LTI integration of an assessment tool

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Makers of MathType
Type and **handwrite** mathematical notation with MathType. Easily include **quality math equations** in your documents and digital content.
Enhance your LMS or your questionnaire with mathematical features.

- Open answers
- Automatic grading
- Random parameters
- Graphs
- Units of measure
- Personalized feedback
Problem statement

- Customer is migrating to a SaaS LMS in few months
- They want to use Wiris Quizzes but we’re not integrated in the LMS

Develop a production-ready LTI integration of our math assessment tool in two months
We converted an already developed traditional integration into an LTI tool provider backend platform.
Security & privacy first: data isolation

- One completely isolated backend platform by institution.
- Scripted automatic stand-up backend platforms.
- Single LTI endpoint URL
- Launch redirect depending on the given credentials (consumer key)
LTI features

- Deep Linking: teachers can create & pick their questions through LTI

- Grading services: students and teachers immediately receive the grades in their usual gradebook.
Thanks LTI!

- We were really able to **deliver** the service before the deadline!
- LTI allows us to transparently recreate the **users, courses and permissions** from the source LMS to the backend platform.
- LTI allows us to deliver the service without accessing user **personal data**
Little difficulties

Network failures in grade services calls

Asynchronously repeat calls to grade services.

Tool space not enough for comfortable content creation

Add an *Open in new tab* link after login through LTI
Review workflow

LTI does not provide a way for the teacher to review the student work

- Coming **Gradebook Message** spec!
- Canvas LMS has its own **extension** for that
- Give up anonymity and let the teacher navigate in the backend
LTI activity granularity

LTI at question level

LMS

Question bank

LTI Tool Consumer

LTI Tool Provider
LTI opens your market

- Institutions can easily and **safely** use your LTI services.
- Institutions fully control the personal data shared with LTI providers.
- Easy to integrate with **multiple LMS** (not 100% free, but almost).
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