Competency Pathway Teacher (Math/Science)

GRADES 11–12 / FUNCTIONAL MATHEMATICS & APPLIED SCIENCE



INQUIRE · INSPIRE · IMPACT

Dear prospective colleague, Thank you for your interest in joining Nagoya International School. We want classrooms where students do more than answer questions: they question the answers, make connections and discover what matters. Our values of Safety, Growth, Belonging and Responsibility shape how we teach, learn and care for one another. Academic ambition and a sense of belonging go hand in hand; every child deserves to be known, challenged and supported.

We are seeking a second teacher responsible for Functional Mathematics and Applied Science in our Competency-Based Graduation Pathway (Grades 11–12). Launched in August 2026, it offers an alternative to traditional credit-based graduation through interdisciplinary, applied, real-world learning. Its six Global Competencies are Inquiry, Literacy & Communication, Numeracy, Creative Problem-Solving, Social Impact and Personal Responsibility; students demonstrate learning through projects, portfolios, exhibitions and performances of understanding. Currently this is a very small cohort and we hope it will grow.

Working alongside the teacher leading Literacy and Social Inquiry, you will co-design challenging, personalised learning that responds to students' strengths, needs and future aspirations. Functional Mathematics and Applied Science are not simplified conventional courses: they require rich disciplinary knowledge translated into authentic contexts. Using DuCKS (Dispositions, Conceptual Understandings, Knowledge and Skills), you will support highly capable learners and those needing additional help while refining curriculum, assessment and routines established in the pathway's first year.

Teaching and learning design

- Design and deliver Grades 11–12 Functional Mathematics and Applied Science through conceptual understanding, practical problem-solving and application to personal decisions, community issues, real-world challenges and interdisciplinary projects.
- Build sequences aligned with the six Global Competencies and DuCKS, differentiate for highly capable students and those needing support, and refine the curriculum foundations established in the first year.

Collaboration and programme development

- Co-plan integrated units, interdisciplinary projects and learning with the existing Literacy and Social Inquiry pathway teacher.
- Review curriculum documentation, assessment, learning routines and student support; evaluate effectiveness using evidence, working with the Grade 11/12 Coordinator, departments and colleagues to align with wider school expectations.

Assessment, portfolios and exhibitions

- Design authentic assessments of applied Mathematics and Science knowledge, conceptual understanding and skills; contribute to rubrics, narrative evaluations, feedback cycles and milestone exhibitions.
- Help students gather, select and reflect on evidence across all six competencies for their two-year learning portfolios and culminating Capstone Exhibition.

Student support and mentorship

- Build strong relationships attentive to individual strengths, needs and aspirations; foster agency, independence, personal responsibility and confidence through individual learning plans and mentoring, with clear feedback on progress and next steps.
- Work with colleagues, families and College Counselling to support students' post-secondary pathways and transitions.

Wider school contribution

- Contribute to wider MYP or DP teaching where qualified and needed, and strengthen authentic, experiential, service-oriented and community-connected learning within NIS's inclusive, holistic provision.

Essential requirements

- A BA degree in Mathematics, Science, Education or a related field, with a recognized teaching certification.
- Strong subject knowledge and demonstrated teaching experience in both Mathematics and Science, with the ability to create age-appropriate functional and applied learning for high-school students.
- At least two years' high-school teaching experience; experience with ages 16–18 is preferred.
- Experience with personalization, student choice and/or co-construction of learning content, process and evidence.
- Experience differentiating for highly diverse learners, including students needing additional support and those able to extend beyond planned expectations.
- Ability to design authentic inquiry and projects applying mathematical and scientific concepts, knowledge and skills in real-world contexts.
- A strong commitment to co-planning, shared assessment, collaboration across subjects and the continual development of an evolving programme.
- A commitment to collaborating with colleagues to make learning connected and meaningful.
- A commitment to NIS's values of Safety, Growth, Belonging and Responsibility, creating an environment where all learners are known, challenged and supported.
- A passion for holistic education, relational teaching and restorative approaches, with as much commitment to students' wellbeing as to their academic learning.
- The ability to provide/consent to clear police/background and medical checks.

Desirable attributes and experiences

- Experience living and/or working in an international context, preferably within an international school.
- Experience teaching IB MYP and/or DP Mathematics or Science.
- A master's degree or higher in Mathematics, Science, Education or a related field.
- Experience teaching Functional Mathematics, Applied Science or equivalent practical, transferable-skills courses; and/or experience with competency-based education, personalized pathways or alternative graduation programmes.
- Experience designing and assessing interdisciplinary inquiry- or project-based learning using competency frameworks, including portfolios, authentic assessment or exhibitions beyond examinations.
- Experience supporting diverse learning profiles, including students challenged by traditional academic pathways, and/or co-designing integrated learning across subjects in a teaching team.
- Experience supporting, coordinating or leading Creativity, Activity, Service (CAS), connecting experiential learning, reflection and community engagement.
- A reflective, adaptable approach, responsive to evidence and willing to refine evolving educational practice.

How to apply

Teaching candidates should ordinarily apply through Search Associates. If you are a local candidate and/or you are only looking at schools in and near to Nagoya, you may also apply directly to jobs@nis.ac.jp with a CV and cover letter explaining your circumstances. For current vacancy and application details, and more about working at NIS, visit **www.nis.ac.jp/careers/vacancies**