

## Research Notes

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### Case Studies of Subject-Matter Preparation Reform in United States Preservice Teacher Education

#### *Purpose*

The broad purpose of this research-in-progress is to examine closely some of the changes that United States colleges and universities are making in the arts and sciences major and in other parts of the higher education curriculum to improve subject-matter preparation for teachers at a selection of higher education institutions across the US. This will provide insights into the processes of program reconceptualization and administration and, more specifically and importantly, into the critique of certain habitual ways of thinking about subject matter and subject-matter teaching in the US, and programmatic responses to that critique. The specific goals of this research are:

- to develop case studies of teachers' subject-matter preparation reform at institutions attempting to incorporate new views of disciplinary knowledge into the university curriculum to deepen prospective teachers' understanding of their teaching field in response to critics of US baccalaureate and teacher education curricula (Association of American Colleges, 1985, 1991a, 1991b; Boyer, 1987; Holmes Group, 1986; Murray & Fallon, 1989, 1991);
- to identify how new views of knowledge interact with, and sometimes fuel, subject-matter preparation reforms and to identify the types of disciplinary knowledge beyond information and skills being added to disciplinary preparation for prospective elementary, middle level, and secondary teachers;
- to identify curricular purposes, design principles, trends, and innovations for subject-matter preparation programs within and across institutions;
- to understand the different curricular structures of teachers' subject-matter preparation programs in terms of the different types of disciplinary knowledge they are intended to develop in prospective teachers, for example, capstone seminars with independent inquiry, bi-discipline courses with disciplinary perspectives, modes of inquiry courses with theory of knowledge;
- to understand the origins of subject-matter preparation reform at each institution and the change strategies used to bridge the departmental boun-

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daries that typically impede faculty interaction and curricular deliberations about teachers' disciplinary preparation.

#### *Background and Context*

This research builds on the findings of two earlier studies of subject-matter preparation reform in the US, one from the perspective of baccalaureate and teacher education reform documents during the 1980s (Kinach, 1992) and one from the perspective of philosophers whose conceptions of subject-matter knowledge validate, clarify, and extend the sort of disciplinary knowledge reformers maintain teachers need (Kinach, 1994). Collectively, these studies call into question the nature of content in the academic major and other parts of the curriculum where teachers' disciplinary knowledge develops. What was, and still is, at issue in the debate over teachers' disciplinary preparation in the US is our conception of subject-matter knowledge as information and skills. What we desire are educational outcomes beyond information and skills. Yet we seem to lack the language, or a framework, for talking about the nature of knowledge and skills across university disciplines.

#### *Theoretical Framework*

To facilitate discussion about the new views of knowledge fueling subject-matter preparation reforms, I use the levels of disciplinary understanding as a preliminary vocabulary or framework with which to explore the parameters of knowledge in subject-matter preparation programs. This framework, which is my modification of the work of Perkins and Simmons (1988), Donald (1990), and Schwab (1978), identifies four levels of disciplinary understanding beyond the content level of information and rote skills usually taught in schools, including the concept level of ideas guiding inquiry in the discipline, the problem-solving level of general and discipline-specific strategies and metacognitive tools for monitoring one's own thinking, the epistemic level of warrants for evidence in a discipline, and the inquiry level of generating new knowledge in the discipline.

#### *Progress Report*

During the first phase of research I developed a questionnaire based on the reform documents cited above to guide data collection about programs. Through my analysis of reform documents and reports of institutional progress (Kinach, 1994, n.d.), I identified five sites for campus visits based on their curricular and administrative innovations. At present I have collected data for four of the five case studies (Kinach & Moore, 1992).

#### *The Potential Impact of these Case Studies*

Besides presenting the theoretical foundation and curricular design of each program, I intend to highlight two different, but related, difficulties in teachers' disciplinary preparation in these case studies so that future reform initiatives will build on insights gained during the 1980s. As I have said, the first difficulty is the nature of disciplinary knowledge in the curriculum. I intend to make clear in these case studies not only the language, but the curricular vehicles created to convey different aspects of disciplinary knowledge beyond information and skills.

The second difficulty I expect to explore is the administrative structure of teachers' disciplinary preparation, especially the logistics of program review, reconceptualization, and implementation when faculty reside in different university departments. This is a longstanding problem. And although the Association of American Colleges for Teacher Education (2000) has put forward the principle that all university faculty have collective responsibility for teacher education, departmental boundaries still hamper efforts to reform subject-matter preparation. With few exceptions the practice persists of housing professional studies in education departments and content studies in arts and sciences departments. These case studies will offer alternatives to this administrative organization.

The timeliness of these case studies for improving subject-matter preparation is augmented by several synchronicities. First, their main premise (i.e., that subject-matter preparation reform rests on expanded views of subject-matter knowledge) is bolstered by another potentially revolutionizing discussion now taking place in the pages of the *Educational Researcher* about new views of knowledge and their implications for teacher learning (Putnam & Borko, 2000). Second, reliable data on effective subject-matter preparation reform is now urgently needed to inform policy debates and decisions certain to emerge from a controversial report *Teaching the Teachers: Different Settings, Different Results* recently published by the Educational Testing Service (Wenglinsky, 2000) that overlooks advances made since the 1980s. Finally, just as my decision to share this research note was inspired by Cole's (2000) report of research-in-progress on Canadian preservice teacher education, I hope scholars doing similar work will join this discussion to advance the comparative international study of preservice teacher education.

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