DIGITAL TEXTBOOK Initiative in KOREA: The new experiences

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Themes

- Digital Textbook Experiences
- Important Issues
- Implications and Suggestions
Background of Digital Textbook

Change of learning environment

Textbook reform
- Limitations of printed textbook and existing system
- New classroom teaching & learning
History of DT Project

First Stage (2002~2006)
- Define the future form of textbook
- Research on future education, environments, textbook

Second Stage (2007~2013)
- Develop & apply prototypes to pilot schools
- Collect empirical data and analyze the results

Third Stage (After 2014)
- Integrate into all public schools in all levels
- Play a role as an official textbook
- Beyond the limitation of printed materials (resourceful, seamless, flexible, participatory, experiential and so on)
- Learner-centered & more learning opportunities
Digital Textbook Development
Digital Textbook Schools

Total: 63 (2011)

Seoul: 15
Kwangju: 6
Jeju: 1
Kangwon: 7
Daejeon: 8
Busan: 26
- English & Biology classroom in an elementary school
- 6th graders
- Urban area
### Digital Textbook Research

<table>
<thead>
<tr>
<th>Keyword</th>
<th>Topic</th>
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<tbody>
<tr>
<td>Academic achievement, Performance</td>
<td>• Academic and cognitive effectiveness</td>
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<td>• Comparative studies</td>
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<td>Satisfaction, Attitude, Motivation</td>
<td>• Affective influence on teaching and learning</td>
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<td>• interaction</td>
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<td>Others</td>
<td>• Copyrights for digitalized education material, DT as official textbook, Usability, Future education and school, Student health</td>
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- Better performed in **DT classrooms**
- Effective in **students in rural area**
- Effective in **low-performed students**
An Adaptive Model (2011)

- Learning Management
- Diagnosis & Treatment
- Digital Tools
- Classroom Management
- Database
- Other available resources

- Textbook contents
- Paper Textbook
- Extra activity
- Resource
- Test
- Material

Transform

Paper Textbook
An Adaptive model
An Adaptive model
An Adaptive model

**student**

**teacher**

- submit
- feedback

Scoring, comment
Important Issues

What the future textbook will become
- Textbook itself? Learning system?
- Many definitions, ideas…

Small educational effect
- Not really different from paper textbook
- Concerns about negative effect
- Return on investment

Integration into the existing educational system
- Change of textbook system, classroom teaching, school management
- Resistance against the reform
- The role of Digital Textbook in classrooms
Digital Textbook changes textbooks, classrooms, teachers and students, schools and other educational environments.
Suggestions

Freedom
Collaboration
Technology
Change (Innovation) of education
Digital Textbook

Regulation
3Rs
Nature (Essential) of education
Paper textbook

Individual learning
Thank you

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