EPAL/EPA.S.</i> ) and professionals who hold qualification at level 4 or 5 (graduates of secondary vocational education and/or IEK) may teach practical subjects in laboratories or become trainer assistants, provided that they have minimum 5 or 10 years relevant working experience. Recruitment of IEK teachers/ trainers depends highly upon their relevant professional and/or teaching experience in the subjects they wish to teach. For their selection, and in line with the courses they wish to teach, work experience, secial skills and social criteria are taken into account. In-service training short obligatory, and their certif
	trainer selection processes and procedures in detail.
<b>2.2.2 Equipment and tools</b> : Is there special equipment required for the tuition?	The study guides of programmes leading to Automobile Repair quali- fication, per speciality, include an indicative list of the minimum spe- cial requirements in terms of educational means and tools, i.e. re- quired infrastructure, tools and equipment, educational methodolo- gies, as well as any additional educational materials (i.e. internship materials) for the theoretical, laboratory and mixed courses. For the





2.2.3 Teaching and training materials: Who compiles these materials? Who guarantees that the contents are relevant and up-to-date?	theoretical part video projector, slide projector etc. are used as edu- cational tools and specialized courses may be carried out with inno- vative methods (e-learning, simulations, case studies, role playing etc.), while laboratory and part of mixed subjects are taught in the Laboratory Centres which are fully equipped with mechanical equip- ment and tools (garage tools, measuring and regulation instruments). Furthermore, laboratories must be equipped with cars (in working condition), car engines and car parts sections, petrol engines, diesel engines, operating systems simulators, training dashboards, tech- nical books, repair and maintenance books (manuals), diagnostic equipment and tools, control devices, fault diagnosis devices, etc. Neither certified teaching materials nor textbooks are used in IEKs, due to the nature of the training provided. IEK teachers/ trainers are independent and autonomous in finding, preparing, updating and distributing teaching materials to the trainees. They are, however, guided by the relevant curricula, syllabus and suggested training content of all the theoretical/ laboratory modules which are tailored to the intended LOs of each course and are outlined in the respective study guides per Automobile Repair specialty. The GSLL supervises the implementation of the curricula, evaluates, reassesses and up- dates them at least every six years, and their certification is conduct- ed by EOPPEP. IEK instructors are assisted in compiling their teach- ing/training materials, as well as in all their duties by the Director of each IEK who provides guidelines, and also by their colleagues through teamwork, which is highly encouraged.
2.2.4 Pedagogy: Which teaching methods are used? How much practical training (in companies, but also in laboratories, workshops, etc.) is foreseen?	The use of appropriate teaching methods and adult education tech- niques, as well as the suitability and regular updating of the instruc- tors' teaching skills, constitute required conditions for ensuring the quality of training. For this reason, the respective curricula (shown in the study guides per specialty) include clear instructions regarding the qualifications of instructors for each course and the educational means, methodologies and tools. Nevertheless, the selection of the most appropriate training methods and their proper implementation remains at the discretion of the IEK teachers/ trainers. Hours of practical training, within the framework of laboratory cours- es, fluctuate according to the specialization of each Automobile Re- pair qualification programme, but in every, and all cases, it is above 50% of the total hours of training provided, and it can even reach as high as above 80% of total training. In addition to that, a mandatory period of six months (up to one year) of internship/ apprenticeship in private companies/ public organisations is foreseen.
<b>2.2.5 Learners' support</b> : Are career guidance and/or individualised and target-group oriented counselling services offered? What support service for potential drop-outs is foreseen?	In terms of support measures, tuition in public IEK is offered free of charge. Other measures include the incentives offered to trainees on accessing/ continuing their training, according to geographical, income, social and other criteria, and the honours/ awards provided upon performance criteria. There are career guidance/ support offices in every private IEK which connect the training centre with enterprises and inform the students about labour market needs/ demands.





Within public IEK, hitherto, the Director assigns the vocational guid-
ance programs to the teaching staff members <sup>61</sup> . Therefore, the re-
sponsibility for career guidance, counselling services and/ or support
services belongs to the teacher who assumes this role under the
supervision of the IEK Director. In public IEK, these services are usu-
ally offered only on a needs basis and upon request.
EOPPEP <sup>62</sup> , as the National Authority for Vocational Guidance, offers
considerable support in lifelong career development for youngsters
and adults. Through the Lifelong Career Development Portal <sup>63</sup> on
EOPPEP's website, students/graduates can: access useful infor-
mation about the labour market and education/training opportunities
in Greece and Europe, chat with career guidance counsellors, com-
plete tests on their interests, values and professional decisions and
develop e-Portfolios. Nevertheless, accessing and benefiting from
these services remains the learners' responsibility.

### 2.3 Assessment for certification

2.3.1 Examiners: Who is involved in the exam (single examiners/group of examiners)? What qualifications/ which (professional) background are examiners required to have? Are they allowed to teach as well? How are they selected? How is their work assessed/ monitored?	EOPPEP creates and maintains a Register (i.e. a database) of quali- fied Assessors for the certification of IEK graduates. Candidates qual- ify for entry in the Register based on their relevant educational back- ground, and/or professional license and appropriate working experi- ence, and only after they have been successful tested, in terms of their theoretical and/or practical assessment skills. Professionals, IEK trainers and public school teachers with Automobile Repair qualifica- tion relevant to the specializations, have the right to participate as evaluators/ examiners, unless there is case of incompatibility (e.g. if they were the teachers/trainers of the candidates examined, etc.). EOPPEP nominates the examiners from the respective Register. In the theoretical part, 2 examiners are assigned to each paper, and in cases of substantial score deviations, the paper advances automati- cally to re-grading from a third assessor. In the practical part, candi- dates are assessed by a group of 3 examiners who are named ac- cording to their specialization. In order to succeed in this part, they have to receive at least two passing grades. The examiners' work is monitored and assessed during the exams, by two auditors, who conduct on-the-spot checks in 50% of the total number of examina- tion centres (via random sampling).
<b>2.3.2 Entry requirement</b> : Who has access to the exam? Do candidates have to fulfil certain	EOPPEP organises common examinations for public and private IEK graduates of all specialities, at national/regional level, according to the exam regulations per speciality <sup>64</sup> . Every candidate holding a Vo-

<sup>&</sup>lt;sup>61</sup> Ministerial Decision 5954/2-7-2014 (Gazette 1807/issue B'/2-7-2014): "Regulation of Operation of Vocational Training Institutes (IEK) falling under the General Secretariat of Lifelong Learning". Since 30/06/2013, responsibility for the organisation/ operation of public IEK was transferred from the General Secretariat for Lifelong Learning (GSLL) to the Regional Authorities. The GSLL keeps the authority to formulate/ supervise their educational framework (Law 3879/2010).

<sup>&</sup>lt;sup>62</sup> National Euroguidance Centre: <u>http://www.eoppep.gr/index.php/en/counseling-a-vocational-guidance-en/eurogui-</u> <u>dance-national-centre</u>

<sup>&</sup>lt;sup>63</sup> Lifelong Career Development Portal: <u>http://e-stadiodromia.eoppep.gr/</u>

<sup>&</sup>lt;sup>64</sup> A new Certification System has been established for the graduates of Vocational Training Institutes (IEK) and Vocational Training Schools (SEK) with the Joint Ministerial Decision 2944 (Gazette B 1098/30-04-2014).





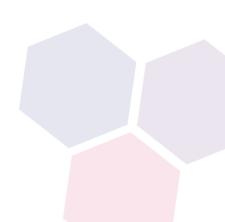
requirements (e.g. age, pre- qualification, etc.)? Is prior learning recognised?	cational Training Certificate (V.E.K.) after the successful completion of theoretical and practical training (5 or 4 semesters of study) at an IEK, has access to the certification exams. However, in order to com- plete their training, learners have to attend at least 85% of their pro- gramme and individual courses, and also fulfil the 6-month internship requirement. The scope of the exams is the certification of the gradu- ates' qualifications, i.e. the outputs or results of their vocational train- ing. Prior learning, however, is not recognised in terms of credit awards for the exams. Registration to the examinations includes an online subscription to the candidates' register for participation in the exams, an application, and proof of identity. Upon successful exami- nation results, IEK graduates are awarded the Vocational Training Diploma at EQF level 5, which is recognised both in Greece and in EU member states.
<b>2.3.3 Standards (KSC)</b> : Who defines the standards? How are they linked to the LOs? How are they linked to the labour market? Are assessment criteria based on LOs and to what extent are they used in the assessment process?	EOPPEP is responsible for defining the LOs (learning outcomes) in the respective job profiles and curricula, which take into account the labour market needs of each sector. All the above form the basis for the KSC (knowledge, skills and competencies) standards definition. The national examinations for the certification of the IEK graduates and the accreditation of their vocational training are based on the respective occupational profiles and curricula which are designed in terms of LOs. As a result, the assessment criteria for both the theo- retical and practical part of the exams are also based on LOs which are expressed in KSC standards.
2.3.4 Transparency of processes, assessment instruments, evaluation criteria: Is it necessary to make this information public?	The examination regulations (Rules of Certification of Vocational Training for each specialty) and the evaluation process/ procedures, including information on exam registration/ certificate applications, exam schedules and results, as well as a list of exam questions/ subjects/ cases for each speciality, are available via EOPPEP's website and are openly accessible to the public <sup>65</sup> . The examinations per say are not public, but two auditors are assigned to inspect them via random on-the-spot-checks for quality assurance purposes.
2.3.5 Appropriateness of assessment procedures: Which/How many assessment methods/ instruments are used? Do they correspond to real work- life situations?	For the theoretical part, candidates are required to answer a number of questions in writing (or orally for candidates with special assess- ment needs), assessing their knowledge of the cognitive aspects of their training, and establishing whether they are able to use the knowledge acquired to exercise their profession in real work-life. These questions are part of the list of subjects included in the Rules of Certification per specialty, which are notified to the public at least 20 days before the tests via EOPPEP's website. The topics of the theoretical exams are selected by the Central Examination Commit- tee for the Certification of Vocational Training (KEEPEK) of EOPPEP, via electronic ballot, on the day of the exams. In the practical part, trainees are examined on topics selected by their group of assessors, based on a list of target skills and competencies, as described in the respective job profiles, curricula and Rules of Certification for each specialty. Practical examinations take place in laboratories and/or

<sup>&</sup>lt;sup>65</sup> Access at: <u>http://www.eoppep.gr/index.php/el/qualification-certificate/certificate-of-qualifications/certificate-graduates</u>





	real workplaces which are selected by EOPPEP. The assessment methods/instruments correspond to real work–life situations, since the trainees' skills/competencies are assessed against the successful completion of work-based tasks relevant to their professional duties.
<b>2.3.6 Competent institution</b> : Who is in charge of the assessment? What rights does this institution have?	EOPPEP is the body responsible for assessing IEK graduates and awarding Vocational Training Diplomas. A Central Examination Committee for the Certification of Vocational Training (K.E.E.P.E.K.) is established by decree of the Board of EOPPEP in order to conduct the certification exams, which are final examinations of the graduates in a theoretical and a practical part, in accordance with the Rules of Certification of Vocational Training for each specialty. K.E.E.P.E.K. is comprised of representatives of EOPPEP, social partners (employer and employee associations), and the Ministry of Education. In more detail, EOPPEP is in charge for the following: a) certification proce- dures; b) selection of examination centres/premises for the exams; c) grading participants; d) organization and operation of the examination centres; e) quality assurance of the certification process; f) placement of candidates as exam participants and appointment of examiners; g) exam fees; h) announcement of the exam results and awarding titles.
<b>2.3.7 Complaint management</b> : Is it possible to view the assessment results? What can learners do if they do not agree with the assessment?	The assessment results are announced on EOPPEP's website and also posted outside the examination centres as written announce- ments. No review or appeal process is provided by the legislative framework. Candidates can only request to view their theoretical ex- amination papers within one month after the announcement of re- sults, but, the announced scores are final and no changes are stipu- lated by the legislative framework of the certification process. If can- didates are successful in either the theoretical or the practical part of the exams, then they can keep their successful scores for the follow- ing six consecutive exam periods, during which they will only partici- pate in the part in which they failed.







# **3. EVALUATION**

#### **Monitoring process**

<b>1. Internal evaluation</b> : Statistical data on drop-outs and failure/success rates in the exam, satisfaction rate of individuals and employers with programme, the examination and the acquired skills/competences; results of complaint management. Are the results of internal evaluation measure made public?	According to the newly reactivated National Quality Assurance Framework <sup>66</sup> , namely the p <sup>3</sup> , an annual self-assessment is mandatory for all public IEK. This includes an evaluation in terms of compliance with the p <sup>3</sup> fundamental principles of quality, and alignment improvements. The internal evaluation of IEK is based on formative (on-going) evaluations of their policies/ procedures and management, by the GSLL/ executive management authorities, and measurable performance results against the quality indicators of p <sup>3</sup> , i.e. trainers'/ learners' performance, participation/ placement/ completion/ satisfaction rates in VET programmes, use of support services/ innovative teaching methods, certification/ recognition of qualification by the labour market, utilisation of acquired skills at the workplace, and graduate unemployment rates, based on trainee/ trainer/ graduate/ employer surveys. Results are to be documented regularly in a special database, in order to create benchmarks and support the continuous improvement of the services provided. They are also notified to the GSLL, for the overall annual report on LLL. IEK implementing self-assessment and improvement measures based on the identified areas for improvement and in accordance with the Cycle of Quality, can apply to obtain the p <sup>3</sup> mark (license) which is valid for 2 years. The p <sup>3</sup> framework was reactivated as of recently, thus the aforementioned procedures haven't been implemented yet.
2. External evaluation:	Graduate and employer surveys, including labour market feedback
Information on occupation	and information on type/ rates of employment after training, as well
obtained by individuals after	as managerial reviews by the GSLL and management authorities, are
completion of training, according	to be conducted systematically at provider level, as part of the annual
to type of training and individual	self-assessment of IEK. Their results and materials documenting the
criteria (transition), type of	findings are evaluated externally by a team of specially trained as-
employment. Are the results of	sessors, assigned by EOPPEP. Surveys may be conducted also at
external evaluation measure	national level, the results of which are notified to local IEKs, in order
made public?	to take measures for improvement. Moreover, in compliance with the
On which level is external	applicable provisions for IEK licencing/ operation requirements, GSLL
evaluation carried out	may conduct or delegate regular/ unannounced inspections during
(national/regional/provider)? Is	the implementation of the programmes, and charge penalties based
external evaluation carried out	on the result reports, which are notified to the Regional Authorities
systematically? Are graduate	and published on the official website of the GSLL within 30 days.
surveys made? How is the	During inspections, class schedules are assessed according to the
feedback of the labour market	curriculum, and in accordance with the intended LOs of each course,
taken into account? To what	as are also the qualifications of instructors, and the teaching means/
extent and how are LOs used in	methods/ equipment. P <sup>3</sup> was reactivated as of recently, thus the
this process?	afore-mentioned procedures haven't been fully implemented yet.

<sup>&</sup>lt;sup>66</sup> The p<sup>3</sup> ( $\pi$ <sup>3</sup>) framework for quality assurance in lifelong learning denotes "quality, always and everywhere". The " $\pi$ " stands for quality (*poiótita*) in educational inputs, processes and outputs: (a) Quality of inputs, i.e. human/financial natural resources used in education/training provision, infrastructure, teaching materials, programs, and teachers; (b) Quality procedures, i.e. selection of trainees/ trainers, teaching methods, vocational guidance counselling services, implementation; (c) Quality of outputs, i.e. outcomes of learning, knowledge/skills/competencies acquired after completion of training, labour market integration, etc.





# 4. REVIEW

### Conclusions

Although the implementation of the annual self-assessments of the Vocational Training Institutes (IEK) is still incomplete, since the National Quality Assurance Framework (P<sup>3</sup>) was re-activated just recently, its pilot implementation<sup>67</sup> has already led to the creation and implementation of general regulations on the operation of IEK<sup>68</sup> which stipulate continuous monitoring, evaluation and improvement of the qualification cycle. Pursuant to these rules, IEK are expected to refine their quality indicators and apply measurement and evaluation in order to form plans for improvement, by using the Cycle of Quality (with its 5 stages: planning, implementation, measurement, evaluation and review) and the P<sup>3</sup> scoring tool that assists in prioritizing improvements. These processes of self-assessment together with the external inspections/ evaluations and the national benchmarking, as well as the re-assessment of their structures and student performance will lead to the improvement of IEK systems/ procedures, including the alignment of course timetables with the certified Automobile Repair curricula and intended LOs, trainer qualification, training means/ methods/ equipment.

For the purpose of ensuring responsiveness to the changing needs of the economy, the effectiveness of the training programmes is to be evaluated against the degree of certification of the qualification acquired and the degree of usefulness of the acquired skills at the workplace, in order to lead to their review. Feedback from the labour market is to be collected systematically not only in the planning phase of the development of job profiles and curricula, but since the labour market actors are members of the Governing Board of EOPPEP and the advisory committees, their feedback is requested and included in the revision/ updating of programmes during the whole development cycle of qualifications. Certified programmes leading to Automobile Repair qualification at level 5 are to be adjusted to the specific job profiles within the specialties that are in demand in the labour market and their respective curricula are to be reassessed, evaluated and, if deemed necessary, renewed at least every six years. Currently, the Ministry of Education, in collaboration with the stakeholders, is creating a new system for early identification of labour market needs and skill demands in order to improve their matching with the qualification acquired by vocational training.

Another outcome of the pilot implementation and evaluation of the p<sup>3</sup> quality assurance framework was the creation and implementation of a uniform selection and evaluation system for IEK trainers (Register of Educators of non-formal Adult Education), with requirements of teaching competence (Educational Attainment certification process of Adult Educators) and a common point system (criteria) for all IEK in Greece, which also provides for the establishment of a system for the continuous education, evaluation and skill updating of educators and staff involved in non-formal vocational education and training.

 <sup>&</sup>lt;sup>67</sup> The 1<sup>st</sup> pilot phase took place in 2011 and its results were evaluated in 2012; the 2<sup>nd</sup> pilot phase occurred in 2013, and lead to a revised edition of p<sup>3</sup> and an action plan for its establishment as of the end of 2015.
 <sup>68</sup> Ministerial Decision 5954/2-7-2014 (Gazette 1807/issue B'/2-7-2014): "Regulation of Operation of Vocational

<sup>&</sup>lt;sup>50</sup> Ministerial Decision 5954/2-7-2014 (Gazette 1807/issue B'/2-7-2014): "Regulation of Operation of Vocational Training Institutes (IEK) falling under the General Secretariat of Lifelong Learning".



#### Notes:

<sup>i</sup> The qualification groups presented herein at level 5 of the NQF/ EQF are part of the Initial Vocational Education and Training (IVET) system of Greece. The description of the level of qualification in terms of learning outcomes is as follows:

Knowledge

- Know the special principles and concepts, the content and scientific vocabulary of their specialty
- Analyse information that enables them to understand their work field
- Possess at an adequate level the methods and procedures of the new technologies
- · Know the safety and hygiene requirements and the relevant actions for their specialty

Skills

- Hold a wide range of cognitive and practical skills of their specialty
- Apply with fluency a range of specialized techniques in their field of expertise
- Solve in a creative manner specific problems that arise in their working environment
- Have communication skills at the level of theoretical and technical information in subjects of their expertise
- Handle with expertise the required technological equipment of their specialty

Competence

- Operate with autonomy in their field of work and have the ability to supervise others, depending on their specialty and in the context of their duties
- Engage effectively in group work
- Act within the scope of their specialty, according to the principles of professional ethics
- Develop initiatives in specific fields of their specialty