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BACKGROUND

- For meaningful assessment, assessment methods should be linked to teaching and learning activities (TLA) and learning outcomes (LO), ensuring **constructive alignment**
- This can be enhanced through **learning design (LD)**
- Supporting assessment is one of the key ideas of the **Balanced Learning Design Planning (BDP)** concept and tool (Divjak et al., 2022)

BDP CONCEPT AND TOOL

- Comprehensive LD concept and tool implementing contemporary research findings and theory to support **balanced LD planning**
- Building on existing LD approaches: ABC LD, OULDI
- Developed in line with the design science methodology
- Support the implementation of various pedagogical approaches

INNOVATIVE FEATURES

- Focus on LOs: alignment of LOs at the study program and course level (vertical alignment), constructive alignment between course LOs, TLAs and assessment (horizontal alignment)
- TLA types: acquisition, discussion, investigation, practice, production, assessment
- Assessment validity: relative weights of LOs
- Student-centredness: LOs and student workload
- Curriculum analytics: LD planning in line with (innovative) pedagogical approaches

SUPPORTING ASSESSMENT

Assessment validity

- Assigning study program and course LOs with **relative weights**, possibly using multi-criteria decision-making (Divjak et al., 2021)
- At the course level, the relative weights of LOs can be further distributed among chosen **assessment tasks**

Assessment planning

- Type of assessment (formative or summative)
- Assessment points (if relevant)
- Assessment provider (teacher, peer, self, automated, other)
- Feedback provider (teacher, peer, automated, other)

Assessment analytics

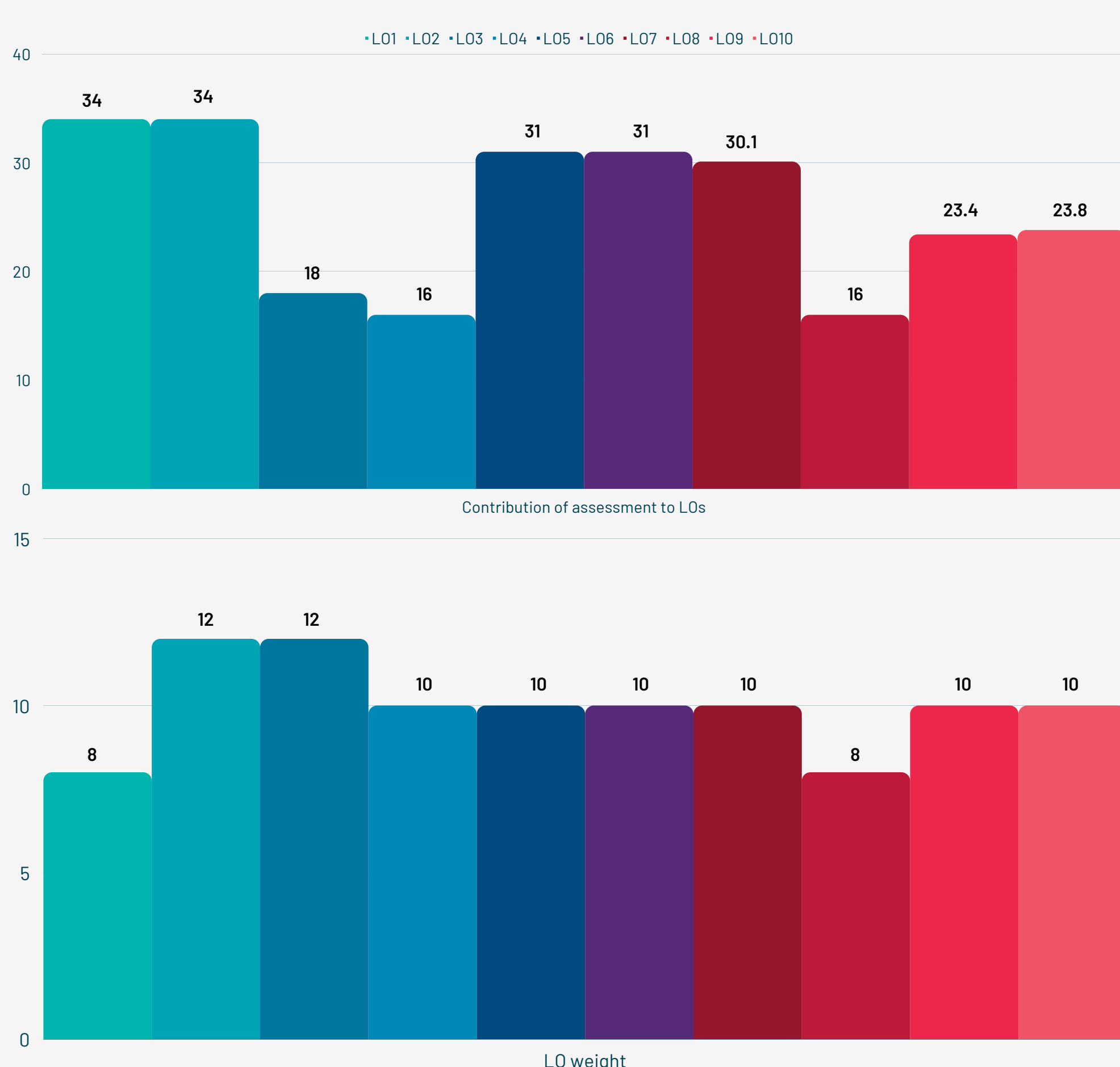
- Overview of course assessment with respect to the **assessment type** and the **assessment provider**
- Analytics of intended LOs' **coverage** through topics and corresponding assessment tasks
- Comparison of **assessment weights**, based on planned assessment activities, with the relative weights assigned to course LOs

PRELIMINARY FINDINGS

- Currently: 150 courses, 300 users, 20 countries around the world
- First cycles of validation within international projects (Erasmus+ RAPIDE, eDesk, Teach4Edu4): positive experiences of teachers, learning designers and researchers, input for improvements
- Further development: integration of the BDP tool with a Learning Management System, to complement the planning data with implementation data, as a basis for further learning analytics

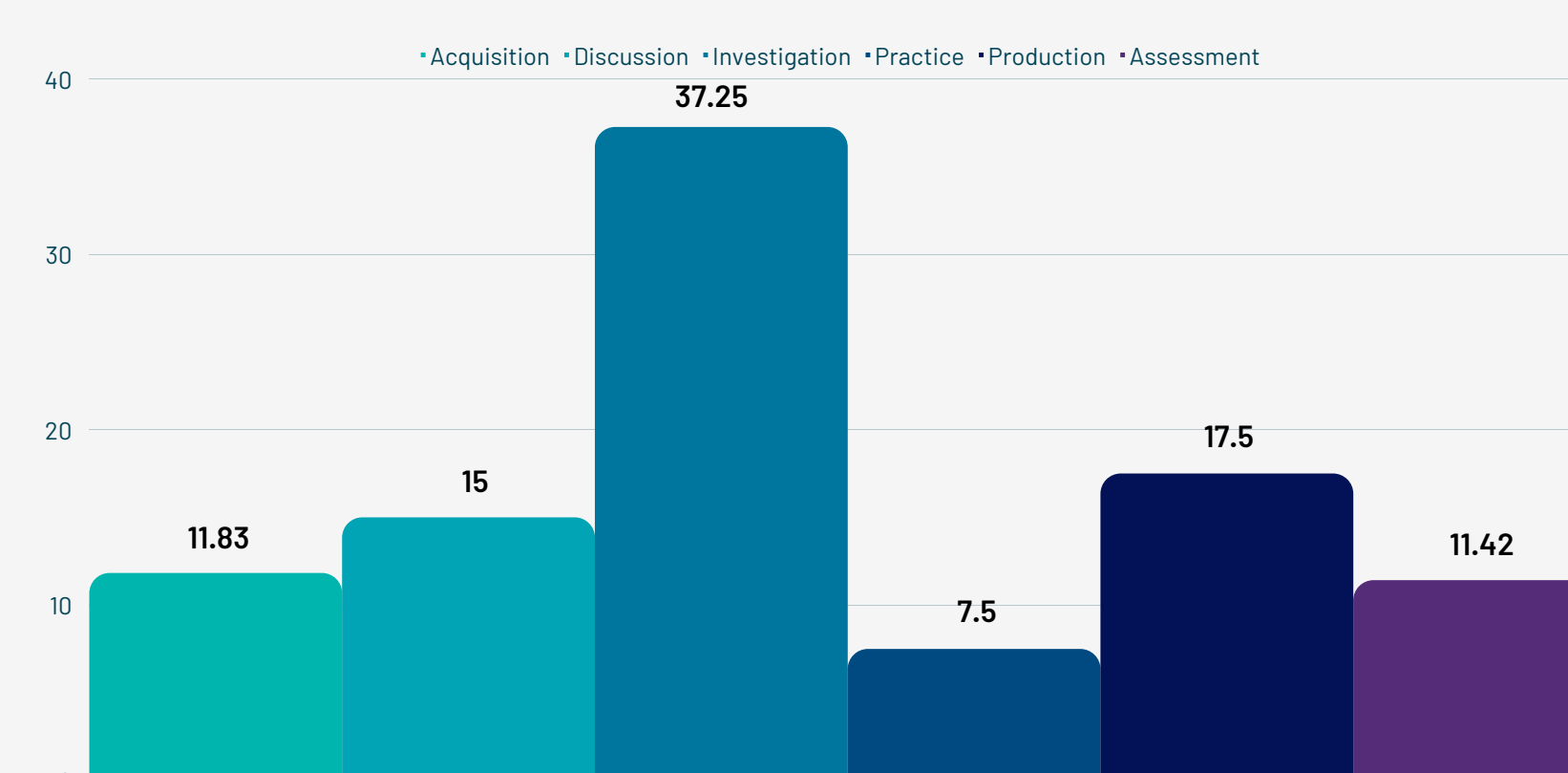
EXAMPLES OF ANALYTICS

Contribution of assessment to LOs (points) vs. ideal LO weights

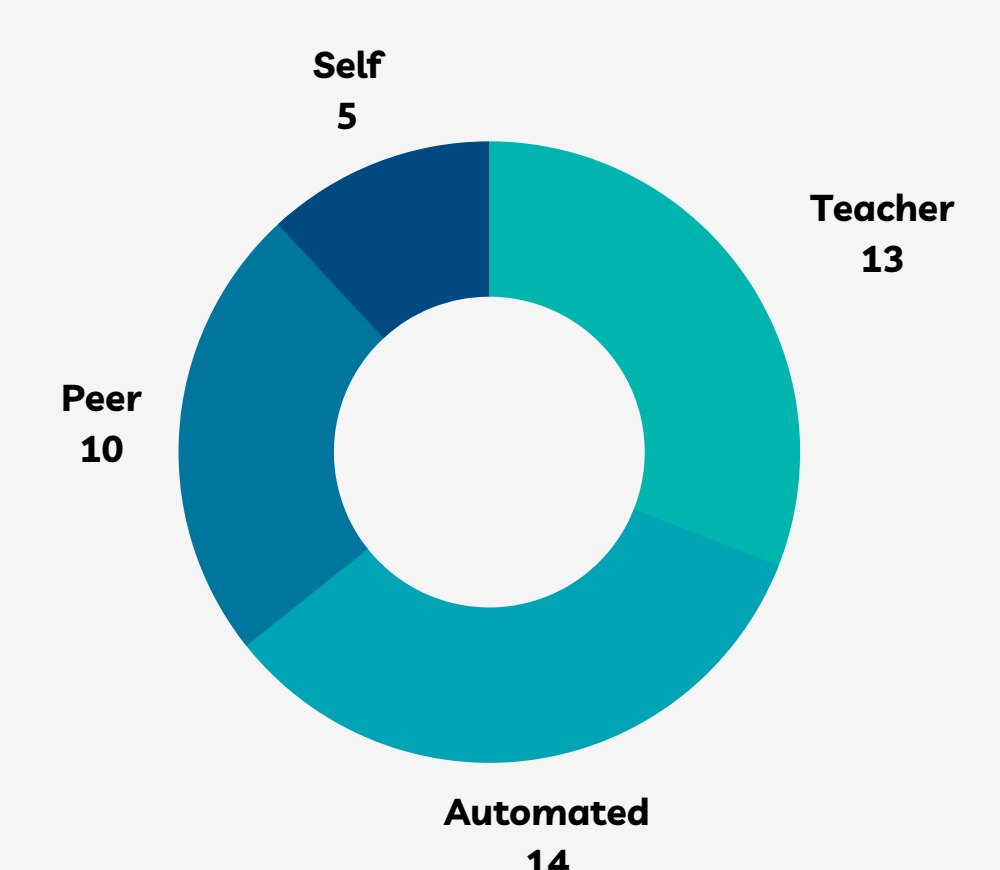


Examples based on the innovative pedagogies and learning analytics course prepared in the Erasmus+ RAPIDE project

Learner workload per TLA type (in hours)

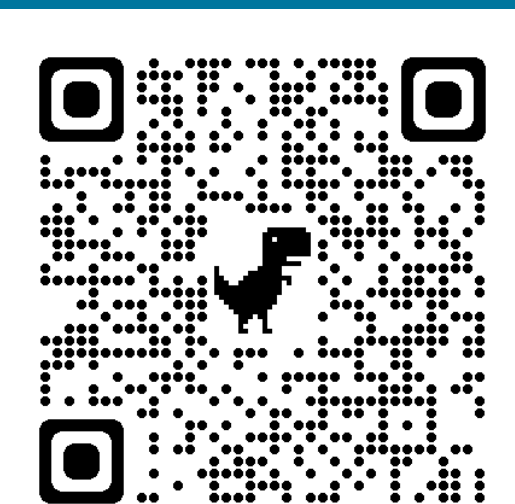


Assessment provider (count)



Assessment and learning outcomes

Topic	Assessment		L01	L02	L03	L04	L05	L06	L07	L08	L09	L010
	Formative	Summative										
Innovative pedagogies	6	30	90%	90%	10%						10%	
Assessment	4	12	10%	10%	90%	100%				100%		
Learning analytics	11	20					100%	100%	90%			20%
Impact	2	20							10%		90%	80%
Total	23	82										
	105		100%	100%	100%	100%	100%	100%	100%	100%	100%	100%



DESIGN LEARNING AND ASSESSMENT WITH THE BDP TOOL!

Visit www.learning-design.eu - scan the QR code!

Erasmus+ RAPIDE project: <https://rapide-project.eu/>

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REFERENCES:

- Divjak, B., Kadoić, N., & Žugec, B. (2021). The Use of Decision-Making Methods to Ensure Assessment Validity. *2021 IEEE Technology & Engineering Management Conference - Europe (TEMSCON-EUR)*, 1-6. <https://doi.org/10.1109/TEMSCON-EUR52034.2021.9488580>
- Divjak, B., Grabar, D., Svetec, B., & Vondra, P. (2022). Balanced Learning Design Planning: Concept and Tool. *Journal of Information and Organizational Sciences*, 46.