

Digital Transformation of Education:

A Case from the Republic of Korea



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Background

- Expansion of Artificial Intelligence (AI) brought fundamental changes in educational content and pedagogical innovation
- Strengthening character, creativity, critical thinking, and multidisciplinary competencies
- Nurturing the talents of each student, helping all children navigate learning at their own pace, acquiring relevant skills and abilities
- Collecting and analyzing teaching-learning data for personalized learning



Main Strategy

- Back to the fundamentals with: ‘Education for All’ through personalized learning for each student
- Paradigm shift of learning: from concept-based knowledge to learning based on creativity, character-building, and critical thinking skills
- Transforming the teacher’s role: from teaching-focused to the role of learning designer, coach, and facilitator
- Building EdTech Ecosystem: facilitating a public-private partnership with the EdTech industry
- Organizational restructuring: establishment of the Digital Transformation of Education Bureau in the Ministry of Education



Five Policy Pillars

- The development of a digital textbook and courseware with AI-embedded technologies for adaptive learning
- The professional development of teachers: organize leading teachers group to share their knowledge with peers at regional and national levels
- Developing various teaching-learning models, making meaningful student-teacher connections
- Operation of digital model schools with concerted support from the Ministry of Education and the Regional Offices of Education
- Enhancing technology infrastructure including high-speed wireless internet, cloud-based applications, and one-to-one devices



Looking Forward

- AI-embedded digital textbooks and courseware to be phased in for Math, English, and Informatics from 2025
- Forming a ‘lead teacher’ group with a solid foundation of technological and pedagogical competency
- Designating over 300 model schools for the digital transformation of education will be operated by 7 Regional Office of Education
- Securing infrastructure for real-time data collection



Snapshot of a New Classroom

- Students are self-paced and self-directed to achieve higher competency levels
- With adaptive and blended learning environments, students can move forward at their own pace
- Teachers take on differentiated roles: instructors, mentors, coaches, data analysts, project managers, etc.
- Teachers empower themselves by participating in professional development programs and flourishing the community of practice
- Classes become more diverse, interactive, engaged with flipped learning, discussions, and project-based learning by effectively utilizing the appropriate technology

