

B.Ed. Two Year Programme

EPC.2: Critical Understanding of ICTs in Education

Maximum Marks: 50

Aim

This course focuses on providing practical experience and reflective engagement on critical issues related to Information and Communication Technologies in a workshop mode through presentations and seminars around selected readings. The course intends to engage student teachers to understand the role of ICT in education in relation to various policies and curriculum frameworks on ICT and in diverse socioeconomic contexts.

The course aims to provide a rich learning experience for student teachers through various ICT tools to enable them to engage diverse classroom contexts, to critically assess the quality and efficacy of resources and tools available, to access and suitably modify open educational resources, to develop their own pedagogic materials and pursue lifelong learning to strengthen their professional capabilities.

Unit 1 ICT in Education: Critical Perspectives

- ICT in the neoliberal era
- Technological determinism and its fallacy in education
- Free and open source movement and its impact on education
- Harnessing ICT's potential for education towards an egalitarian society
- Locating ICT in the context of National Policy on ICT in school education, national policies in education, curriculum frameworks for school and teacher education
- Legal and ethical issues of ICT use in education

Unit 2 Engaging with ICT for Teaching-Learning

- Understanding how to create and use documents, presentations, spread sheets
- Acquiring basic information literacy (web searching for discerning information sources)
- Understanding modes of web learning (virtual learning, blended learning etc.)
- Engaging in collaborative learning through synchronous and asynchronous ICT tools (email, web chat, blogging, micro blogging, wikis, and ICT technological tools)
- Understanding and using web supported pedagogical approaches (problem/project based learning, computer assisted learning etc.) through ICT tools
- ICT for assessment of/for learning
- Critical review of proprietary vs open source software use in education - open digital eco-system, open educational resources (OER), open connectivity, (free and) open source, open hardware.
- Developing functional skills to use discipline specific ICT tools (Geogebra, PhET ,Stellarium, Open Street Map, Marble, Turtle Art etc.)
- Developing an understanding of assistive technologies for inclusive classrooms
- Observing Netiquette

Unit 3 Professional Development through ICT

- Setting up teacher professional networks
- Lifelong learning through OERs, MOOC and other possibilities
- ICTs for material development;TPACK framework

Practicum

The student teachers will get practical experience of the ICT tools mentioned in Unit 2, to actively engage in learning, critically review/adapt open educational resources, create digital learning resources and participate in seminars and presentations.

Assessment

- a. Preparing ICT integrated lessons based on teaching a subject/ theme
- b. Individual student's portfolio on tasks related to critical understanding of ICT
- c. Portfolio of digital resources for teaching learning; developing subject specific resources

References

1. GoI (2012) *National Policy on ICTs in School Education*, MHRD, Govt. of India.
2. DSERT Karnataka (2012). *Position Paper on ICT Mediation in Education*. DSERT
3. Castells, M. (2009) *The Rise of the Network Society, The Information Age: Economy, Society and Culture Vol. I, II and III*. John Wiley & Sons
4. Benkler, Y (2006) *The Wealth of Networks: How social production transforms markets and freedom*. Yale University Press
5. Cuban, L. (2001). *Oversold & Underused: Computers in the classroom*. Cambridge, MA: Harvard University Press.