Several faculty members in our Faculty of Education have been working to integrate technology into the Elementary Teacher Education Program for several years. These efforts have been documented in several studies as instructors grapple with the evolving technological environment and their own well-established teaching practices. Christopher Moersch delineates the stages of technology development and suggests that integration is one of the highest levels. We have been working with our faculty members as they become more comfortable and capable with technology in their teaching. We have employed a community of learners approach (Browne, Maeers and Cooper, 2000) to ensure that this development takes place in a supportive environment where all who are willing are encouraged to ascend the technology learning curve starting wherever they are.

Recently, this technology learning curve has had another vertical extension. The innovation has been to equip three university teaching classrooms with networked computer mini-labs (4 computers) to emulate the mini-labs in elementary classrooms. This took place in response to a similar format begin used in classrooms in the region. The mini-lab concept provides many new possibilities as a resource for teaching and learning including students having immediate access to electronic resources. This move has also enabled our teacher educators to re-examine previous notions of technology integration and to become more aware of and creative with the various methods for integrating technology.

While there has been some pressure to require an introductory course in computers in education, we have resisted this approach, offering the course as an elective in the four-year program. Our focus has been on integrating technology into our educational methods courses in the professional year (third) of the program. Instructors are regularly reminded that they are expected to include some appropriate computer-based resources within each of their methods courses. Concurrently, students are enrolled in a seminar which includes five sessions that address educational uses of technology. Maeers, Browne and Cooper (1999) developed the seminars/modules as a framework so that students could connect subject area computer-related methods. The seminar topics include: Overview of the Evergreen Curriculum and GrassRoots project, website critical evaluation and education application, information literacy, activity formats and filamentality, media awareness. The current modules can be found on-line at http://education.uregina.ca/iteachered/.

Analysis of the teaching in the methods courses (in Mathematics, Music and Early Childhood) led to the identification of eight types of technology integration in teacher education. The types of technology integration include: “need to know” integration, programmed integration, simulation integration, presentation integration, reinforcement
integration, thematic integration, interactive integration and the most sophisticated type: conceptual integration. This paper will outline the various types of integration and the presentation will include a demonstration example of conceptual integration using the concept of “grids and coordinates” in several subject areas.


Maeers, M., N. Browne, and Cooper, L. (1999). Pedagogically Appropriate Integration of Informational Technology in an Elementary Preservice Teacher Education Program. In J. D. Price, J. Willis, D. A. Willis, M. Jost, and S, Boger Mehall, (Eds.) Society for Information Technology and Teacher Education Annual –1999, pp. 1157-1162. This paper won a Top Paper Award in the “Preservice Teacher Education & Technology” strand at the conference. This chapter is also distributed through the Teacher Education Internet Server and in the electronic CD-ROM version of the Annuals.