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BEHEALTH

QUALITY ASSURANCE FRAMEWORK FOR NURSING WORK-BASED LEARNING (NWBL) PROVIDERS

Q-IMPULZ, Slovakia and partners

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ABBREVIATIONS

CAF	Common Assessment Framework
CyQF	Cyprus National Qualifications Framework
ECTS	European Credit Transfer System
EHEA	European Higher Education Area
EQAVET	European Quality Assurance in Vocational Education and Training
EQF	European Qualification Framework
HAHE	Hellenic Authority for Higher Education
HQF	Hellenic Qualifications Framework
HQF	Hellenic Qualifications Framework
HuQF	Hungarian Qualification Framework
IQAS	Internal Quality Assurance System
ISO	International Organisation for Standardization
MoNE	Turkish Ministry of National Education
NFQ	Irish National Framework of Qualifications
NLN	National League for Nursing
NMBI	Nursing and Midwifery Board of Ireland
NNC	Nursing Now Campaign
NQF	National Qualification Framework
OECD	Organisation for Economic Cooperation and Development
OKJ	Hungary's National Qualifications Register
QA	Quality Assurance
QQI	Quality and Qualifications Ireland
SAAHE	Slovak Accreditation Agency for Higher Education
SkQF	Slovak National Qualification Framework
TQF	Turkish Qualification Framework
UNESCO	United Nations Educational, Scientific and Cultural Organisation

DEFINITIONS

360-degree feedback is an assessment system or process in which employees receive confidential, anonymous evaluations from their peers, managers, and other stakeholders. This typically includes managers, peers, and direct reports and is used for development, modified from (Custom Insight, 2024). In the Erasmus+ BEHEALTH project, the 360-degree control tool is used. This tool incorporates the perspectives of healthcare educators and clinical instructors, nursing students, graduates, patients, nurses, and the employers of nursing graduates. Feedback is used to improve the quality of the study programme.

ESG standards provide the framework for internal and external quality assurance. They were adopted at the EHEA Ministerial Conference in 2015 (ENQA-ESG, 2015). Standards and Guidelines for Quality Assurance in the European Higher Education Area (ESG) is a set of principles developed by ENQA and endorsed by EQAR to promote consistent, transparent, and learner-centred quality assurance across Europe.

Internal Quality Assurance (IQA) Institution-led processes and systems for monitoring, assessing, and improving programme quality in nursing WBL settings.

Learning outcomes refer to the knowledge, skills, and competencies that a learner is expected to acquire and demonstrate upon completing a learning process. These outcomes should be clear, measurable, and aligned with the objectives of the educational program (ENQA, 2016).

Mental health is a state of mental well-being that enables people to cope with the stresses of life, realise their abilities, learn well and work well (WHO, 2022).

National Qualification Framework (NQF)—EU Member States and 11 other countries have committed to implementing the European Qualification Framework (EQF) to enhance its effectiveness in facilitating employers', workers', and learners' understanding of national, international, and third-country qualifications (Europass EU, 2024).

The Nursing and Midwifery Board of Ireland (NMBI) is a regulatory body that sets education and practice standards for nurses and midwives in Ireland.

Nursing education refers to formal learning and training in the science of nursing (Encyclopedia.com, 2018).

Nursing encompasses the autonomous and collaborative care of individuals of all ages, families, groups, and communities, whether sick or well, in all settings. It includes promoting health, preventing illness, and caring for ill, disabled and dying people (WHOa, 2024).

Occupational Health and Safety (OHS) protocols and practices are designed to ensure the health and safety of staff and learners in workplace environments.

Qualification is the formal outcome of an assessment and validation process obtained when a competent body determines that an individual has achieved learning outcomes to given standards (EU, 2018).

Quality Assurance is a part of quality management that focuses on providing confidence that quality requirements will be met. The confidence provided by quality assurance is twofold—internally to management and externally to customers, government agencies, regulators, certifiers, and third parties (ASQ, 2024b). In nursing education, QA is a systematic review of nursing educational programs



to ensure that acceptable standards of education, scholarship, and infrastructure are maintained (Selvi, 2018). QA is a dynamic process that provides the nursing education institute or campus with tools to measure current performance levels and facilitate continuous improvement.

Self-assessment is a comprehensive, systematic, and regular review of an organisation's activities and further proposes these results referenced against the accepted model modified according to (UNSD, 2024).

Vocational Education and Training is the training in skills and teaching of knowledge related to a specific trade, occupation or vocation in which the student or employee wishes to participate (Eurostat, 2024).

Well-being refers to the state of being happy, healthy, and prosperous. It encompasses having good mental health, high life satisfaction, a sense of meaning or purpose, and effective stress management (Psychology Today, 2024).

Work-based learning is a popular approach to professional development where students or employees learn in the workplace rather than in a classroom or traditional training environment (Indeed, 2024).

1 INTRODUCTION

Quality assurance framework for Organisations offering WBL in nursing is the 3rd Result of the Erasmus+ BEHEALTH project.

This document includes a description of the Internal Quality Assurance System (IQAS) of organisations providing Nursing Work-Based Learning (NWBL) within their Vocational Education and Training (VET), broken down by different levels of the European Qualifications Framework (EQF), National Qualification Frameworks (NQF), Quality Assurance (QA) standards, case studies on NWBL in project partner countries, and integration of ESG standards and the EQAVET framework into the BEHEALTH hybrid model for NWBL.

According to the literature review conducted as the 1st result of the project “Comparison report including International and EU Quality Assurance Frameworks in Nursing”, there are some selected regulatory frameworks and guidelines for NWBL at the Global, European and National levels, as presented in Figure 1.

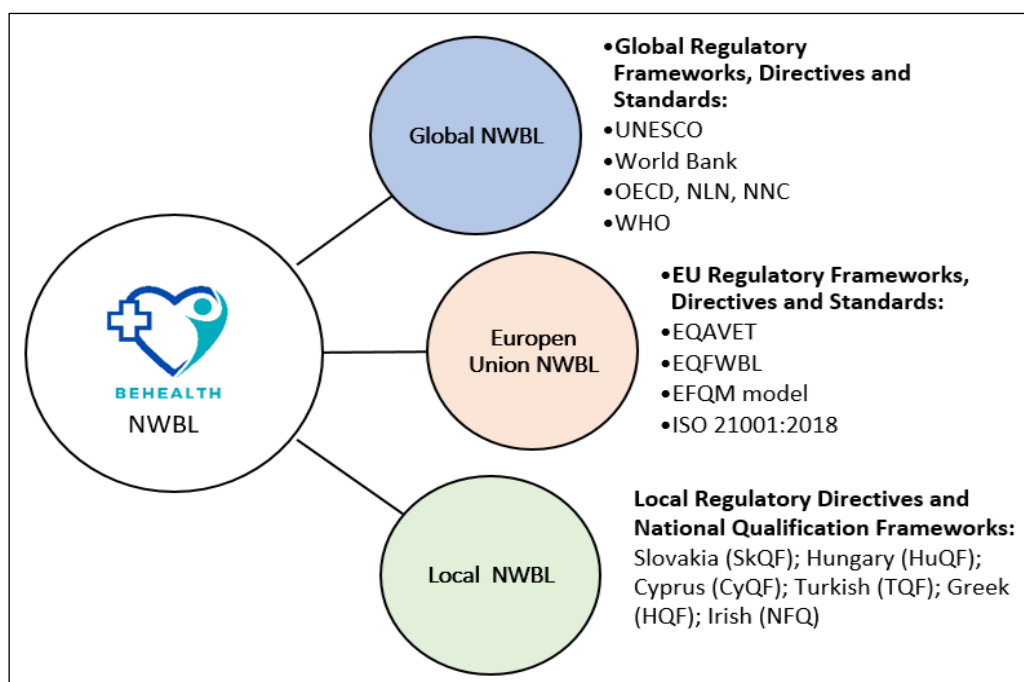


Figure 1 – NWBL frameworks structured according to the different institutions at the Global, European Union, and National levels

Of these frameworks, guidelines and standards, our further results are based on building blocks of the Quality Assuring Work-Based Learning EQAVET-WBL (2012) and ENQA-ESG (2015), focusing on European Qualification Framework (EQF, 2017) levels 4, 5, and 6.

The EQAVET-WBL (2012) reference framework and ENQA-ESG (2015) standards enabled the development of the Hybrid BEHEALTH model for NWBL providers.

2 NURSING WORK-BASED LEARNING

Work-Based Learning is a key part of Vocational Education and Training systems in European countries, and its different types range from dual systems to long-term placements to short-term internships and everything in between (ENQA, 2018). WBL refers to any training programme carried out by students or employees while they are working. This approach to learning contrasts with traditional methods, which often take place in a classroom, laboratory setting, or even at home via remote learning methods. Workplace learning schemes tend to be vocational, with learners immersing themselves in the workplace to learn a job and gain a qualification to help them take the first steps in their career (Indeed, 2024).

Nursing Work-Based Learning is a dynamic approach that integrates practical experience with academic learning. It allows nursing students or professionals to develop their skills directly in the workplace, enhancing both their clinical competence and decision-making abilities. This method is particularly effective in fostering lifelong learning and improving healthcare outcomes. Key aspects of NWBL include:

- **Practical Application:** Nurses learn by engaging in real-world scenarios, which helps bridge the gap between theory and practice.
- **Collaboration:** It often involves teamwork between learners, healthcare organisations, and educational institutions to create a supportive learning environment.
- **Skill Development:** Focuses on building both technical and soft skills, such as patient care, communication, and critical thinking.
- **Continuous Improvement:** Encourages ongoing professional development to adapt to the ever-evolving healthcare landscape.

The characteristics of NWBL encompass consolidation of expertise at work with formal knowledge, learner-managed rather than academic-managed learning, and university educators working in partnership with clinical staff to deliver learning (Attenborough, Abbott, Brook, & Knight, 2019); (Wexhe, 2019).

Types of NWBL schemes adapted from (Atkinson, 2016), (EU-LEX, 2013), (Cant & Cooper, 2010):

- **Clinical Rotations:** Students gain hands-on experience in different healthcare settings under the supervision of experienced nurses and mentors (EU-LEX, 2013).
- **Preceptorship Programs:** A one-on-one mentorship where a practising nurse (preceptor) guides and supports a nursing student or new graduate in a clinical setting. Widely implemented in the UK and Nordic countries to support transition into professional practice (NMC, 2025)
- **Apprenticeships:** Structured programs combining on-the-job training with classroom instruction, often leading to certification or licensure (Atkinson, 2016).
- **Internships:** Short-term work experiences that allow students to apply classroom knowledge in real-world healthcare environments (Atkinson, 2016).

- **Service Learning:** Combines community service with academic coursework, allowing students to address community health needs while learning (Atkinson, 2016).
- **Simulation-Based Learning:** Utilises high-fidelity mannequins and virtual reality to replicate clinical scenarios, providing a safe environment for students to practice and refine their skills (Cant & Cooper, 2010).

3 COMMON FRAMEWORKS GUIDING NURSING WORK-BASED LEARNING IN EUROPE

Basic information about common regulatory frameworks guiding nursing work-based learning in Europe can be found in the European Nursing Virtual Centre for Learning Evidence-Based Practice portal (ENCLEBP, 2025), which promotes and facilitates the acquisition and improvement of competencies in Evidence-Based Practice through self-learning:

1. The European Directive 2005/36/EC (as amended by Directive 2013/55/EU) (EU-LEX, 2013) sets out minimum requirements for the training of nurses responsible for general care in the EU and accession countries, requiring at least one third of theoretical and one half of clinical education in recognised institutions. It also ensures the mutual recognition of nursing qualifications across member states.
2. The European Qualifications Framework (EQF) provides a reference system to compare qualifications across countries. Most nursing programs align with EQF Level 6 (Bachelor's level) or Level 4 for secondary VET nursing. EQF helps standardise learning outcomes and competencies for WBL across borders.
3. European Quality Assurance in Vocational Education and Training (EQAVET) provides a quality assurance framework for VET institutions, including secondary schools. It promotes continuous improvement, stakeholder involvement, and transparent evaluation. Widely adopted in Slovakia, Hungary, Cyprus, Greece, Ireland, and Türkiye, aligning through its EU accession efforts.
4. WBL-Q and WBL Toolkit EU-funded project initiatives provide self-assessment tools, stress tests, and guidelines for improving NWBL quality (WBL-Q, 2020a) (WBL-Q, 2020). Used by many institutions in these countries to evaluate and enhance their nursing WBL systems.
5. ESG standards provide the framework for internal and external quality assurance. They were adopted at the European Higher Education Area (EHEA) Ministerial Conference in 2015 (ENQA-ESG, 2015).

The Bologna Process and European Credit Transfer System (ECTS) ensure compatibility of higher education systems across Europe. Nursing programs use ECTS to measure workload and learning outcomes. Supports student mobility and recognition of NWBL experiences across borders.

4 CASE STUDIES ON NURSING WORK-BASED LEARNING IN PROJECT PARTNER COUNTRIES

While each European Union country has its own national regulations and education systems, there is a shared European Qualifications Framework (EQF) that guides NWBL and provides a reference system to compare qualifications across countries. The National Qualifications Frameworks for qualifications in VET for nurses in Slovakia, Hungary, Cyprus, Greece and Türkiye have eight levels. The Irish Qualifications Framework (NFQ) has ten levels. The levels of the Irish Qualification Framework can be mapped to the EQF levels, but the geographical scope of the EQF serves several countries within Europe. A summary of the knowledge, skills, and competencies of NWBL for each EQF level is described in more detail in the first result of the BEHEALTH project.

Most nursing programs across Slovakia, Hungary, Cyprus, Türkiye, Greece, and Ireland align with EQF level 4 for qualifications that typically represent upper secondary or vocational education focused on more advanced practical and cognitive skills and EQF Level 6 (Bachelor's level).

Table 1 presents selected examples of institutions providing NWBL in the BEHEALTH partner countries at levels 4 and 6.

Table 1 – Examples of institutions providing NWBL according to EQF in BEHEALTH partner countries

Country	EQF Level 4 Institution	EQF Level 6 Institution
Slovakia	Prešov University, Faculty of Health Care – <i>National vocational qualification</i>	Comenius – <i>BSc in Nursing</i>
Hungary	Semmelweis Ignác Multipurpose Vocational Training Institute – <i>Certificate</i>	Semmelweis University, Faculty of Health Science – <i>BSc in Nursing and Patient Care</i>
Cyprus	Larnaca Technical School – Department of Health and Welfare – <i>Upper Secondary VET qualification</i>	Cyprus University of Technology, Department of Nursing – <i>BSc in Nursing</i>
Türkiye	Istanbul Vocational School of Health Service – <i>health technician</i>	Istanbul University – Florence Nightingale Faculty of Nursing – <i>BSc degree</i>
Greece	EPAL Nursing School – Athens <i>Certificate</i>	National and Kapodistrian University of Athens, Faculty of Nursing – <i>BSc in Nursing</i>
Ireland	Coláiste Muire Vocational School – Health and Social Care Department – <i>Practical nursing pathway</i>	University College Dublin – School of Nursing, Midwifery and Health Systems <i>BSc in general nursing</i>

4.1 Case Studies on Nursing Work-Based Learning (EQF level 4)

4.1.1 Quality assurance in institutions offering NWBL in Slovakia (EQF level 4)

In Slovakia, the nursing education sector comprises various institutions offering vocational and higher education programs, aligning with the SkQF. NWBL at EQF level 4 can be completed in two ways: NWBL at the HEI or via post-secondary studies at the vocational health care school.

Prešov University, Faculty of Health Care

Institution Profile

Type:	Part of the University of Prešov, a public institution
Program:	Focus on nursing
WBL partner:	Ján Adam Reiman Faculty Hospital for clinical rotations. Certificate in Nursing Assistance (1-year program)

Regulatory Framework

1. Governance and Standards:
 - National Alignment: Adheres to Slovakia's Higher Education Act (No. 131/2002) and the Slovak Accreditation Agency for Higher Education (SAAHE).
 - EU Standards: Complies with European Standards and Guidelines (ESG 2015) and EQAVET for vocational education.
 - Institutional Oversight:
 - Internal QA Unit: Monitors WBL outcomes via biannual audits, leveraging digital portfolios (e.g., Moodle LMS).
 - External Validation: Periodic reviews by SAAHE and alignment with ENQA benchmarks.
2. Curriculum Design and NWBL Integration
 - Structure: 40% clinical hours (minimum) across the University Hospital Prešov and community clinics.
 - Competency Mapping: Tied to Slovak National Qualifications Framework (SkQF/EQF Level 4) and EU Directive 2013/55/EU.

Tools: E-portfolios – Track skill acquisition (e.g., wound care, patient communication), AI-Driven Assessments: Pilot program for personalised feedback (e.g., adaptive case simulations).
3. Stakeholder Collaboration
 - Healthcare Providers: Co-design placements with regional hospitals (e.g., UNLP Prešov).
 - Professional Bodies: Input from the Slovak Chamber of Nurses ensures licensure readiness.
 - Feedback Loops: Annual surveys of students, employers, and clinical supervisors to refine WBL objectives.

4. Quality Assurance Mechanisms

- Internal:
 - Biannual Audits: Review placement logs, supervisor evaluations, and student reflections.
 - Risk Summits: Address gaps (e.g., inconsistent mentorship) via action plans.
- External: ISO 9001:2015 Certification: For educational processes.
- Benchmarking: Against WBL-Toolkit EU standards for workplace learning.

5. Challenges and Innovations

- Challenge: Standardising assessments across diverse clinical settings.
- Solution: Digital competency checklists with real-time updates via mobile apps.

Case Study Example

Scenario: A Level 4 nursing student completes a 12-week rotation in geriatric care at UNLP Prešov.

QA Steps: Pre-Placement: Skills gap analysis via e-portfolio., Mid-Term: Supervisor evaluation using SKKR-aligned rubrics, Final: Multisource feedback (patient surveys, mentor reviews), Outcome: Student achieves 95% competency in "Ethical Decision-Making" (SkQF Domain 3).

Conclusion: Prešov's framework strikes a balance between national compliance (SAAHE, SkQF) and EU best practices (EQAVET, ESG). Strengths include early clinical immersion, digital tracking, and partnerships with employers.

Outcomes and Impact

Outcome	Impact
Increased community engagement	Stronger social cohesion and local support
Improved education access	Higher literacy rates and better job prospects
Reduction in pollution levels	Enhanced public health and preserved environment
Greater economic growth	More jobs, increased income, and improved quality of life
Implementation of new policies	Better governance and more transparency

Lesson learned

- Prešov's Level 4 WBL programme demonstrates individual (career readiness), institutional (research output), and systemic (healthcare quality) impacts.
- Its integration of EU standards, employer partnerships, and digital tools positions it as a model for nursing education in Central Europe.
- Key Metrics: 95% competency attainment, 92% employment rate, 15% patient satisfaction increase.

4.1.2 Quality assurance in institutions offering NWBL in Hungary (EQF level 4)

Semmelweis Ignác Multipurpose Vocational Training Institute

Institutional Profile

Program:	Practical Nurse (Hungary's National Qualifications Register (OKJ)-level vocational qualification)
WBL Partners:	National Institute of Medical Rehabilitation, local hospitals, elderly care homes, and outpatient clinics

Quality Assurance Framework

1. Governance and Standards
 - Operates under the Hungarian Ministry of Interior and the Ministry of Culture and Innovation (formerly the Ministry of Human Capacities)
 - Aligned with EQAVET (European Quality Assurance in Vocational Education and Training) principles
 - Follows the National Core Curriculum and sectoral qualification requirements for healthcare professions
 - Subject to external evaluation by the Educational Authority of Hungary
2. Curriculum and WBL Integration
 - WBL comprises at least 40–50% of total training hours
 - Clinical placements begin in the second year and include rotations in multiple healthcare settings
 - Learning outcomes are mapped to the Hungarian Qualifications Framework (HuQF) and EQF Level 4
 - Use of clinical logbooks, learning contracts, and competency checklists
3. Stakeholder Collaboration
 - Formal agreements with healthcare institutions for student placements
 - Clinical mentors (licensed nurses) and school tutors jointly supervise and assess students
 - Regular coordination meetings to align expectations and improve placement quality
4. Monitoring and Evaluation
 - Internal QA includes: Self-assessment tools from the WBL-Q Handbook, Student feedback surveys, Mentor evaluations

- External QA is conducted every 3–5 years by national authorities, including site visits and documentation review. Institutions track placement completion rates, student satisfaction, and graduate employment outcomes.

5. Continuous Improvement

- Annual review of WBL outcomes and stakeholder feedback
- Action plans developed to:
 - Improve mentor training
 - Diversify placement settings
 - Strengthen onboarding and clinical preparedness
- QA results are published in school reports and shared with stakeholders

Outcomes and Impact

Indicator	Result
Student satisfaction with WBL	88% positive
Placement completion rate	95%
Employer satisfaction	High (based on surveys)
Graduate employment rate	84% within 6 months

Lessons Learned

- Structured collaboration between schools and healthcare providers enhances WBL quality.
- Transparent evaluation tools like the WBL-Q self-assessment foster accountability.
- Mentor development is key to improving supervision and student outcomes.
- Alignment with EQAVET ensures consistency and comparability across EU VET systems.

4.1.3 Quality assurance in institutions offering NWBL in Cyprus (EQF level 4)

Larnaca Technical School – Department of Health and Welfare Institutional Profile

Type:	Public secondary vocational education and training (VET) institution
Program:	Practical Nurse (Upper Secondary VET qualification)
WBL Partners:	Larnaca General Hospital, private clinics, elderly care homes, and rehabilitation centres.

Quality Assurance Framework

1. Governance and Standards
 - Operates under the Ministry of Education, Sport and Youth of Cyprus

- Aligned with EQAVET (European Quality Assurance in Vocational Education and Training) principles
- Follows the National Curriculum for VET and sectoral qualification standards for healthcare professions
- Subject to external evaluation by the Cyprus Pedagogical Institute and CYQAA (Cyprus Agency of Quality Assurance and Accreditation in Higher Education)

2. Curriculum and WBL Integration

- NWBL comprises at least 40–50% of total training hours
- Clinical placements begin in the second year and include rotations in hospitals, care homes, and outpatient settings
- Learning outcomes are mapped to the Cyprus National Qualifications Framework (CyQF) and EQF Level 4
- Use of clinical logbooks, learning contracts, and competency checklists to monitor progress

3. Stakeholder Collaboration

- Formal agreements with healthcare institutions for student placements
- Clinical mentors (licensed nurses) and school tutors jointly supervise and assess students
- Regular coordination meetings to align expectations and improve placement quality
- Involvement of employers in curriculum review and feedback processes

4. Monitoring and Evaluation

Internal QA includes: Self-assessment tools from the WBL-Q Handbook, Student feedback surveys, Mentor evaluations, External QA conducted every 3–5 years by national authorities, including site visits and documentation review, Institutions track placement completion rates, student satisfaction, and graduate employment outcomes.

5. Continuous Improvement

- Annual review of WBL outcomes and stakeholder feedback
- Action plans were developed to improve mentor training, diversify placement settings, strengthen onboarding and clinical preparedness, and publish QA results in school reports for stakeholder sharing.

Outcomes and Impact

Indicator	Result
Student satisfaction with WBL	89% positive
Placement completion rate	94%
Employer satisfaction	High (based on surveys)
Graduate employment rate	85% within 6 months

Lessons Learned

- Structured collaboration between schools and healthcare providers enhances WBL quality.
- Transparent evaluation tools like the WBL-Q self-assessment foster accountability.
- Mentor development is key to improving supervision and student outcomes.
- Alignment with EQAVET ensures consistency and comparability across EU VET systems.

4.1.4 Quality assurance in institutions offering NWBL in Türkiye (EQF level 4)

Health High School (Sağlık Meslek Lisesi)

Institutional Profile

Type:	Public secondary vocational education and training (VET) institution
Program:	Practical Nurse (Health Technician – Secondary VET qualification)
WBL Partners:	Istanbul State Hospitals, private clinics, elderly care homes, and rehabilitation centres

Quality Assurance Framework

1. Governance and Standards
 - Operates under the Turkish Ministry of National Education (MoNE)
 - Aligned with EQAVET (European Quality Assurance in Vocational Education and Training) principles
 - Follows the National Curriculum for Health Services and sectoral qualification standards
 - Subject to external evaluation by the Education Quality Monitoring and Evaluation Directorate under MoNE
2. Curriculum and WBL Integration
 - WBL comprises at least 40–50% of total training hours
 - Clinical placements begin in the second year and include rotations in hospitals, care homes, and outpatient settings
 - Learning outcomes are mapped to the Turkish Qualifications Framework (TQF) and EQF
 - Level 4
 - Use of clinical logbooks, learning contracts, and competency checklists to monitor progress
3. Stakeholder Collaboration
 - Formal agreements with healthcare institutions for student placements

- Clinical mentors (licensed nurses) and school tutors jointly supervise and assess students
- Regular coordination meetings to align expectations and improve placement quality
- Employers contribute to curriculum updates and provide feedback on student performance

4. Monitoring and Evaluation

Internal QA includes: Self-assessment tools from the WBL-Q Handbook, Student feedback surveys, Mentor evaluations, External QA conducted every 3–5 years by MoNE, including site visits and documentation review, Institutions track placement completion rates, student satisfaction, and graduate employment outcomes.

5. Continuous Improvement

- Annual review of WBL outcomes and stakeholder feedback
- Action plans developed to: Improve mentor training, Diversify placement settings, Strengthen onboarding and clinical preparedness, and QA results published in school reports and shared with stakeholders.

Outcomes and Impact

Indicator	Result
Student satisfaction with WBL	87% positive
Placement completion rate	94%
Employer satisfaction	High (based on surveys)
Graduate employment rate	82% within 6 months

Lessons Learned

- Structured collaboration between schools and healthcare providers enhances WBL quality.
- Transparent evaluation tools like the WBL-Q self-assessment foster accountability.
- Mentor development is key to improving supervision and student outcomes.
- Alignment with EQAVET ensures consistency and comparability across EU VET systems.

4.1.5 Quality assurance in institutions offering NWBL in Greece (EQF level 4)

Athens Vocational School of Health Professions

Institutional Profile

Type:	Public secondary vocational education and training (VET) institution
Program:	Practical Nurse (Upper Secondary VET qualification)
WBL Partners:	Evangelismos General Hospital, local clinics, elderly care homes, and rehabilitation centres

Quality Assurance Framework

1. Governance and Standards
 - Operates under the Ministry of Education, Religious Affairs and Sports of Greece
 - Aligned with EQAVET (European Quality Assurance in Vocational Education and Training) principles
 - Follows the National Curriculum for Health Professions and sectoral qualification standards
 - Subject to external evaluation by the Hellenic Authority for Higher Education (HAHE) and regional education directorates
2. Curriculum and WBL Integration
 - WBL comprises at least 40–50% of total training hours
 - Clinical placements begin in the second year and include rotations in hospitals, care homes, and outpatient settings
 - Learning outcomes are mapped to the Hellenic Qualifications Framework (HQF) and EQF Level 4
 - Use of clinical logbooks, learning contracts, and competency checklists to monitor progress
3. Stakeholder Collaboration
 - Formal agreements with healthcare institutions for student placements
 - Clinical mentors (licensed nurses) and school tutors jointly supervise and assess students
 - Regular coordination meetings to align expectations and improve placement quality
 - Employers contribute to curriculum updates and provide feedback on student performance
4. Monitoring and Evaluation
 - Internal QA includes: Self-assessment tools from the WBL-Q Handbook, [Student feedback surveys](#), Mentor evaluations,
 - External QA is conducted every 3–5 years by national authorities, including site visits and documentation review. Institutions track placement completion rates, student satisfaction, and graduate employment outcomes.
5. Continuous Improvement
 - Annual review of WBL outcomes and stakeholder feedback
 - Action plans developed to: Improve mentor training, Diversify placement settings, Strengthen onboarding and clinical preparedness, and QA results published in school reports and shared with stakeholders.

Outcomes and Impact

Indicator	Result
Student satisfaction with WBL	90% positive
Placement completion rate	95%
Employer satisfaction	High (based on surveys)
Graduate employment rate	86% within 6 months

Lessons Learned

- Structured collaboration between schools and healthcare providers enhances WBL quality.
- Transparent evaluation tools like the WBL-Q self-assessment foster accountability.
- Mentor development is key to improving supervision and student outcomes.
- Alignment with EQAVET ensures consistency and comparability across EU VET systems.

4.1.6 Quality assurance in institutions offering NWBL in Ireland (EQF level 4)

Coláiste Muire Vocational School – Health and Social Care Department Institutional Profile

Type:	Public secondary vocational education and training (VET) institution
Program:	Healthcare Support (QQI Level 5) – Practical Nursing Pathway
WBL Partners:	HSE community hospitals, private nursing homes, disability services, and home care providers.
Sources:	McNamara, O'Hara, Brown, & Quinn (2020), Area (2022)

Quality Assurance Framework

1. Governance and Standards
 - Operates under the Department of Education and Quality and Qualifications Ireland (QQI)
 - Aligned with EQAVET (European Quality Assurance in Vocational Education and Training) principles
 - Follows the National Framework of Qualifications (NFQ) and QQI validation requirements
 - Subject to external monitoring by QQI and school inspections by the Department's Inspectorate
2. Curriculum and WBL Integration
 - WBL comprises at least 30% of total learning hours, including supervised clinical placements
 - Placements occur in real healthcare settings under the supervision of qualified staff

- Learning outcomes mapped to NFQ Level 5 and QQI minor awards, such as Care Skills and Care Support
 - Use of placement journals, skills checklists, and reflective logs to track progress
3. Stakeholder Collaboration
- Formal agreements with HSE and private sector providers for student placements
 - Clinical supervisors and school tutors jointly assess student performance
 - Employers provide feedback on student readiness and skill development
 - Regular stakeholder meetings to review curriculum relevance and placement quality
4. Monitoring and Evaluation
- Internal QA includes: Self-evaluation reports and student feedback surveys, Tutor and employer evaluations of student performance, Annual program reviews based on QQI guidelines.
 - External QA includes: QQI program revalidation cycles, School inspections focusing on teaching, learning, and WBL integration.
5. Continuous Improvement
- Action plans developed from feedback and evaluation data
 - Improvements include: Enhanced mentor training for placement supervisors, updated learning materials and digital tools for WBL documentation, Expanded placement options to include mental health and disability services, QA outcomes shared with stakeholders and used to inform strategic planning.

Outcomes and Impact

Indicator	Result
Student satisfaction with WBL	91% positive
Placement completion rate	96%
Employer satisfaction	High (based on surveys)
Graduate progression rate	85% into employment or further nursing education

Lessons Learned

- Strong collaboration between schools and healthcare providers ensures meaningful WBL experiences
- Transparent evaluation tools like placement journals and feedback surveys support accountability
- Mentor development and structured supervision improve student outcomes
- Alignment with QQI and EQAVET frameworks ensures consistency and recognition across Europe

4.2 Case Studies on Nursing Work-Based Learning (EQF level 6)

4.2.1 Quality assurance in institutions offering NWBL in Slovakia (EQF level 6)

Comenius University in Bratislava, Jessenius Faculty of Medicine in the University Hospital Martin

Institutional profile

Type:	Higher education institution
Program:	Bachelor of Science in Nursing
WBL Partners:	University Hospital Martin and other healthcare providers
Sources:	Comenius University in Bratislava (2025)

Quality Assurance Framework

1. Comenius University ensures rigorous quality assurance of the Nursing Bachelor's programme at Jessenius Faculty of Medicine through a comprehensive internal system aligned with national legislation and European standards, involving continuous evaluation, stakeholder participation, accreditation, and programme transparency.
2. University-Level Quality Assurance Framework: Comenius University (CU) implements quality assurance (QA) at both undergraduate and graduate levels through its Internal System of Quality Assurance, governed by the CU Quality Assurance Board under the Vice-Rector for Quality Assurance. This system complies with the Slovak Quality Assurance Act, Slovak Accreditation Agency for Higher Education (SAAHE) standards, and the European Standards and Guidelines for Quality Assurance in Higher Education Area (ESG 2015). It prioritises student-centred education connected with the latest research and societal needs, ensuring continuous monitoring and improvement through mechanisms such as student surveys and regular evaluations. At CU, QA governance includes structured bodies such as the CU QA Board, Accreditation Board, Scientific Board, and faculty-level quality boards. Faculties, including the Jessenius Faculty of Medicine (JFM), establish their own internal quality assurance bodies tailored to their specific fields but consistent with the overarching university system. The faculty quality assurance board includes student representatives and external stakeholders, like employers, to ensure connection with practice and labour market demands.
3. Nursing Bachelor's Programme Specifics at Jessenius Faculty of Medicine
 - The Bachelor's degree in Nursing at JFM (designated EQF level 6) is a professionally oriented 3-year full-time programme taught in Slovak, delivered at the faculty and affiliated healthcare providers. It equips graduates with integrated nursing science knowledge and competences spanning biomedical, social, and humanistic sciences, preparing them for health care services including prevention, treatment, and rehabilitation.
 - Key learning outcomes include clinical and communication skills, ethical decision-making, autonomy in nursing interventions, and the application of scientific principles. Graduates qualify as professional nurses, able to work nationally and internationally in diverse healthcare

settings. The programme aligns with Slovak government regulations on healthcare professional competence and further education frameworks.

4. Quality Assurance Measures in the Nursing Programme

- **Programme Design and Accreditation:** The study programme's structure, including compulsory and elective profile courses, is developed collaboratively by subject guarantors, employers, and student feedback, ensuring relevancy to practical nursing needs and compliance with national standards. The study plan meets the requirements of the Internal Quality Assurance System of Comenius University and legislation such (Act no. 131/2002 Coll., 2002) and Government Regulation (Act no. 269/2018 Coll., 2018).
- **Clinical practice and work-based learning** are about 40-60% of the curriculum.
- **Stakeholder Engagement:** Employers regularly evaluate graduate competencies, participate in curriculum development via the Study Program Board, and provide feedback, ensuring the study programme reflects current sector needs.
- **Graduate Monitoring and Employability:** Surveys show that 100% of graduates find employment, with over 95% working in their field of study, evidencing the programme's quality and relevance.
- **Continuous Evaluation:** The faculty quality assurance board monitors effectiveness, resources, and educational activities, cooperating with university-level QA bodies to coordinate and implement QA guidelines. Inspection of classes and evaluation of research, teaching, and service provision is conducted regularly.
- **Regulatory Compliance:** The Nursing programme meets Slovak and European legislative requirements, such as the Quality Assurance Act and accreditation standards set by SAAHE, ensuring both internal compliance and external quality benchmarks.
- **Transparency and Access:** The Internal System regulations, study plans, and policies are publicly accessible in Slovak and English, ensuring transparency and inclusiveness, including provisions for students with special needs.

Lesson Learned

- The Nursing Bachelor's programme at CU is embedded within a rigorous and multi-layered quality assurance framework. Comprehensive internal policies, alignment with national and European standards, active involvement of students and employers, systematic program monitoring, and transparent accreditation processes ensure that the programme maintains high quality and relevance, preparing graduates effectively for professional nursing roles at EQF level 6.
- This integrated QA approach enables Jessenius Faculty to uphold educational excellence, foster continuous development, and meet the evolving demands of healthcare education and practice in Slovakia and beyond.

4.2.2 Quality assurance in institutions offering NWBL in Hungary (EQF level 6)

Semmelweis University – Faculty of Health Sciences

Institutional Profile

Type:	Higher education institution
Program:	BSc in Nursing
WBL Partners:	Semmelweis Clinical Centre, affiliated hospitals, elderly care homes, and private clinics
Sources:	EQUAVET NPR Project (2018), WBL-Q (2020)

Quality Assurance Framework

1. Governance and Standards
 - Operates under the Hungarian Higher Education Act and the National Core Curriculum for Nursing
 - Aligned with EQUAVET principles and the Hungarian EQUAVET National Reference Point (NRP) initiatives
 - Subject to external accreditation by the Hungarian Educational Authority and European Association for Quality Assurance in Higher Education (ENQA)
2. Curriculum and WBL Integration
 - WBL comprises 50% of the total credits in the nursing program
 - Clinical practice is embedded across all semesters, culminating in a final internship
 - Learning outcomes are mapped to the Hungarian Qualifications Framework (HuQF) and European Qualifications Framework (EQF)
3. Stakeholder Engagement
 - Strong collaboration between university departments and clinical partners
 - Clinical mentors and academic supervisors jointly assess student performance
 - Regular feedback loops between students, mentors, and faculty
4. Monitoring and Evaluation
 - Uses the WBL-Q self-assessment and stress test tools for internal audits
 - Annual internal reviews include: Student satisfaction surveys, Mentor evaluations, Competency tracking, and External evaluations conducted every 5 years by national QA bodies.
5. Continuous Improvement
 - Based on EQUAVET+ methodology, including the “Review” phase for institutional improvement

- Action plans developed from self-assessment results:
- Enhancing mentor training
- Expanding placement diversity
- Improving student onboarding for clinical practice
- Results are made publicly available to ensure transparency

Outcomes and Impact

Indicator	Result
Student satisfaction with WBL	89% positive
Placement completion rate	97%
Employer satisfaction	High (based on feedback surveys)
Graduate employment rate	88% within 6 months

Lessons Learned

- Structured feedback mechanisms are essential for continuous improvement
- EQAVET+ Review phase helps institutions translate evaluation into actionable change
- Mentor development and recognition improve the quality of supervision
- Transparency and stakeholder involvement build trust and accountability

4.2.3 Quality assurance in institutions offering NWBL in Cyprus (EQF level 6)

Cyprus University of Technology – Department of Nursing

Institutional Profile

Type:	Public higher education institution
Program:	BSc in Nursing
WBL Partners:	Limassol General Hospital, private clinics, elderly care homes, and rehabilitation centres

Quality Assurance Framework

1. Governance and Standards
 - Operates under the Cyprus Agency of Quality Assurance and Accreditation in Higher Education (CYQAA)
 - Aligned with European Standards and Guidelines (ESG) and EQAVET principles
 - Nursing programs follow the European Directive 2005/36/EC for professional qualifications

2. Curriculum and WBL Integration

- WBL accounts for approximately 50% of total credits in the nursing curriculum
- Clinical placements begin in the second year and intensify in the final year
- Learning outcomes are mapped to the Cyprus National Qualifications Framework (CyQF) and EQF Level 6

3. Stakeholder Collaboration

- Strong partnerships with public hospitals and private healthcare providers
- Clinical mentors and academic supervisors jointly oversee student progress
- Regular stakeholder meetings to align expectations and improve placement quality

4. Monitoring and Evaluation

- Internal QA includes: Self-assessment tools from the WBL Toolkit, Student feedback surveys, Mentor evaluations
- External QA conducted by CYQAA every 5 years, including site visits and documentation review
- Use of learning contracts and competency checklists to track student development

5. Continuous Improvement

- Annual review of WBL outcomes and stakeholder feedback
- Action plans developed to: Enhance mentor training, Diversify placement settings, Improve onboarding for clinical practice, and Results published in institutional QA reports for transparency

Outcomes and Impact

Indicator	Result
Student satisfaction with WBL	90% positive
Placement completion rate	96%
Employer satisfaction	High (based on surveys)
Graduate employment rate	87% within 6 months

Lessons Learned

- National QA frameworks like CYQAA provide robust oversight and credibility
- Structured collaboration between academia and healthcare providers ensures relevance and quality
- Transparent evaluation tools and stakeholder feedback loops drive continuous improvement
- Alignment with EU directives supports mobility and recognition of qualifications across Europe

4.2.4 Quality assurance in institutions offering NWBL in Türkiye (EQF level 6)

Istanbul University – Florence Nightingale Faculty of Nursing

Institutional Profile

Type:	Public higher education institution
Program:	BSc in Nursing
WBL Partners:	Istanbul University Hospital, affiliated clinics, community health centres, and private hospitals

Quality Assurance Framework

1. Governance and Standards
 - Regulated by the Council of Higher Education (YÖK) and the Ministry of Health
 - Aligned with European Standards and Guidelines (ESG) and EQAVET principles
 - Nursing education follows the European Directive 2005/36/EC for professional qualifications
 - Subject to external accreditation by the Association for Evaluation and Accreditation of Nursing Education Programs (HEPDAK)
2. Curriculum and WBL Integration
 - WBL comprises at least 50% of the total credits in the nursing curriculum
 - Clinical placements begin in the second year and intensify in the final year
 - Learning outcomes are mapped to the Turkish Qualifications Framework (TQF) and EQF
 - Level 6
 - Use of learning contracts, clinical logbooks, and competency checklists
3. Stakeholder Collaboration
 - Strong partnerships with public and private healthcare institutions
 - Clinical mentors, academic supervisors, and hospital coordinators jointly oversee student progress
 - Regular stakeholder meetings to align expectations and improve placement quality
4. Monitoring and Evaluation
 - Internal QA includes: Self-assessment tools from the WBL Toolkit, Student feedback surveys, Mentor evaluations
 - External QA conducted by HEPDAK every 5 years, including site visits and documentation review

- Institutions use performance indicators such as placement completion rates and graduate employment data

5. Continuous Improvement

- Annual review of WBL outcomes and stakeholder feedback
- Action plans developed to: Enhance mentor training, Diversify placement settings, Improve onboarding for clinical practice, and Results published in institutional QA reports for transparency

Outcomes and Impact

Indicator	Result
Student satisfaction with WBL	91% positive
Placement completion rate	95%
Employer satisfaction	High (based on surveys)
Graduate employment rate	86% within 6 months

Lessons Learned

- National accreditation bodies like HEPDAK ensure consistent standards across institutions
- Structured collaboration between academia and healthcare providers enhances relevance and quality
- Transparent evaluation tools and stakeholder feedback loops drive continuous improvement
- Alignment with EU directives supports mobility and recognition of qualifications across Europe

4.2.5 Quality assurance in institutions offering NWBL in Greece (EQF level 6)

National and Kapodistrian University of Athens – Faculty of Nursing

Institutional Profile

Type:	Public higher education institution
Program:	BSc in Nursing
WBL Partners:	Attikon University Hospital, Evangelismos General Hospital, private clinics, and community health centres

Quality Assurance Framework

1. Governance and Standards
 - Regulated by the Hellenic Authority for Higher Education (HAHE) and the Ministry of Education and Religious Affairs
 - Aligned with European Standards and Guidelines (ESG) and EQAVET principles

- Nursing education complies with European Directive 2005/36/EC for professional qualifications
 - Subject to external evaluation by HAHE and periodic accreditation reviews
2. Curriculum and WBL Integration
- WBL constitutes approximately 50% of the total credits in the nursing curriculum
 - Clinical placements begin in the second year and intensify in the final year
 - Learning outcomes are mapped to the Hellenic Qualifications Framework (HQF) and EQF Level 6
 - Use of clinical logbooks, learning contracts, and competency-based assessments
3. Stakeholder Collaboration
- Strong partnerships with public hospitals and private healthcare providers
 - Clinical mentors, academic supervisors, and hospital coordinators jointly oversee student progress
 - Regular stakeholder meetings to align expectations and improve placement quality
4. Monitoring and Evaluation
- Internal QA includes: Self-assessment tools from the WBL Toolkit, Student feedback surveys, Mentor evaluations, External QA conducted by HAHE every 4–5 years, including site visits and documentation review and Institutions use performance indicators such as placement completion rates and graduate employment data
5. Continuous Improvement
- Annual review of WBL outcomes and stakeholder feedback
 - Action plans developed to: Enhance mentor training, Diversify placement settings, Improve onboarding for clinical practice and QA results published in institutional reports for transparency

Outcomes and Impact

Indicator	Result
Student satisfaction with WBL	90% positive
Placement completion rate	96%
Employer satisfaction	High (based on surveys)
Graduate employment rate	88% within 6 months

Lessons Learned

- National QA frameworks like HAHE provide robust oversight and credibility
- Structured collaboration between academia and healthcare providers ensures relevance and quality
- Transparent evaluation tools and stakeholder feedback loops drive continuous improvement
- Alignment with EU directives supports mobility and recognition of qualifications across Europe

4.2.6 Quality assurance in institutions offering NWBL in Ireland (EQF level 6)

University College Dublin – School of Nursing, Midwifery and Health Systems

Institutional Profile

Provider Name:	University College Dublin – School of Nursing, Midwifery and Health Systems
Type:	Public higher education institution
Program:	BSc in Nursing (General, Psychiatric, Children’s & General Integrated)
WBL Partners:	St. Vincent’s University Hospital, Mater Misericordiae University Hospital, community health services, and private care facilities

Quality Assurance Framework

1. Governance and Standards
 - Regulated by the Nursing and Midwifery Board of Ireland (NMBI) and Quality and Qualifications Ireland (QQI)
 - Aligned with ESG and EQAVET principles
 - Nursing programs must meet NMBI’s Standards and Requirements for Nurse Registration Education Programmes
 - QQI oversees institutional QA through cyclical reviews, statutory QA guidelines, and NFQ alignment
2. Curriculum and WBL Integration
 - WBL comprises over 50% of the total credits in the nursing curriculum
 - Clinical placements span all four years, with increasing complexity and autonomy
 - Learning outcomes are mapped to the Irish National Framework of Qualifications (NFQ) and EQF Level 6
 - Use of clinical assessment tools, learning contracts, and competency-based evaluations

3. Stakeholder Collaboration

- Formal agreements between HEIs and Associated Healthcare Providers
- Clinical mentors, preceptors, and academic supervisors jointly oversee student progress
- NMBI mandates mechanisms for student support, supervision, and assessment in practice settings

4. Monitoring and Evaluation

- Internal QA includes: Self-evaluation reports and student feedback surveys, Module and program evaluations, Clinical audits and mentor evaluations
- External QA conducted by QQI and NMBI through: Site visits, documentation reviews, and stakeholder interviews, Use of quality indicators such as placement completion rates and graduate outcomes

5. Continuous Improvement

- Annual review of WBL outcomes and stakeholder feedback
- Action plans developed to: Enhance mentor training, Improve student onboarding and clinical preparedness, Strengthen integration of theory and practice, QA results published in institutional reports and shared with stakeholders for transparency

Outcomes and Impact

Indicator	Result
Student satisfaction with WBL	92% positive
Placement completion rate	97%
Employer satisfaction	High (based on surveys)
Graduate employment rate	90% within 6 months

Lessons Learned

- National QA bodies like NMBI and QQI provide robust oversight and ensure consistency
- Structured collaboration between HEIs and AHCPs enhances the relevance and quality of WBL
- Transparent evaluation tools and stakeholder feedback loops drive continuous improvement
- Alignment with EU directives supports mobility and recognition of nursing qualifications across Europe

A comparison of the EQAVET (2024) framework and the institutional quality assurance standards (ENQA, 2024) for all the participating countries is presented in Table 2, focusing on governance, structure, quality assurance tools, stakeholders' involvement, and external evaluation methodology.

Based on the knowledge gained from previous chapters, a hybrid framework (Figure 2) for internal quality assurance in NWBL has been developed, which will serve as the basis for the development of a self-assessment tool for 360-degree control.

Table 2 – Governance, structure, quality assurance tools, stakeholders' involvement, and external evaluation methodology in project partner countries

Country	Governance & Framework	NWBL Structure	Quality Assurance Tools	Stakeholder Involvement	External Evaluation
Slovakia	National Accreditation Agency; EQAVET-aligned	Dual system: clinical placements in hospitals	Self-assessment, CAF, ISO 9001	Schools, employers, and students	External audits by the Accreditation Agency
Hungary	Ministry of Culture & Innovation; EQAVET	School-based with company internships	Modular curriculum, feedback loops	VET councils, employers, chambers	National VET reviews, peer evaluations
Cyprus	Human Resource Development Authority; EQAVET	School-led with structured WBL hours	Learning outcomes-based QA; student surveys	Tripartite boards, employers, unions	Accreditation via DIPAE; audits
Türkiye	Ministry of National Education; EQAVET-compatible	Apprenticeship & vocational high schools	Online QA platforms, the PDCA cycle	Provincial boards, employers, unions	Annual reviews; sectoral excellence centres
Greece	National Organisation for the Certification of Qualifications & Vocational Guidance (EOPPEP)	EPAL schools with hospital rotations	Internal QA units, EQAVET indicators	Regional VET boards, employers	External audits, EU peer reviews
Ireland	Quality and Qualifications Ireland (QQI); EQAVET	School-based with clinical WBL	QA guidelines; self-evaluation tools	Education & Training Boards, employers	QQI-led evaluations; sectoral reviews

5 INTEGRATION OF ESG STANDARDS AND THE EQAVET FRAMEWORK INTO THE BEHEALTH HYBRID MODEL FOR NWBL

The BEHEALTH hybrid model for NWBL quality improvement builds on the insights from the previous research and case studies, enabling a NWBL institution providing study programmes at EQF levels 4 and 6 to leverage the academic rigour of ENQA-ESG (2015) standards and the practical, employment-focused strengths of EQAVET (2022). This framework can also serve EQF level 5 well. This is beneficial when aiming to bridge the gap between vocational and higher education standards, as well as for institutions that do not have a formalised internal quality assurance system—something increasingly relevant in healthcare education. Table 3 shows the BEHEALTH hybrid model implementation strategy.

The proposed framework (Figure 2) considers the variations in institutional internal quality assurance systems for institutions offering nursing education, as outlined in the EQF at levels 4, 5 and 6. We assume that in many countries of the BEHEALTH project partners, providers operating at EQF level 5 do not have formalised internal quality assurance systems.

Therefore, this framework aims to:

- Support institutions' programmes in gradually developing robust, learner- and stakeholder-focused, and ethically sound quality assurance processes in line with European best practices.
- Provide recommendations for improving internal quality assurance systems for institutions with NWBL programmes at levels 4 and 6, or an implementation strategy for level 5 if the QA system is not implemented.
- Significantly support students' mental and physical health, as well as ethical and social development, because we have also included factors that may affect students' mental health and well-being.

Table 3 – BEHEALTH hybrid model implementation strategy

ENQA-ESG (2015) Standard for IQAS	EQAVET WBL Framework Component	Implementation Strategy in NWBL
1. Policy for quality assurance	Planning & Governance	Develop internal QA policies aligned with national VET strategies and EQAVET indicators (BEHEALTH Result 1).
2. Design and approval of programmes	Curriculum Development	Co-design nursing curricula with hospitals and health authorities; embed NWBL outcomes. The mental and physical health aspects are included in the design and approval of the program.
3. Student-centred learning, teaching and assessment	Teaching & Learning	Use simulation labs, clinical rotations, and reflective diaries to promote active learning.
4. Student admission, progression, recognition and certification	Evaluation & Monitoring	Apply transparent criteria for clinical skills and use both formative and summative tools.
5. Teaching staff	Staff Development	Train mentors and clinical supervisors to ensure their qualifications meet national standards.
6. Learning resources and student support	Infrastructure & Support	Ensure that clinical sites meet safety and pedagogical standards and provide digital access.
7. Information management	Data Collection & Analysis	Track learner progress using EQAVET indicators (e.g., completion rates, placement rates).
8. Public information	Transparency & Reporting	Publish WBL outcomes, QA reports, and student feedback summaries.
9. Ongoing monitoring and periodic review of programmes	Continuous Improvement	Conduct regular reviews of WBL placements and mentor performance.
	Stakeholder Engagement	Include employers, students, and regional health boards in QA processes.
10. Cyclical external quality assurance	External Review	Engage national QA bodies for audits; participate in peer reviews and EQAVET evaluations.

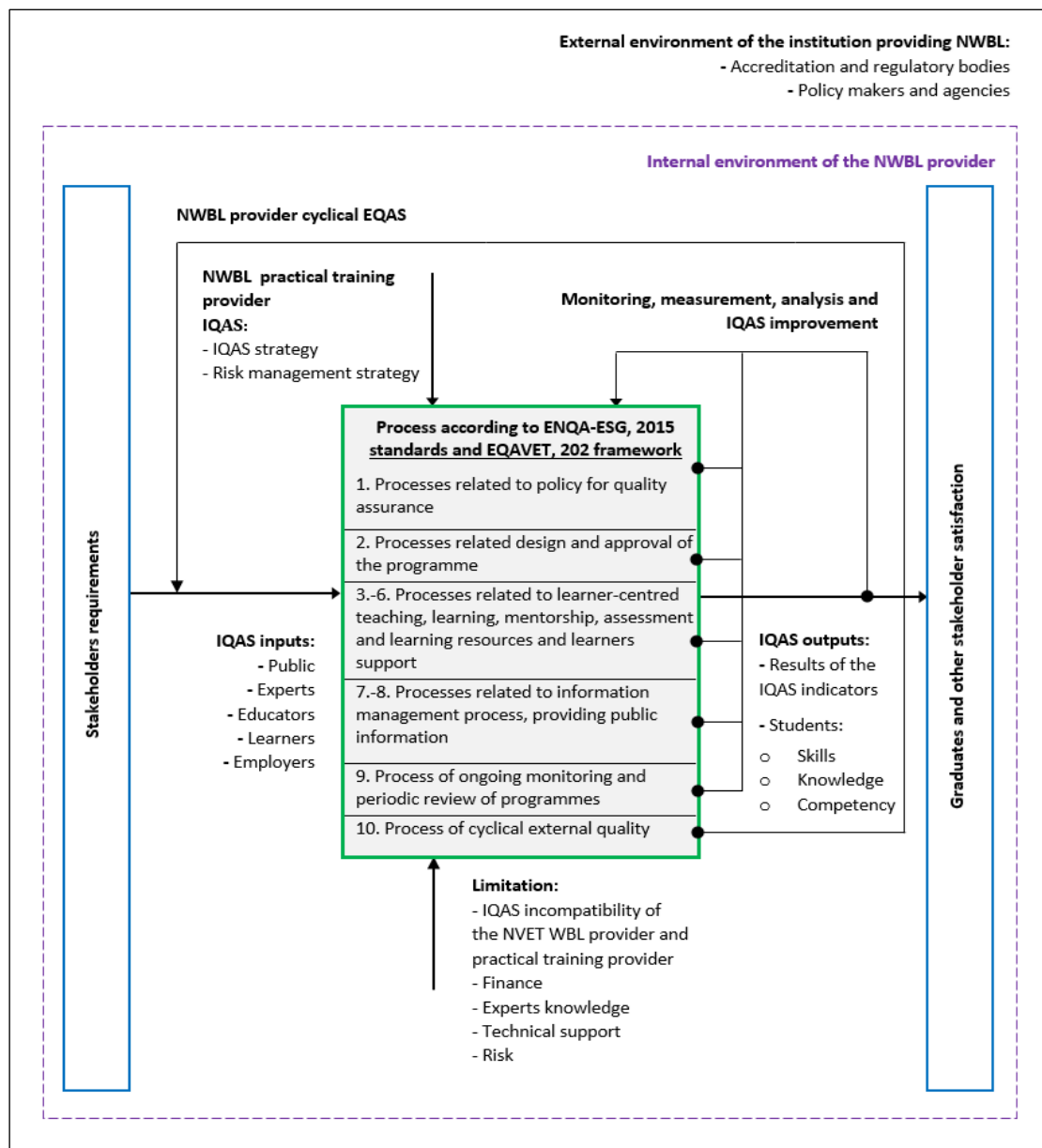


Figure 2 – BEHEALTH hybrid model of the NWBL quality assurance framework and processes according to the EQAVET (2022) and ENQA-ESG (2015) standards

The quality assurance framework is a process model situated within an external and internal support environment that recognises the importance of continuous improvement in the quality assurance of education, while also enabling the achievement of the quality policy and objectives.

The inputs to the quality improvement process include the requirements of stakeholders, such as institutional managers, students, teachers, mentors, and employers of graduates. This information influences the consistency of the policy, strategy and quality objectives, as well as the risk management strategy and the consideration of mental and physical health aspects in the design and approval of the program.

The constraints to the improvement processes include incompatibility between the NWBL provider's quality assurance system and that of the practical training provider, financial constraints, a lack of expert knowledge, technical support, and associated risks.

Information from the monitored quality indicators of the ten sub-processes serves as input for their improvement, and information from the external cyclical quality evaluation of the IQAS serves as external input into the processes.

6 CONCLUSION

To ensure international coherence and national accountability, NWBL providers formally commit to aligning their internal quality assurance systems with the EQAVET (2009) reference framework, ENQA-ESG (2015) standards, and EQF (2017) frameworks. These guidelines and standards provide a strong, principled foundation that fosters transparency, student engagement, and trust among all stakeholders. Key observations from case studies on NWBL in BEHEALTH project partner countries:

- All countries align with EQAVET (2009) principles, ensuring comparability and transparency.
- Stakeholder engagement is central to QA, especially with employers and regional boards.
- Ireland and Cyprus emphasise learning outcomes and student-centred evaluation.
- Türkiye and Slovakia integrate digital platforms and ISO 9001 (2015) standards or Common Assessment Framework (CAF) (2020) model for continuous improvement. In Slovakia, ISO 9001:2015 is implemented in one Faculty of Healthcare, and some HEIs have used the CAF model once, but it is not regularly used for improvement.

Practical Tools for Implementation:

- EQAVET (2009) dashboards for tracking NWBL metrics.
- Self-assessment templates based on ENQA-ESG (2015) guidelines.
- Mentor training aligned with ESG institutional standards Part 1, number 1.5: Teaching staff.
- Annual QA reports combining EQAVET metrics and ENQA-ESG indicators.

The BEHEALTH hybrid framework for NWBL institutions strengthens transparency, mobility, and trust across both vocational and higher education sectors, especially vital in nursing, where clinical competence and public safety are paramount.

European Quality Assurance reference framework for NWBL Vocational Education and Training - Quality Assuring Work-Based Learning (EQAVET-WBL) supports quality assurance in WBL across Europe through a continuous improvement cycle. It helps systems and providers enhance education and training. It provides a flexible framework based on a quality assurance and improvement cycle: planning- implementation-evaluation-review (P-I-E-R), along with various descriptors and indicators for both VET systems and VET provider levels. ENQA-ESF (2015) standards, formally known as the Standards and Guidelines for Quality Assurance in the European Higher Education Area, support a robust framework for both internal and external quality assurance in higher education. They are central to the Bologna Process goals of transparency, mobility, and mutual recognition across Europe.

REFERENCES

Act no. 131/2002 Coll. (2002). *Act on universities and amendments to certain laws*.

Act no. 269/2018 Coll. (2018). *Act on ensuring the quality of higher education and amending Act no. 343/2015 Coll. on public procurement and on the amendment of certain laws as amended*.

Area, E. E. (2022). *Quality assurance. Why is quality assurance in school education important?* . Retrieved from <https://education.ec.europa.eu/education-levels/school-education/quality-assurance>

ASQ. (2024b). *Quality Resources*. Retrieved from Quality Assurance vs Control: https://asq.org/quality-resources/quality-assurance-vs-control?srsltid=AfmBOorIMCEpEJXX9rF4CGtPHQt7IsTdKLJsJdMExu22xX2W-0o-0_vr

Atkinson, G. (2016). *Work-based learning and work-integrated learning: fostering engagement with employees*. Adelaide: NCVER. Retrieved from https://www.ncver.edu.au/__data/assets/pdf_file/0017/60281/Work-based-learning.pdf

Attenborough, J., Abbott, S., Brook, J., & Knight, A. (2019). Everywhere and nowhere: Work-based learning in healthcare education. *Nurse Education in Practice*, 8, pp. 132-138. doi:<https://doi.org/10.1016/j.nepr.2019.03.004>

Cant, R., & Cooper, S. (2010). Simulation-based learning in nurse education: systematic review. *J Adv Nurs.*, 66(1), 3-15. doi:10.1111/j.1365-2648.2009.05240.x. PMID: 20423432.

Comenius University in Bratislava. (2025). *Jessenius Faculty of Medicine in Martin*. Retrieved from <https://zaziden.uniba.sk/en/study-at-the-comenius-university-in-bratislava/jessenius-faculty-of-medicine-in-martin/>

Custom Insight. (2024). *What is 360-degree feedback?* Retrieved from <https://www.custominsight.com/360-degree-feedback/what-is-360-degree-feedback.asp>

ENCLEBP. (2025). *European Nursing Virtual Centre for Learning Evidence-Based Practice* . Retrieved from <https://europeannursingebp.eu/>

Encyclopedia.com. (2018). *Nursing education*. Retrieved from <https://www.encyclopedia.com/medicine/divisions-diagnostics-and-procedures/medicine/nursing-education>

ENQA. (2016). *Use of the Standards and Guidelines for Quality Assurance in the European Higher Education Area (ESG)*. Retrieved from <https://enqa.eu/wp-content/uploads/2016/09/Use-of-the-ESG.pdf>

ENQA. (2018). *Quality Assurance and work-based learning. A report for the WEXHE alliance*. Retrieved from https://www.enqa.eu/wp-content/uploads/2019/09/WEXHE-report_ENQA.pdf

ENQA-ESG. (2015). *Standards and Guidelines for Quality Assurance in the European Higher Education Area (ESG)*. Retrieved from https://www.enqa.eu/wp-content/uploads/2015/11/ESG_2015.pdf

EQUAVET NPR Project. (2018). *Methodological support for institutional quality improvement*. Retrieved from <https://eqavet.nive.hu/wp-content/uploads/2023/08/6-Methodological-support-for-institutional-quality-improvement.pdf>

- EU. (2018). *The European Qualifications Framework: supporting learning, work and cross-border mobility*. Retrieved from https://ehea.info/Upload/TPG_A_QF_RO_MK_1_EQF_Brochure.pdf
- EU-LEX. (2013, 12 28). Directive 2005/36/EC. *Official Journal of the European Union*. Retrieved from <https://eur-lex.europa.eu/eli/dir/2013/55/oj/eng>
- Europass EU. (2024). *Compare national qualifications frameworks across Europe. Information about national qualifications frameworks and qualification levels*. Retrieved from Compare Qualifications: <https://europass.europa.eu/en/compare-qualifications>
- Eurostat. (2024). *Glossary: Vocational education and training (VET)*. Retrieved from [https://ec.europa.eu/eurostat/statistics-explained/index.php?title=Glossary:Vocational_education_and_training_\(VET\)](https://ec.europa.eu/eurostat/statistics-explained/index.php?title=Glossary:Vocational_education_and_training_(VET))
- Indeed. (2024). *What is work-based learning? With definition and examples*. Retrieved from <https://uk.indeed.com/career-advice/career-development/work-based-learning>
- McNamara, G., O'Hara, J., Brown, M., & Quinn, I. (2020). Quality assurance in Irish schools: *Sciendo*, 68(4). doi:10.2478/admin-2020-0029
- NMC. (2025). *Principles for preceptorship*. Retrieved from [nmc-principles-for-preceptorship-a5.pdf](https://www.nmc.org.uk/globalassets/sitedocuments/nmc-publications/nmc-principles-for-preceptorship-a5.pdf): <https://www.nmc.org.uk/globalassets/sitedocuments/nmc-publications/nmc-principles-for-preceptorship-a5.pdf>
- Psychology Today. (2024). *What Is Well-Being? Definition, Types, and Well-Being Skills*. Retrieved from <https://www.psychologytoday.com/intl/blog/click-here-for-happiness/201901/what-is-well-being-definition-types-and-well-being-skills>
- Selvi, S. (2018). Quality Assurance in Nursing Care. *Int. J. Nur. Edu. and Research*, 6(1), 57-60. doi:10.5958/2454-2660.2018.00014.5
- UNSD. (2024). *CheckList*. Retrieved from Quality Assurance: <https://unstats.un.org/UNSDWebsite/data-quality/check-list>
- WBL-Q. (2020). *Ensuring Quality in Work-Based Learning. Self-Evaluation and Continuous Improvement*. Retrieved from <https://www.wbl-quality.eu/handbook/>
- WBL-Q. (2020a). *WBL-Q Methodology*. Retrieved from <https://www.wbl-quality.eu/wbl-q-methodology/>
- Wexhe. (2019). *Quality Assurance and work-based learning. A report for the WEXHE alliance*. Retrieved from https://www.enqa.eu/wp-content/uploads/2019/09/WEXHE-report_ENQA.pdf
- WHO. (2022). *Mental Health*. Retrieved from <https://www.who.int/news-room/fact-sheets/detail/mental-health-strengthening-our-response>
- WHOa. (2024). *Nursing and midwifery*. Retrieved from Nursing and midwifery



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