

Making School Textbooks Accessible for All Learners

Despite progress in inclusive education, standard school textbooks remain largely inaccessible and unusable for children with disabilities. Organizations working to adapt these materials rely on manual and time-intensive methods, which are unable to meet the scale and diversity of current needs.

In response, we are launching an ambitious research and development initiative that draws on large language models (LLMs) and advanced AI technologies to automate and enhance the adaptation of educational content.

Project Overview

This effort is part of a Horizon Europe project (Research and Innovation Actions) aiming to design and implement an automated pipeline for processing and adapting school textbooks. The core objective is to leverage state-of-the-art language models to produce materials that are accessible, interactive, and tailored to the needs of students with disabilities.

Adapted textbooks will be delivered in HTML format, and the infrastructure developed will be open-source, enabling national and international reuse and promoting innovation in educational accessibility.

Collaboration Opportunities

We are seeking collaboration with universities, research laboratories, and academic partners interested in advancing applied AI for social good. This is a unique opportunity to:

- Fine-tune and adapt LLMs for the transformation of standard textbooks into accessible and interactive learning materials.
- Develop novel algorithms to improve the efficiency and quality of educational content adaptation.
- Design AI-driven features specifically tailored to enhance the learning experience of students with disabilities.
- Contribute to the development of an open-source infrastructure to be shared with the broader scientific and educational community.

If your team is working on natural language processing, AI for education, accessibility, or inclusive technologies, we would be delighted to explore potential collaborations.

Contact us to learn more about the project and how your lab or university could be involved: caroline.huron@inserm.fr