



Friction Stir Welding European Qualifications

European Recommendations

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1. Aim

The purpose of FSW-Tech European Recommendations is to support the implementation of the European Friction Stir Welding Operator (EFSW-O), European Friction Stir Welding Specialist (EFSW-S) and European Friction Stir Welding Engineer (EFSW-E) qualifications in other European VET Systems, contributing for the mitigation of skills mismatches and shortage of personnel working in the manufacturing sector, specifically the ones using Friction Stir Welding (FSW) technology.

The present FSW- Tech European Recommendations document is available for implementation of both VET and companies in <http://www.fsw-tech.eu/>.

2. Definitions

In order to better understand the present document, it is important to know the following terms, which will be used throughout and in the scope of the FSW-Tech European Recommendations:

- | | |
|----------|---|
| A | <p>ANB – Authorised Nominated Body.</p> <p>ATB – Approved Training Body.</p> <p>Assessment – Instrument to check the process of learning.</p> |
| B | <p>Blended Learning (BL) – Term describing learning that mixes various event-based activities, including face-to-face classroom presentations and self-paced studies.</p> |
| C | <p>CBT – Computer Based Training.</p> <p>Classroom Training – General Classroom training (students physically present in class); Web conferencing, online seminars and videoconferencing are considered as classroom delivery.</p> |
| D | <p>Distance Learning (DL) – Distance learning is the education (including for e.g. e-Learning, video, Interactive multimedia) of students who are not physically present at a school or training centre.</p> |
| E | <p>E-Learning (EL) – Educational technology is defined as "the study and ethical practice of facilitating learning and improving performance by creating, using, and managing appropriate technological processes and resources.</p> <p>Examiner - A competent person who conducts examination of candidates during written and practical examinations in accordance with rules for examinations. Examiners must be independent from the persons being examined</p> |
| L | <p>Learning Management System (LMS) – A software used for delivering, tracking and managing training and education</p> |
| P | <p>Progressive Assessment - Various methods of assessment, including questionnaires and exercises, that are additional to the training material provided and are used to monitor student's progress. Such assessments are completed by the student and returned to the training organisation for evaluation.</p> |
| S | <p>Study Plan - Training program that defines the sequence, content and time allocation of the course.</p> |

3. Background

Friction Stir Welding (FSW) technologies have a worldwide diffusion in several industrial sectors (e.g. automotive, aeronautic, naval construction, railways...) and have been widely adopted in aluminium and steel fabrication in other sectors as well.

Attending to this growth in the use of FSW and to the need for metal qualified personnel in Europe, it is crucial to offer training courses that qualify personnel for the FSW technology, and to upskill professionals who attended to EWF Courses/Qualification for Welding Personnel to the use of aluminium.

FSW-Tech project developed Guidelines for new professional profiles, aiming to promote high-quality work-based learning in VET by improving the training methods, assuring that skills and qualifications are developed under a transnational scope and transferred to national levels.

By creating the European Friction Stir Welding Operator (EFSW-O), European Friction Stir Welding Specialist (EFSW-S) and European Friction Stir Welding Engineer (EFSW-E) professional profiles, FSW-Tech project intends to mitigate the identified EU market needs, which are in line with the needs identified in the FSW-Tech Common State of the Art Report.

This report was based on a survey conducted with 75 entities involved in education, production and research of steel and aluminium components from 16 different countries (from Europe, North and South America and Asia). It provides information about the main qualifications currently available for friction stir welding technology and what are the most important gaps regarding qualification and skills of the FSW professionals. The collected results allowed to conclude the following:

- The industrial sectors that most apply FSW technology are Automotive, Oil, Gas and Power Generation, followed by Shipbuilding/Marine construction, Aerospace and Railway. This information helped FSW-Tech consortium to direct the development of educational materials and Guidelines to these sectors in particular and to adequate the examples provided in these materials to the industry reality;
- Companies are in need of Operators and Engineers, as well as for Specialists, which allowed to validate the need for developing guidelines for these professional profiles, as proposed initially by FSW-Tech project;
- It was possible to conclude that both theoretical and practical training are important for the respondents, regardless the professional profile to which the training course is about.

These results are in line with a study conducted by Technavio (2018)¹ that describe the growing impact of FSW technologies market on the above-mentioned sectors (at a CAGR of 9,7% during the period between 2018-2022), for which there is a need for skilled and qualified labour.

By creating a new training guideline for three new professional profiles (described in section 4.1. “FSW Professional Profiles | Proficiency Levels”, in this document), this project contributes to a wider use of FSW technology by proposing a baseline for the training and qualification programme of personnel in FSW, aligned with the industry requirements.

¹ Refer to “Global Friction Stir Welding Equipment Market 2018-2022 | 10% CAGR Projection Over the Next Four Years | Technavio” (in <https://www.technavio.com/report/global-friction-stir-welding-equipment-market-analysis-share-2018>)

4. Principles for European Implementation of Friction Stir Welding Training

Implementation and recognition of Friction Stir Welding (FSW) training courses at European level is based on EU policies and tools mentioned below, which, by principle, are key factors for enhancing transparency, comparability and portability of people's qualifications.

The Recommendation of the European Parliament and the Council of 23 April 2008 has established the [European Qualifications Framework \(EQF\) for lifelong learning](#), which is a common reference framework of eight levels of qualifications, expressed as learning outcomes with increasing levels of proficiency. The EQF serves as a translation grid between different qualifications systems and their levels.

The new [Council Recommendation on the EQF for lifelong learning](#) (2017) has been approved, built on the achievements of the 2008 Recommendation, ensuring the continuity in the processes launched by individual countries to reference their qualifications frameworks and levels to the EQF.

Learning Outcomes are 'statements regarding what a learner knows, understands and is able to do on completion of a learning process, which are defined in terms of knowledge, skills and responsibility and autonomy' (Council Recommendation EQF, 2017).

The [ECVET Recommendation \(2009\)](#) has established the European Credit System for Vocational Education and Training (ECVET) at all levels of the EQF with reference to VET qualifications in order to facilitate transfer, recognition and accumulation of individuals' achievements in formal, and where appropriate, non-formal and informal learning contexts.

FSW-Tech training courses have in consideration that:

- Units of learning outcomes can be assessed and validated individually,
- A general framework of cooperation, networking and mutual trust between partners – sending and receiving/hosting organisations - is defined in the Memorandum of Understanding (MoU) (developed in O6 of the project)
- Learning agreements and personal transcripts are applied to the two partners and the specific mobile learner involved in the mobility process, in order to summarise the training and validation process carried out in the framework of the MoU (developed in O6 of the project)

A comparative analysis between National and European frameworks is required to understand qualifications and diplomas awarded in different countries. At this regard the European Commission has developed a tool that allows this [comparison between qualifications frameworks](#) among different countries.

This comparison was carried out involving all FSW-Tech partners, who described the state of the art of National Qualification Frameworks (NQF) implementation, the correspondence between NQF and European Qualification Framework (EQF) levels in their national systems (Slovakia, Slovenia, Portugal, Romania and Belgium).

The results obtained were compiled in a Report (which is part of FSW-Tech Operational ECVET kit) that allows to conclude that Portugal, Belgium and Slovenia are considered by CEDEFOP² the

² Cedefop (2018). National qualifications framework developments in Europe 2017. Luxembourg: Publications Office, p. 12. <http://data.europa.eu/doi/10.2801/029873> (last access 03-11-2018).

countries with more mature operational status, owing to the fact that all of them have introduced learning-outcomes based level descriptors, reflecting EQF level descriptors, as recommended by the European Parliament and the Council for the establishment of the EQF.

It is also important to mention the fact that all countries represented in FSW-Tech project developed further national level descriptors to reflect national contexts, values, traditions and objectives.

5. European Friction Stir Welding Professional Profiles

European Friction Stir Welding Qualifications can be described in terms of knowledge (K), skills (S) and competences (C), the latter being described in terms of autonomy and responsibility. This is a sectorial approach for the development of qualifications used in EWF Systems Framework levels, which are correlated with the European Qualifications Framework for Lifelong Learning (EQF) through the respective Proficiency Levels.

This approach/methodology is based upon a research build-up of the following sequence of steps:



Figure 5-1: – Steps of EWF’s methodology for designing and implementing international qualifications

After describing each qualification professional profile (based on professional standards and EQF general descriptors), the next step is to assign EQF levels for the qualification profiles, based on EWF’s Qualification System Framework. After this, Job Functions, Job Activities and Competence Units need to be defined and organised in Learning Outcomes (LOs), which are defined for each qualification using verbs and adverbs to distinguish the profiles.

Harmonising LOs and proficiency level settlement is the next step, followed by an estimation of trainees’ workload by experts and trainers and a revision of proficiency levels are the steps to take afterwards, considering that the majority of Competence Unit levels/LOs determines the qualification level.

Experts in the sector are involved in the revision and validation/approval of the LOs, after which a final version of the LOs are made towards the implementation of the Qualification.

This methodology/approach was used to create FSW Professional Profiles, described below.

5.1. FSW Professional Profiles | Proficiency Levels

EFSW-O (EWF Independent | EQF level 4) – The European FSW Operator has factual and theoretical knowledge (K), or basic understanding, in the field of FSW technology, has fundamental/basic cognitive and practical skills (S) required to develop proper solutions on simple and specific FSW problems, self-manages professional activities (C) and simple standard applications, takes responsibility for supervising routine FSW tasks and related personnel and makes decisions in basic work.

EFSW-S (EWF Specialised | EQF level 5) – The European Specialist in FSW has specialised, factual and theoretical knowledge (K) of the theoretical principles and applicability of the FSW and related technologies. In terms of skills (S), he/she has a specialised range of cognitive and practical skills, allowing to develop solutions or choose the appropriate methods when applying FSW and related technologies in common/regular problems. The Specialist manages and supervises (C) common or standard friction stir welding applications and related technologies in unpredictable contexts, takes responsibility, with limited autonomy for decision making, in common or standard work and supervises the FSW and related personnel’s tasks.

EFSW- E (EWF Expert | EQF level 7) – The European FSW Engineer has a highly specialised and forefront knowledge (K) including original thinking, research and critical assessment of theory, principles and applicability of FSW related technologies, has highly specialised problem-solving skills (S) including critical and original evaluations allowing to define or develop the best technical and economical solutions when applying friction stir welding processes and related technologies in complex and unpredictable contexts. The Engineer manages and transforms (C) the welding processes and related technologies in a highly complex context, act as full responsible person for the definition and revision of the FSW and related personnel's tasks.

The depth of knowledge and skills to be achieved are specified for the identified level and for all Competence Units (CUs) and will be reflected in the scope and depth of the examination.

5.2. FSW Training Courses | Implementation Conditions

Harmonised European Friction Stir Welding (FSW) Training Courses are delivered at national level by EWF's authorised training bodies (ATBs) and agreed upon by national nominated bodies (ANBs) from welding and joining societies within EWF Training and Qualification System, in terms of themes, keywords and times devoted to them.

5.2.1 General Access Conditions and Procedures

Training guidelines for FSW Courses specify the minimum access conditions for the three qualification levels, which implementation is the responsibility of ATBs:

- a. **EFSW-O** – For this level, applicants should have completed mandatory education. Applicants shall submit:
 - An Application Form;
 - A copy of a Diploma showing their studies completion, complying with the Access Conditions.
- b. **EFSW-S** - Applicants should have a primary degree in an Engineering discipline – Diploma of a technical school in Mechanical Shipbuilding, Electrical, Metallurgical or Civil Engineering (four years schooling). Applicants shall submit:
 - An Application Form;
 - A copy of a Diploma showing their graduation, complying with the Access Conditions.
- c. **EFSW-E** – For FSW Engineers, applicants should have a primary degree in an Engineering discipline or its equivalent recognised by the national government and assessed by the ANB. Therefore, it would be expected as a general access condition that participants should have at least a bachelor's degree at university level with a minimum study of 3 years – Diploma of the University degree in Mechanical, Shipbuilding, Metallurgical, Electrical or Civil Engineering (minimum four years' studies), Diploma of University in engineering branches as above (three years' studies). Applicants shall submit:
 - An Application Form;
 - A copy of a Diploma showing graduation as Technologist, complying with the Access Conditions.

For EFSW Specialist and Engineer qualifications, other Engineering degrees can be accepted under ANBs' revision.

5.2.2. Special Requirements

Access conditions have **special requirements** to be taken into consideration:

- ✓ Applicants need to satisfy the ANBs' access conditions;
- ✓ If the ANB decides that the access conditions are adequately met, applicants are then required to attend a training course conducted by ATBs, which is based on FSW Training Guideline (which covers the minimum requirements for education and training), giving the hours of instruction detailed in the Guideline as minimum teaching hours,
- ✓ There is a written and practical examination (where applicable) for the award of the applicable FSW Diploma.

ATBs do not have to follow the topics of the Guideline in exact order. They have, however, to start each training course with **Competence Unit (CU) 1 – FSW Fundamentals** in order to set the basis to understand all the other CUs.

The depth to which each topic is dealt with is indicated by the number of hours allocated to it in the Guideline and will be reflected in the scope and depth of the examination, as previously mentioned.

Trainees successfully completing a course of education and examination will be expected to be capable of applying FSW technology at a level consistent with the qualification diploma.

6. Conditions for the implementation of training courses

A set of conditions and steps were identified by FSW-Tech project partners to enhance the use of European Friction Stir Welding (FSW) qualifications at a national level in countries not addressed in the project.

For VET Systems and companies to successfully implement EFSW-O, EFSW-S and EFSW-E qualifications, it is recommended that:

✓ **Friction Stir Welding technology, training courses and qualifications:**

These are promoted at a national level, which requires raising awareness on the added value brought by the European FSW training courses to companies. A strategic dissemination plan can be developed in this context, targeting initial and continuous VET, VET providers and companies. Several activities can be undertaken in each country, including face-to-face meetings, workshops and development of marketing materials, such as booklets for VET and companies and project flyers.

✓ **VET providers have a comprehensive capacity to deliver Friction Stir Welding training courses, which encompasses the below conditions:**

- Adequate facilities and equipment to deliver theoretical and practical training, in accordance with EWF Guidelines,
- Recruitment of trainees must follow minimum conditions, which mean that the right target groups are approached, and applicants have to comply with the general access conditions and procedures described in section 5.2.1. “Access Conditions and Procedures” of this Recommendation,
- Trainers in European Friction Stir Welding courses should be experienced for this training and, simultaneously, they should be competent lecturers with comprehensive knowledge and skills regarding FSW syllabus and pedagogical approaches and resources,
- The number of trainees required to give the course shall be sufficient to ensure that the level of knowledge and industrial experience expressed in the syllabus are covered and represented by the team of trainers and visiting lecturers,
- Train the trainers’ courses regarding several Friction Stir Welding applications should include the development of knowledge and skills on Friction Stir Welding curricula, learning outcomes and its potential in relation to training and examinations, learner-centred approaches and active training methodologies and materials for theoretical and practical training (e.g. software, toolbox with test pieces, videos, presentations, machines, among others).

✓ **There is compliance with EWF rules and guidelines:**

The ANB will audit and verify if the FSW training courses are delivered according to EFSW-O, EFSW-S and EFSW-E guidelines, thus ensuring harmonised procedures and quality in training.

- ✓ **Harmonised training is implemented, including theoretical and practical training and examination in the structure of the training courses. Duration and aims of each level consist of the following:**

EFSW-O training course has a minimum of 15 contact hours and 30 minutes and a workload of 31 hours (which includes theoretical, practical training, self-study and time devoted to examination). Theoretical training aims to provide trainees with a basic understanding of FSW technology, allowing them to develop proper solutions on specific problems;

EFSW-S training course has 24 hours and 30 minutes (contact hours) and a workload of 49 hours. Theoretical training provided to trainees aims at specialised, factual and theoretical knowledge of FSW principles and applicability to allow them to develop or choose the appropriate FSW related methods and technologies to solve common problems;

EFSW-E training course has 40 contact hours and a workload of 80 hours. Trainees who complete this qualification have highly specialised knowledge of principles and applicability of FSW related technologies that allow them to apply Friction Stir Welding processes in complex and unpredictable conditions.

- ✓ **The training methodologies applied to EFSW-O, EFSW-S and EFSW-E training courses are learner-centred:**

Trainees have an active role in their learning process and are invited to explore real-world challenges. As such, the curriculum has to shift into a learning outcomes approach, expressing what is expected from trainees at the end of a learning cycle in terms of knowledge application, practical application and competences. The workload covers theoretical and practical training hours, self-study time and time devoted to examination. Trainers become facilitators who give support to trainees, and the learning environment is extended to the shop-floor and laboratories and includes a wide range of educational materials from practical exercises to case studies under which trainees are asked to solve problems. Technical skills continue to be essential, but the development of transversal skills is also to be considered (e.g. individual performance, ability to solve problems, creativity, innovation, critical thinking, communication skills and collaboration with peers).

- ✓ **The examination follows the Guideline requirements of each qualification level and is conducted by an ANB, authorised by EWF for this purpose, in order to achieve harmonisation of examination and qualification of personnel involved in the Friction Stir Welding process.**

Examination procedures have the following requirements:

Friction Stir Welding personnel are allowed to participate in the examination leading to the award of diplomas if they comply with the minimum requirements specified in the General Access Conditions and attend the course organised by Technical Authorised Body, according to the FSW Guideline, approved by the Authorised Nominated Body;

The examination has two components: theoretical examination (written exam with a specific number of multiple-choice questions for each Competence Unit mentioned in the FSW Guideline) and practical examination;

For Operators and Specialists, the multiple-choice questions are randomly chosen from a specific database. The written examination for Operators has 30 questions, lasting 30 minutes; written examination for Specialists have 45 questions and lasts 45 minutes. To pass the examination, candidates need to have a final assessment of at least 60% of the questions correct;

For Engineers, the written examination has 80 questions and lasts 95 minutes;

Practical examination is only applicable for Operators and must comply with the requirements presented in Annex 1 of FSW Guideline and consists of performing one welding joint for a specific application. It has a duration of 30 minutes and the trainee's performance is scored as PASS or FAIL. If the trainee passes both theoretical and practical examinations, he/she will receive a European FSW Operator Diploma;

For Specialist and Engineer, the trainee needs to pass the theoretical examination to receive a diploma for the respective qualifications – European FSW Specialist and European FSW Engineer.

There is a specific procedure to apply in case trainees do not fulfil the necessary requirements for passing the examination. In this case, trainees are eligible to a re-examination for the not - passed the theoretical examination (cases where final assessment is under 60%) or practical examination (cases where trainees' performance is scored FAIL).

Thus, the re-examination may be taken within a maximum of 3 months after the initial examination. Failure in this second attempt will result in the trainee be treated as an initial candidate and a retake of the whole course.

Trainees who feel that they were not treated fairly during the examination procedure have the right to appeal to the Authorised Nominated Body.

FSW-Tech partners suggest some measures to boost the results from European FSW Qualifications within EU countries, namely the continuous improvement of the courses' contents and methodologies and its adaptation according to national context, and the involvement of stakeholders from both the education/training system and the industrial fields in order to guarantee the successful implementation of the Friction Stir Welding training and qualifications at national and European levels. The role of each stakeholder should be:

- **Friction Stir Welding experts**, to prepare the friction stir welding personnel to perform according to the industrial standards,
- **Independent VET providers**, to deliver the training courses based on the guidelines, thus giving access to the adequate educational materials for both practical and theoretical training, as well as access to the proper facilities,
- **Awarding bodies/ANBs**, to promote Friction Stir Welding training courses/qualifications in each country, to guarantee that both training and examination comply with the EWF rules and industrial standards and to issue the Operator, Specialist and Engineer diplomas,
- **National qualification authorities**, to promote and regulate Friction Stir Welding training courses/qualifications whenever they are implemented in the national VET system,
- **Manufacturing companies (SMEs, medium and big) that use Friction Stir Welding in their products**, to promote demand of highly specialised personnel with responsibility for Friction Stir Welding and related tasks, to create awareness about the use of this process and the need for qualified professionals as a key to assure the quality and security of the products.

7. Teaching Methods

In addition to training course implementation conditions described above, the following topics are a recommendation for the delivery of FSW-Tech training courses, in terms of:

✓ **Classroom delivery methods**

Classroom training uses teaching tools such as LMS, overhead projectors, slide shows, computer presentations, video, course notes and demonstrations.

Web conferencing, online seminars and video conferencing are considered as classroom delivery. If provided, the training entity must ensure real-time communication amongst participants and lecturers.

✓ **Laboratory and practical work**

Workshop training, demonstration and laboratory work will be delivered in laboratories in the ATB location.

✓ **Distance Learning methods**

Blended Learning (BL) if offered through appropriate alternative learning methods and include:

- Learning Management System (LMS) – Moodle
- Text documents
- Audio and video recordings
- Computer aided assessments
- Online multiple-choice tests

During BL training, the system includes a communication platform to offer:

- Communication between teacher/trainer and trainees for tutoring
- Communication among trainees for the exchange of information

During the BL programme, and periodically, trainees should self-evaluate their understanding of the attended training. The following requirements apply:

- Questions shall be at the level required in the harmonised exams
- Each item shall be covered by a minimum of 3 questions per hour
- Trainees shall be informed about the scoring and have the chance to retake the questions

8. Monitoring Trainees' Progress

Trainees are expected to achieve an acceptable standard on each examination of the relevant Competence Unit. These assessments are under the responsibility of the ATB.

Training organisations shall provide support to trainees who are not making satisfactory progress and will endeavour to identify the cause when a trainee's work is not reaching acceptable standards.

9. ANBs and ATBs' responsibilities

9.1. Major roles of an ANB

An ANB is responsible for the evaluation and approval of the training course. Roles of ANBs and ATBs on this task are described in separate relevant documents.

Regarding FSW-Tech Qualification, ANBs are responsible for the:

- Approval of ATBs for the conduct of the courses in accordance with the Guidelines
- Conduct of final examinations
- Qualification of personnel and the recording of relevant information
- Application review
- Assessment process
- Decision on certification

ANBs are also responsible for maintaining all records related to the certification process.

9.2. ATBs' responsibilities

ATBs are responsible for candidates' application and should appoint an administrative team for its staff to collect all necessary documents and pre-exam results. They are also responsible for communication with applicants, organization of pre-exams through approved web-based system and reporting of its results.

ATBs are responsible to organise mentorship sessions for Projects and additional formal and non-formal lectures, which are highly recommended.

10. Project

ATBs can agree with trainees to reinforce their knowledge in depth regarding the work that is usually done by the professional who has the level of qualification that the trainee intends to obtain. This Project (optional element of assessment) shall be in the form of a case study designated for performance within a special number of hours, depending on the qualification level of the candidate (allocated time).

The purpose of the project is to evaluate trainee's ability to apply knowledge in the areas related to the qualification level he/she is attending and to exchange practical knowledge as case studies among trainees.

This Project has a specific limit of time to be developed (maximum time permitted), which also corresponds to the previous qualification level of the trainee (see section 5.2.1 "General Access Conditions and Procedures"). Depending on the capability of the trainee, the study may also be finished in a shorter time.

The Project's final report is presented, and trainees are examined after the presentation for a period between 20 and 30 minutes.

After fulfilling detailed paper assessment of Project review, attendance lists of all required training and attending lists of intermediate exams, ANBs' Examination Committee (its appointed personnel) makes the decision on whether trainees fulfil criteria according to the latest version of IAB Guideline to access examination procedures.

11. Examination

The following recommendations are to be enforced in addition to the ones described in section 6. "Conditions for the implementation of training courses" of the present document, whenever necessary and applicable:

- a. At the discretion of the ATB, the pre and intermediate examination shall consist of a series of multiple-choice questions, covering the whole content of the Competence Units. A computer exam system can be used for choosing the questions, the answers and to evaluate the results.
- b. Failure in the intermediate examination shall require special attention and help to trainees from special ATB support team.
- c. Final Examination for each Competence Unit will be carried out by an ANB.
- d. Examination for each Competence Unit consists of multiple-choice questions from a Database for Examination dedicated to the specific FSW Qualification level.
- e. No help from computers, mobile phones or booklets is allowed.
- f. To pass the examination, trainees shall achieve at least 60% of maximum possible mark in each Competence Unit.

After a successful examination, a Diploma is awarded to the successful trainee by the Authorised Nominated Body.

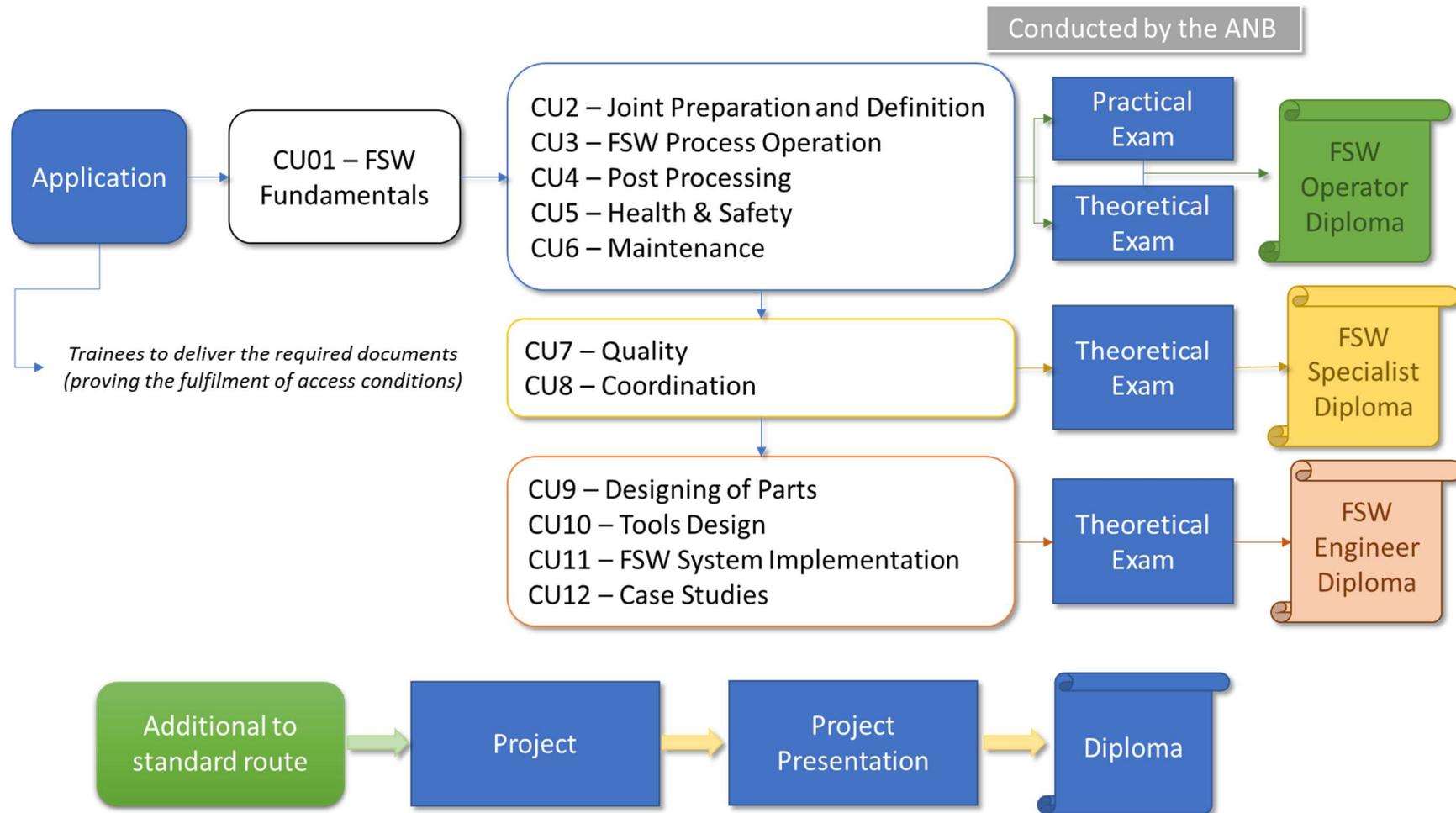
12. Agreement about collecting personal data

By signing the Application Form, candidates expressly agree that their personal data are stored and processed solely by the ATB and will not be transmitted to third parties.

This data will be used for the purpose of informing candidates about the current programmes of education and certification, certificates of expiration, novelties in the field of expertise and about events in the ATB.

By signing, candidates also agree that they are aware of the possibility to request access and correction, blockage, deletion or restriction of the processing of personal data, or submit an objection to the processing and transferability of their personal data by written notice to the ATB.

ANNEX 1 – Implementation Diagram



Note: The details on the levels of each CU can be found in the FSW Guideline

ANNEX 2 – Terms of the correct use of FSW Qualification Diploma

1. Education of FSW staff is carried out according to the rules and Guidelines of the training courses.
2. Use of FSW Qualification Diplomas is regulated by International or European standards to ensure the quality of FSW works.
3. Holders of International and European FSW Qualification Diplomas are responsible for the proper use thereof.
4. In the event of misuse or any change in the content, the ANB has the right to cancel the issued FSW Qualification Diploma.