

Evaluation and Benchmarking of the Diploma in Hydropower Station Equipment Installation and Management from Yellow River Conservancy Technical Institute

Context and scope

Yellow River Conservancy Technical Institute commissioned Ecctis for an independent evaluation and benchmarking of its Diploma in Hydropower Station Equipment Installation and Management which was completed in January 2023.

The Diploma in Hydropower Station Equipment Installation and Management is designed to prepare students to work in the hydropower industry after graduation.

The main aims of the benchmarking were to:

- Establish comparability in the context of the UK through reference to the Regulated Qualifications Framework (RQF), and by extension, the European Qualifications Framework (EQF)¹
- Assess the extent to which the College's underpinning quality assurance meets a set of international standards.

Key findings

The Diploma in Hydropower Station Equipment Installation and Management seeks to develop students' knowledge and skills in front-line management, production and maintenance in the water conservancy and hydropower industry. In line with national requirements, the Diploma also encompasses "public basic courses" which include topics from arts, social sciences and science domains.

The general entry requirement for the programme is the National College Entrance Examination (NCEE, popularly known as the *gaokao* 高考) – comparable to GCE A Level / RQF Level 3 in the UK – or suitable marks in one of the College's own tests.

The Diploma is a three-year full-time programme. Reflecting its vocational focus, the Diploma combines classroom-based study with project-based learning and assessed professional practice in the form of an internship.

Upon completion, many students enter the workforce; however, some students will be eligible to apply for top-up Benke (本科) / Bachelor degree programmes. These require a

¹ To date, a total of 35 countries have now referenced their national education systems to the EQF.

minimum of two years of further study, which shows that the Diploma has similar academic progression routes to that of HND, Diploma of Higher Education and other UK Level 5 awards.

The study revealed several strengths of the Diploma in Hydropower Station Equipment Installation and Management, namely that it demonstrated:

- The programme allows students to suitably apply theoretical principles in practical contexts, aiding an effective transition into the workplace.
- A modern teaching and learning environment with students and teachers having access to excellent information technology.
- A range of teaching methods, including blended learning and project-based learning, which enhance students' sense of independence.
- The fulfilling of the skill demands of the hydropower industry.
- Clear, pre-defined admissions requirements that cover the different levels of knowledge required for students to be suitably prepared for the programme.
- Clear and precise guidelines for the recruitment, monitoring and support of academic staff.

In terms of international comparability, the Diploma in Hydropower Station Equipment Installation and Management has been found comparable to Level 5 of the RQF and EQF. It has also met international quality standards in the following five areas:

Admission

There is a pre-defined and published admissions policy ensuring transparency in the admissions policy and supporting consistency in admissions decisions

• Programme development, approval, monitoring and review

There is a clear process in place for the design, approval and monitoring of programmes

• Teaching and learning

There is a formalised process for monitoring the quality and effectiveness of delivery, relevant to the modes of study employed

Assessment

Assessment provides a sufficiently fair, valid and reliable evaluation of the intended knowledge, skills and competencies

• Information

The information available to prospective students, current students and other interested stakeholders is accurate, transparent and clear for the intended audience.

Engagement

Yellow River Conservancy Technical Institute has committed to further development and engagement encompassing:

- Rewriting the learning outcomes at programme and modular level to make them more specific and measurable, thereby ensuring the learning outcomes link appropriately to the assessment methods of the programme.
- Revising both the overall assessment framework and the existing assessments.
- Clarifying programme assessment weightings in the form of an overarching assessment framework so that it is easier to understand how indicial course element are assessed.
- The criteria for judgements made about learning during the internships should be made available to all students ahead of their placement, as this will ensure students are aware of the areas they are being assessed on.
- Maintaining and ensuring adoption by all staff of the unified quality assurance handbook.

Ecctis is a gold-standard provider of services in international education, training, and skills, and in the development and recognition of globally portable qualifications. We are an internationally trusted and respected reference point for qualifications and skills standards.

We are UK-based and operate worldwide, with a global network and client base spanning 62 countries and 5 continents. We have a 20-year track record in international consultancy and development.

Ecctis provides official UK national agency services on behalf of the UK Government in qualifications, skills, and migration – including UK ENIC, formerly UK NARIC.

UK ENIC is the UK National Information Centre for global qualifications and skills. Following the UK's leaving the EU, the former UK NARIC recognition agency function changes from a NARIC (which is an EU-only title) to an ENIC (the wider European title for national recognition agencies) in order to meet the UK's continuing treaty obligations under the Lisbon Recognition Convention.

Since 2019, through our China representatives and Beijing office Nalike, and our UK China Council and UK NARIC China Council projects, we have conducted qualification benchmarking in China and fostered educational links between China and other countries, to support the internationalisation efforts of China's higher vocational colleges.