

# NEA GLOBAL FORUM ON NUCLEAR EDUCATION, SCIENCE, TECHNOLOGY AND POLICY

## Working Group on Re-Establishing Nuclear Law Education Programmes (GF-WG5)

### Activity Proposal and Roadmap for 2024-2025

#### Context

Nuclear law is a dynamic field that has been in a constant state of evolution for over 60 years. The generation of lawyers, diplomats and policy makers who negotiated the primary instruments in the field of nuclear law have retired and the next generation is on the verge of retirement as well. For many new nuclear lawyers, their connection to the past is tenuous and their understanding of the development of this field is minimal. Learning from the past is critical to prepare for the future.

Often times, those who today think of themselves as “nuclear lawyers” are quite narrow subject matter specialists and their focus, understandably, is on what they need to know for their day-to-day work. Their education in the field of nuclear law may be *ad hoc* and unstructured, taking place primarily “on the job”. But nuclear law is now a large and complex universe. Those lawyers who have at least some sense of the wider landscape – even if they have not necessarily mastered every subject – will be the future leaders in the nuclear law field.

Currently, the structured teaching of nuclear law is largely confined to the continuing education programmes offered by the OECD Nuclear Energy Agency (NEA) and the International Atomic Energy Agency (IAEA). These courses, which run from a few days to a few weeks, help to provide foundations and to broaden understandings. But the short duration of these programmes does not afford the type of deep and rich knowledge transfer necessary to preserve and pass on information and knowledge from the generations of lawyers who wrote and negotiated the key international conventions, litigated the first nuclear liability lawsuits or lived through Three Mile Island and Chernobyl, and even now 11 September, and thus bore witness to, or participated in, the resulting safety, security and safeguards developments in nuclear law.

While these carefully crafted and delivered programmes have been, and continue to be, unique and impactful, the scale and significance of nuclear sector input needed to reach net zero by 2050 requires new approaches and up-scaling of nuclear law learning, across the board. Depending on the level and nature of the need and demand, the requirements and goals (and the audiences) the development of nuclear law in higher education may be more than the creation of new specialist nuclear law LL.Ms. Nuclear law will likely need to be incorporated into a range of educational contexts and learning outcomes, such as LL.B and J.D programmes, other subject specific masters’ programmes (such as in energy transition, environmental and climate change law and science), continuing legal professional education courses, professional development and targeted professional seminars and training. In all of this there will also need to be kept in mind the specialist education and need for qualification at doctoral level of the new generation of those who will be teachers of nuclear law and lead in the field of applied research in this area of law.

Although there are some university-level energy and environmental law programmes that offer nuclear law modules as part of wider energy and environmental law master's courses and some universities provide an occasional course in nuclear law, the vast majority of university programmes (such as there are) only tangentially address nuclear energy in their course offerings. This is insufficient provision to contribute to the development and adaptation required of nuclear law to meet the demands of the future, whether it is for new nuclear-based technologies, the continued operation of current technologies, or safe spent fuel and radioactive waste management, among other critical topics. The decline over the past 20 years of academic investment in the teaching of nuclear law may in part be due to higher education budgetary and funding constraints in many countries together with the disincentivising effect of nuclear moratoriums and exits in certain nuclear power generating countries. The reduction in teaching of nuclear law has also held back university-led applied research, at doctoral and post-doctoral levels, resulting in emerging gaps in the international and national legal and regulatory frameworks as new nuclear technologies and applications move toward reality.

## **Background**

The NEA Global Forum on Nuclear Education, Science, Technology and Policy (Global Forum) established the Working Group on Re-Establishing Nuclear Law Education Programmes (GF-WG5 or Working Group) in March 2023. GF-WG5 is a group of academics and professionals from different universities and law schools who regularly meet to exchange information on existing nuclear law programmes, discuss challenges related to the implementation of nuclear law curricula (including research funding) and assist in the further development of graduate programmes in nuclear law.

## **Mission**

The mission of GF-WG5 is to:

- explore and assist in the development of graduate-level nuclear law programmes;
- expand the number of qualified educators to generate a new generation of nuclear law professionals; and
- enhance university capacity to undertake doctoral and post-doctoral level applied research.

## **Objectives**

1. To investigate and report on the status of nuclear law academic programmes, other relevant learning opportunities and academic research in the field of nuclear law currently available in higher education institutions internationally.
2. To examine and report on current perspectives of those institutions toward delivering such programmes alongside opportunities and any relevant initiatives being presently established or planned.
3. To use the Working Group as an NEA-facilitated “venue” at which higher education institutions and senior academics can critically debate and address the Context and Mission, share ideas and experiences on the future direction and “scale and shape” of nuclear law in higher education, undertake or commission research and evidence-gathering in relation to this and, in the longer term, discuss possible inter-institutional collaborations.
4. To undertake or commission specific external research with external stakeholders (including NEA member governments, other international intergovernmental organisations, industry associations and companies in the field of nuclear energy) to create an evidence-based approach to identifying and meeting the call and needs for increased academic involvement in the nuclear energy field.
5. To explore and develop responses to the specific challenges outlined in the Context (above),

which potentially includes:

- a. generating governmental and industry engagement and support;
  - b. assessing and encouraging the institutional appetite in higher education for committing resources to this field, in not only law programmes but also from science and engineering programmes;
  - c. raising “student” (including those already in legal or regulatory practice) awareness and interest, including through continuing professional development courses;
  - d. organising the initial body of specialists that can assist, in the short term, in the planning (and delivery) of new post-graduate academic programmes and, in the medium term, “teach the next generation of teachers”; and
  - e. the development and implementation of appropriate funding models.
6. To undertake joint external projects and programmes as identified and agreed.
  7. To work with other NEA Global Forum Working Groups and report to and advise the Global Forum Council of Advisors.

In this context, four main areas of work have been identified for the 2024-2025 GF-WG5 Activity Proposal and Roadmap, as described hereunder. The Working Group and the Global Forum Council of Advisors are invited to agree on the set of activities according to available resources.

## **Members and Leadership**

GF-WG5 will comprise no more than 25 representatives from NEA and non-NEA member countries. There are currently 17 representatives from 11 countries.

A Bureau consisting of a Chair and one or more Vice-Chair(s), representing geographic and gender diversity, will be selected from among its members to co-ordinate and facilitate the work of GF-WG5. The Bureau will meet as needed and at least twice a year.

## **Working Methods**

GF-WG5 will meet at least quarterly, preferably monthly, to discuss progress on implementation of the Activity Proposal and Roadmap and exchange information.

The Working Group will send the Activity Proposal and Roadmap for approval to the Council of Advisors and report on the progress in the activities at each Council of Advisors meeting.

In fulfilling its Mission, Objectives and Areas of Work, GF-WG5 will be supported by the NEA Division of Nuclear Law.

## **Collaboration**

GF-WG5 is developing links with both OECD and non-OECD Bodies. In particular, the Working Group will seek opportunities to collaborate where the expansion of nuclear law learning will contribute to the objectives of other OECD and NEA initiatives. In addition, GF-WG5 will interact extensively with the NEA Division of Nuclear Law, as well as the NEA Nuclear Law Committee and its Working Parties and will collaborate with other Global Forum working groups.

The Working Group will also strive to establish collaborative relationships with:

- regional governments such as the European Commission (EURATOM);
- international intergovernmental organisations like the IAEA;
- legal organisations like the International Nuclear Law Association (INLA) and International

Bar Association (IBA);

- industry organisations like nucleareurope, the Nuclear Energy Institute (NEI) and the Nuclear Industry Association (NIA);
- international financial institutions like the World Bank;
- companies in the field of nuclear energy;
- universities that are represented in the Working Group; and
- other interested universities throughout the world.

When collaboration is sought from non-NEA member countries, the Global Forum Council of Advisors is to be informed and consulted, as necessary.

## **Areas of Work**

### ***1. Assessing the needs***

Before undertaking major activities, GF-WG5 must have a better awareness of the state of and needs for nuclear law education. To achieve this, GF-WG5 will survey:

- governments and private industry to determine their legal and professional needs, including consulting lawyers and legal officers at different stages of their careers;
- students to determine their needs and interest in the area of nuclear law (the potential pool for the survey includes those enrolled in energy and/or environmental law LLM programmes); and
- university and law school administrators to determine why it has not been included in curricula and how it might best be included by any roadblocks for the future teaching of nuclear law, including (recent) lack of institutional funding or support for nuclear law related research.

GF-WG5 members will work collaboratively with each other and with other universities and academics to map current offerings related to nuclear law and identify gaps in graduate nuclear law education.

These activities should be completed by the end of Q4 2024.

### ***2. Building momentum and support: universities and law schools***

Upon completion of the assessment, GF-WG5 will draft a report on the findings that can be presented to universities, law schools, governments and industry with a view towards building momentum, funding and support. This draft report should be completed by the end of Q1 2025.

Using the report as a basis, GF-WG5 will hold a colloquium and workshop on nuclear law education. The workshop will bring educators together to talk about nuclear law course development, how to teach nuclear law, and how to build support within university administration and students, as well as potential opportunities for joint programmes, among other topics. The colloquium and workshop should be held before the end of Q3 2025, subject to resources.

In addition, GF-WG5 will work with the NEA Secretariat to determine ways in which the publication *Principles and Practice of International Nuclear Law* can be made more widely available in university and law school libraries, as well as ordered online, on demand, in hard copy, as well as in e-book form.

### ***3. Building support and seeking funding: governments and industry***

Using the report described in Work Area 2 above, GF-WG5 and the NEA Secretariat will seek support and funding for universities and law schools, as well as voluntary contributions to the NEA, from governments and industry for the following:

- grants for academics to attend the International School of Nuclear Law (ISNL) and International Nuclear Law Essentials (INLE), with a goal to ensure the sponsorship of two academics in each session of the ISNL and three academics in each session of the INLE;

- financial support for scholarships for students enrolled in nuclear law education programmes;
- pipelines for internships during the nuclear law education programme and career opportunities after graduation from a nuclear law education programme;
- grants to universities and law schools for course development and/or endowed positions; and
- funding and grants to university energy and/or environmental law research centres to focus on nuclear law related topics.

#### **4. *Educator and student outreach and collaboration***

A focus of GF-WG5 is to create a network of nuclear law academics to exchange information and experience, at the very least, through quarterly meetings, and to outreach to other academics and students to build support and encourage collaboration for nuclear law.

GF-WG5 members should collaborate amongst themselves to offer seminars and webinars to introduce nuclear law to students and other academics at their universities, in particular to those in fields like energy, environmental and/or climate law. The Working Group will work with the NEA Secretariat to develop a list of potential topics and participants to focus on in these seminars and webinars, as well as a tentative schedule for these events taking into account the available resources of the GF-WG5 and the Secretariat. Topics will be determined on a quarterly basis depending on the level of interest of educators and the current focus of industry and governments.

In addition, GF-WG5 members should consider drafting articles and joint articles to foster dialogue and generate interest in nuclear law to publish in the *Nuclear Law Bulletin* (NLB) as well as other law journals (international law, energy law, environmental law, etc.) to expand the audience. The Working Group will work with the NEA Secretariat to professionalise the *Nuclear Law Bulletin* (NLB) such that academics and law students are better incentivised to publish in the NLB (for example, by establishing it as a peer-reviewed journal), thereby expanding its scope to a wider audience.

Finally, the Working Group will explore techniques and methodologies for the delivery of relevant academic learning programmes to an international studentship.