

learning.ppnc.eu — Create, check, connect.

Shared learning materials for every language section of the European Schools, starting with mathematics and physics.
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Why it matters

The 13 European Schools and 26 Accredited European Schools teach one syllabus to about 46 000 pupils. Yet every teacher, in every language section, builds the materials for the same learning objectives alone. That time does not reach the pupils.

39

schools, one syllabus (13 European Schools, 26 accredited)

46 014

pupils in total, school year 2025/26

2 614

teachers in the 13 European Schools (FTE)

4 → 24

languages today → ready for all official EU languages

Sources: Office of the Secretary-General, Facts and figures 2025-2026 (2025-10-D-1, p. 20); Accredited European Schools: 2025-2026 Data Report (2025-11-D-16).

What exists today

- **Learning platform** (learning.ppnc.eu): 12 courses and 178 learning pages in mathematics and physics, S4–S7, the same page in German, English, French and Spanish. Free, no login, no pupil data, any device.
- **Worksheets** straight from the syllabus on one template: 152 sheets, each with its solution sheet, since 22 August 2026. One worksheet already exists in all 24 official EU languages, translated locally with the open European model EuroLLM.
- **Tests and model solutions**: tests written by the teacher, model solutions as interactive pages in four languages (kuk.ppnc.eu, staff login).
- **Related tools**: Bac calculator for pupils and parents (bac.ppnc.eu), marking grids to Viatique (vtq.ppnc.eu), Bac to German Abitur conversion (kmk.ppnc.eu), staff timetable and supervisions (vigilancias.ppnc.eu).
- **Beyond maths and physics**: first pilots with colleagues in history (S5) and English (S6) (learning.ppnc.eu/kollegen).

How it is built

From the syllabus, checked continuously. Every page starts from one official learning objective, word for word. 304 automatic validation rules (7 October 2026; 101 in August) check every change: identical formulas in every language, no answer given away, tied to the syllabus, works on every device, no outside servers. Every mistake found once becomes a new rule.

Built on learning science. Support that fades (Kalyuga et al. 2003), mixed and spaced practice (Rohrer & Taylor 2006; Rohrer et al. 2020), several representations (Ainsworth 2006), fair tests that are quick to mark (Haladyna et al. 2002; Jonsson & Svingby 2007). Each sheet names the reason for its design; where research is thin, it says so.

Safe by design

Pupils' data. No accounts, no pupil names, no tracking, no analytics, no third parties. Learning progress stays on the pupil's own device. One server in Germany, encrypted connections only. Measured: 0 requests to other hosts across 9 sites, 0 cookies.

AI. AI helps the teacher; it never replaces the teacher. A teacher reviews and releases every page by hand. No AI inside the tools pupils use. No personal data, no internal documents and no pupils' work ever reach an AI. The portal is labelled "AI-assisted". The work has been checked against the Schools' framework and guidelines on generative AI (2025-01-D-65, 2025-01-D-66) and declared to the school management.

What it brings

2–5

worksheets with solution per teacher and week, by hand

≈ 40

per week with the checked AI chain (27 · 38 · 52 in weeks 38–40, 2026)

≈ 3 h

estimated time saved per maths or physics teacher and week (range 1½–4½ h)

≈ 100

full-time teaching posts per year, if the saving held across all subjects

For pupils: learning at their own pace, instant feedback, the same high-quality materials in every section, and the same page in their working language and in their own. For teachers: more time for individual support, less work without value for pupils.

Estimate, not a measurement: anchored on 6.8 h of planning per week (OECD TALIS 2018) and –31 % preparation time with AI support (EEF trial 2024, 259 teachers). "By hand" is one teacher's practice. A pilot year with short time logs would measure it.

Where it can go

The goal is individualised learning: every pupil their own path to the same objectives.

- **Paths for different learners:** several routes to one objective, more visual, more practice, more challenge, extra language support.
- **A suggested next step**, worked out from the pupil's own answers on the pupil's device, with no data on a server.
- **Practice that adapts**, and **feedback from pupils and teachers** that turns into fixes and new automatic checks.

Next steps: a growing team across sections, more subjects, and a pilot year.

Links

info.ppnc.eu everything in one place: presentations, this brief, technical overview, contact

learning.ppnc.eu the learning platform

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