ED 478 254 EA 032 627

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TITLE Needing To Know: Education Leadership Preparation and

Research Literacy.

PUB DATE 2003-00-00

NOTE 23p.; Paper presented at the Annual Meeting of the American

Educational Research Association (Chicago, IL, April 21-25,

2003).

PUB TYPE Reports - Research (143) -- Tests/Questionnaires (160)

EDRS PRICE EDRS Price MF01/PC01 Plus Postage.

DESCRIPTORS \*Administrator Education; Administrator Qualifications;

Administrators; College Curriculum; Course Content;

\*Educational Research; \*Educational Researchers; Graduate Study; Higher Education; Instructional Design; Instructional

Development; Instructional Leadership; \*Management

Development; Professional Education; Research Methodology;

\*Research Skills; Researchers; Scholarship

IDENTIFIERS \*Research Training

#### ABSTRACT

What needs to be presented to practitioners, particularly school leaders in training, for them to become educated consumers of education research? This paper attempts to sort through the issues and evaluate some of the instructional alternatives available to education administration faculty and curriculum designers. Taking into account a political and intellectual context that features tenacious and persistent debate over identifying quality research, this paper employs a three-pronged approach to analyzing the problem of introducing research literacy to educational leaders. First, placed in the context of course construction, a consideration of recent commentary on how best to introduce practitioners to education research provides an overview of debates among faculty in schools of education. Second, a content analysis of three popular textbooks on educational research methods allows for observations about the quality and applicability of instructional resources available to methods teachers. The paper also incorporates data collected from surveys of teachers and administrators in two graduate educational administration programs for future educational leaders located at a prominent research-oriented school of education. The survey instrument is appended.) (Contains 6 tables and 16 references.) (Author)



# Needing to Know: Education Leadership Preparation and Research Literacy

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#### **ABSTRACT**

What needs to be presented to practitioners, and particularly, school leaders in training, so that they can become "educated consumers" of education research? This paper attempts to sort through the issues and evaluate some of the instructional alternatives available to education administration faculty and curriculum designers. Taking into account a political and intellectual context that features tenacious and persistent debates about identifying quality research, this paper employs a three-pronged approach to analyzing the problem of introducing research literacy to educational leaders. First, placed in the context of course construction, a consideration of recent commentary on how best to introduce practitioners to education research provides an overview of debates among faculty in Schools of Education. Second, a content analysis of three popular textbooks on educational research methods allows for observations about the quality and applicability of instructional resources available to methods teachers. The paper also incorporates data collected from surveys of teachers and administrators in two graduate educational administration programs for future educational leaders located at a prominent research-oriented School of Education.

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April 2003 AERA Annual Meeting Chicago, Illinois Session SIG SEA T7

# Needing to Know: Education Leadership Preparation and Research Literacy

# Sheri H. Ranis Social Science Research Council

"I guess my biggest problem with the class is that I don't see how this will help me become a better administrator. Knowing what I know from my 20+ years in independent schools - I know it would be impossible for me to conduct research as an administrator. It's not that I don't see value in research: I do. It's just that it is not applicable to us because there is simply not enough time in the day..." Graduate student reflecting on the utility of an introductory course on research methods in education, October 2002

What kind of curriculum in research methods needs to be presented to practitioners, and particularly, school leaders in training, so that they can become educated consumers of education research? This paper attempts to sort through the issues and evaluate some of the instructional alternatives available to education administration faculty and curriculum designers. Preparing tomorrow's leaders of schools for their roles as managers of complex organizations can take on many forms, but a very common training forum is the use of graduate level courses in education administration in Schools of Education. Programs for practitioners usually include at least one class that focuses on the methodologies aligned with education research. It is a concern with the instructional content of these courses that this paper focuses upon.

As graduate students, most teachers and administrators in programs dealing with educational administration and leadership will be asked to produce academic style research for their courses and major degree requirements. But beyond the academic necessity, with the passage in 2001 of the Elementary and Secondary Education Act by Congress, commonly known as the "No Child Left Behind" Act, school leaders have had to come face to face with federal legislation that requires them to marshal "scientific evidence" to back-up their curricular and programmatic choices. It seems that it is more important than ever to make sure that district and building-level leaders in schools have the skills to be "educated consumers" of education research. Ideally, this means that school leadership needs to be able to identify what is really research rather than rhetoric and have the capacity to look at the evidence presented — the narratives, statistics and pictorials — with caution, and even skepticism. To be able to see through eloquent words and politics, recognize the claims being made, and be in a position to judge the strength of the argument and the pertinence of the evidence being marshaled, and to do this by



sifting through the almost overwhelming flow of education research produced in the United States, is not a task for the unskilled.

Taking into account a political and intellectual context that features tenacious and persistent debates about what is good research, this paper employs a three-pronged approach to analyzing the problem of introducing research literacy to educational leaders. First, a consideration of recent commentary on how best to introduce practitioners to education research provides an overview of debates among faculty in Schools of Education. Second, a simple content analysis of three popular textbooks on educational research methods allows for some observations about the quality and applicability of instructional resources available to methods teachers, as well as for the laying out of some alternative organizational strategies for that material. The paper also incorporates data collected from surveys of teachers and administrators in two graduate educational administration programs for future educational leaders located at a prominent researchoriented School of Education (n=53). The feedback provided by these students on the spectrum of research methods presented to them during an introductory course to research methods and their assessment of the relative usefulness of this information provides insight about what future educational leaders themselves think they should know; another key set of considerations for those who wish to engage and teach them.

## What Do Education Leaders Need to Know?

As an instructor in a course that introduces research methodologies to practitioners who have been singled out as potential school leaders, I have found it a challenge to determine what kind of curriculum best serves the needs of my students. Methods courses have an understandable reputation as being tremendously boring; that is understandable since teaching methods means teaching about abstract notions about knowledge production, claims and evidence and introducing some very complex techniques in an understandable manner. But beyond that evident instructional challenge lies another more insidious issue about curriculum design. Making the case for the relevance of understanding research methods is, to my mind, an integral part of effective instruction. Should an introduction to methodologies be a scoop up and focus exercise on a few, well-chosen and practitioner-oriented methods? Or should it skim the surface of the wide variety of methodologies in practice in education research? My stance has been that providing a broad overview of possible research methods, along with the basic vocabulary of social science research, a review of research resources and an emphasis on research ethics is what future education leaders need to know. However through my classroom experiences, in discussion with colleagues, and with quite a bit of personal reflection, I have begun to question whether or not a broader curricular approach serves the purpose of making teachers and administrators into educated consumers of research, or if it instead does the opposite: simply convinces future leaders that research is irrelevant to their experience and careers as educators.

The overview approach to teaching research methods is not without its own problems. Providing skills and thereby producing discriminating consumers of research



through courses in Schools of Education is complicated by the fact that methods are tools for understanding that are built on rather abstract notions about the way we know things and the way we organize knowledge. Moreover, the field of education research itself encompasses a spectrum of research traditions and approaches that span the social sciences, dip into the humanities and more than brush against several important professional fields like social work and law. My assumption has been that to become a discerning consumer of research one needs to know the norms of research: the vocabulary of a field, the techniques available to build inquiry; and the resources that enable us to assimilate the work of predecessors and colleagues. But what if those simple building blocks are either hotly contested or non-existent as is the case of education research?

The field of education is a big tent that includes anyone that conducts any kind of research that deals with instruction and learning, making it an inherently interdisciplinary and even eclectic pursuit. The field's inclusiveness is a strength – interdisciplinarity means the sharing of ideas, findings and methods between disciplinary traditions – and sharing produces new and innovative ways of knowing things that strict adherence to a particular disciplinary tradition might not yield. But being a collection of disciplines rather than a single, coherent, field of study has major drawbacks. Constituencies involved and trained in very different research traditions – among them, philosophy, psychology, anthropology, economics, sociology and history, not to mention applied fields such as social work, clinical psychology, and policy studies – do not share common understandings, vocabulary and methods. They do not ask questions or measure results in the same way.

Education thus has not developed a "core" of knowledge – "what every good scholar should know" (Schoenfield, 1999). Nor does it have a selection of theory or research literature that serves as the basis for universal understanding of how one conducts research – in other words, a "canon." This makes it very difficult if not impossible for knowledge to accumulate and build on itself. Rather than constructing new ideas based on the foundations of preceding work, educational researchers are stuck in what David Labaree evocatively calls "quonset huts of knowledge" (Labaree, 1998) – short term or ad hoc groupings of like-minded researchers pursuing understanding but not connected to previous research or others doing similar work. Fragmentation of research results from the often self-imposed isolation and specialization of educational researchers.

The consequences are that training educational researchers utilizing a comprehensive overview perspective is very difficult: any attempt to introduce core knowledge and key literature requires covering a wide, maybe too wide, spectrum of styles of inquiry. As discussed in depth by Pallas (2001) the selection of what epistemologies and methods are to be covered in the graduate classroom is a process that inherently privileges certain kinds of epistemological traditions over others. An introduction to research methods means acknowledging that the course is as much a presentation of a selected number of social science methodologies as it is about research on education. Graduate students in education are attending courses in research methods to



be literate in their field. But skimming the surface of a series of prominent social science research methods may be simply confusing as well as make students feel daunted in terms of their ability to internalize, retain and utilize these methods themselves. This is particularly true for single semester methods courses. Successful curriculum in methods should be able to manage the line between necessary content and potential information overload.

Concern with curricular content has elicited some recent debates among scholars in Schools of Education. I have framed the issues surrounding content and responsiveness to student needs into two: methodological hierarchies and academic versus practitioner orientations. After a brief discussion of these themes, the paper presents some preliminary empirical analyses, namely a content analysis of three popular graduate-level research methods textbooks and an examination of graduate student responses to an introductory research methods course.

## What Should be of Concern to Methods Instructors?

Methodological hierarchies

The "No Child Left Behind" Act of 2001 did not arise from an intellectual vacuum: within the academically-oriented education research community and funders of that research, strong, publicly-voiced ideas about what constitutes good research abound and are germane to considering what is worthy of being taught to future leaders of education. Clearly reflected in that legislation is a view shared by many distinguished researchers in the field that education research should be more "scientific" in its conduct and analysis (National Research Council 2002; Mosteller and Boruch 2002). Moreover, the Department of Education under the Bush administration has made strong pronouncements that there is a gold standard in research design, namely, that the highest quality research is composed of experimental designs that use randomized controlled trials. This stance has been backed up by congressional appropriations and organizational reform of the Department of Education in the summer of 2002 that mandates that federal dollars must support this "highest level" of rigorous research. Ignoring generations of epistemological debates within the academic community, the U.S. government has sanctioned a de facto hierarchy of methods regarding scholarship in education; a fact that has not been disregarded by the educational research community (see Educational Researcher, Special Issues, Vol. --, Winter 2003).

The most rigorous science falls under a category variously labeled "formalist", "quantitative" or more properly called, "positivist." Approaches to research design and methods of this sort encompass experimental, quasi-experimental and rigorous survey research methods, among others. Positivism rests largely in a legacy of inquiry about education that derives from the fields of psychology and sociology and the sub-field of educational measurement and statistics. The scientific approach to understanding learning was influential in the development of U.S. teacher education throughout the first part of the 20<sup>th</sup> century (Schneider, ----). The impact remains today: a quick review of a



selection of education research methodology textbooks that are utilized in introductory or survey courses on education indicates that all were written by authors with positivist orientations (Ary, Jacobs and Razavieh; Fraenkel and Wallen; Wiersma, Best and Kahn; Langenbach, Baughn and Asgaard).

However, positivist approaches to education research have never gone unchallenged. (See Greene, 1997 for a particularly passionate and well reasoned argument against the structure of this kind of methodological hierarchy.) Ongoing discussions about what constitutes good science beyond positivist approaches and methods are also being pursued in a variety of public and academic fora, such as the continuing efforts of the National Research Council to investigate the incentives that improve the structure of education research, joint work by the Social Science Research Council and the National Academy of Education focused on mapping what constitutes quality in education research within and outside of the academy, and efforts by the Campbell Collaboration to begin to collate meta-analyses on key education questions and issue areas.

The implications of the current politics of methods for courses designed to engage educational leaders are several. First, the fact that there is a politics of methods and that there are large resource allocation issues attached to it is important for students to understand. Methods might be built on abstract notions of what knowledge is, but the ongoing struggle about what constitutes quality research is contemporary, fast-breaking news and interesting to discuss. As I indicate in my lectures, choosing methods is often seen as choosing sides in a battle not just for academic bragging rights, but for the creation of particular kinds of research agendas with real dollars at stake.

Second, the epistemological divides that set up methodological rivalries must be made to clear in order that students better understand the context of what is happening to education research today. A basic description of the spectrum of epistemological possibilities and the research methods derived from them is vital. Students need to realize that accepting a methodological hierarchy has consequences; namely, the potential exclusion of certain kinds of knowledge and information about learning and instruction (Weiss, 2002). They can only do that if they realize what is being suggested by exclusion by whom. I ask them to consider if the loss of education's "big tent" might prove to be a larger loss than we can bear since it not only suggests that education research may only be for a particular kind of researcher, but that there will be whole categories of inquiry that could provide solutions or prove useful in our analysis of problems in the classroom or, more broadly, in the politics of schooling that will no longer find funding or favor among scholarly societies and publications.

Third, and hopefully quite obviously, providing an evenhanded approach to the description of the range of methods available to researchers in education is key. Both the benefits and the drawbacks associated with these tools of inquiry, should be made as plain as possible. To be fair, some personal reflection about stances should be thrown in. As no faculty member of any School of Education can or should claim to be an objective or impartial about such matters, it is necessary to be up front about one's own personal



methodological training and predilections. This can elicit some interesting classroom dialogue.

Finally, emphasizing the evolving and additive nature of methods is another important and potentially engaging theme. Pallas (2001) has noted that teaching epistemological diversity is a problem that is not going away: rather, with the rise of new approaches to knowledge production and research design, understanding that diversity is more important than ever. Chronicling the development of more contemporary methods in the classroom, for example the rise of postmodernist approaches to research and the reactions and counter-reactions to it, I have found, provokes students to think about the flow of innovation and improvement in methods, as well as reinforces their understanding of the deeply contested nature of what marks good research.

# Academic v. practitioner-focused research

Beyond the debates about the relative worthiness of various research methods must be overlaid another issue of concern: how does practitioner-oriented research of the kind that future education leaders will most often run into and practice in graduate classrooms fit into the spectrum of methods that education leaders must learn to understand? To some extent all graduate students in education administration degree programs at Schools of Education share this common dilemma: they are required to become producers of education research during their tenure as students that is judged by academic standards and precepts, but in the real world, as teachers and administrators, their ability as critical readers of research is much more important. Graduate students, particularly those who are being prepared to serve as educational leaders, are strung up between the poles of academic and practitioner-centered research. As Anderson (2002) has noted, this has led to a kind of "schizophrenia" of outcomes: research products such as dissertations that attempt to meet academic research standards but with content that continues to reflect insider knowledge and beliefs and the shifting, complex reality of particular school and educational settings.

Suggesting that academic research methods are relevant to the real world means confronting those strongly held beliefs of teachers and administrators turned graduate students. Their "personal epistemologies" are based on what they have experienced in the real world of the classroom, faculty meetings and parent-teacher conferences (Neumann, Pallas and Peterson, 1999) and can engender resistance to discussions of more abstract and theoretical understandings of the various social, political and economic phenomena involved in understanding schools and schooling (Ibid., Labaree, 1998). Moreover, for these students research relevance is often signified by findings rather than the process through which those findings were made. My students want to know which study provides definitive evidence and answers for problems they find in the classroom or among their administrative colleagues. The fact that the multiple iterations and variation in conditions of research suggests the right answer is "it depends" is very frustrating to them. Understanding the nuances of what "it" means does not seem particularly empowering.



Adding practitioner-oriented methods such as Action Research to course coverage is an obvious response to this concern. But again, it is important to practice transparency in presentation. The fact of the matter is that practitioner-oriented methods are not considered to be "real" or "legitimate" research, despite some very hefty academic legacies, such as Kurt Lewin's emphasis on problem solving and postmodernism's reification of the personal narrative (Metz and Page, 2002). The low status of research pursuits by education professionals seems in keeping with the low status generally accorded to teachers and administrators in the United States, and is an excellent subject for classroom discussion and debate.

A similar topic for discussion concerns the distinctions to be made between academic, peer-reviewed journals and online resources and the publications produced by teacher associations and other education oriented organizations that are much more familiar to education leaders turned graduate students of education. Being able to recognize when an article is actually research rather than journalism or even advocacy is a key exercise. I have assigned students the task of finding a research article to critique with a prerequisite that they bring it to me for a check on whether or not it is actually research before they begin their analysis. Following that exercise is a class discussion of the "markers" of academic publications. They also are asked to identify at least two academic research journals that deal with their area of specialty as educators by going to the university library and interviewing faculty. These may seem to be rudimentary pursuits and perhaps unworthy of graduate level education, but I have found them to be a means of re-orienting practitioners and giving them some baseline guidance on how to sort through the plethora of resources available to them.

The tension between academic and practitioner-oriented approaches generates another, perhaps obvious, implication for methods courses. The fullest possible integration of real world education problems and case studies is an important means to illustrate the usefulness and relevance of more traditional tools of research. This can be delivered via short simulations or problem-solving modules centered on using particular methods and by assigning the execution (or partial execution if time disallows it) of a small-scale research project. The point is that when conducting real research in the real world things get very messy. An introduction to methods presenting the paradigms of quality and the ideals of validity and reliability presents what might seem to be impossibly high standards for graduate students to meet. Students' notions of the applicability and utility of research methods can be better shaped if they are asked to plunge in and experience for themselves how tools of research can be applied and what kinds of insights may or may not be gained from them.

Finally, and quite related to the notion of distinctions between academic and professionally produced research, is the issue of audience. Who are researchers writing for and how do they communicate what they know? Since the goal of most of education research and all of practitioner oriented work is problem solving, it makes sense that being prepared to represent research findings to multiple audiences – scholarly,



practitioner, policymakers, the lay public – and being able to take into account how writing for those audiences can shift the tone and content of research findings, is a very important for graduate student to understand in both their roles as producers and consumers of research (Neumann, Pallas and Peterson, 1999). We are hopefully not being put in the position of instructing future education leaders to restrict their writing style and presentation to the use of often arcane language and rhetoric. There is a balance to be struck in dissemination as there is in execution of research. In exercises requiring students to critique research articles, I enclose a rubric that prominently features these kinds of questions. Who is the author writing for? How does the nature of the audience shape the piece? Is there evidence of a political or social agenda being pushed? What might be some of the underlying and unarticulated questions that are being responded to? Are there contextual factors such as the journal selected, timing of publication that are part of the explanation of why the article asks certain research questions, uses certain kinds of data and does or does not contest previous research? Similar questions are posed about their own work.

Responsiveness to the issues presented by methodological hierarchies and academic/practitioner approaches can help shape a methods course, but how useful are current textbooks in support of an overview style curriculum? And what about student reaction to this set of curricular choices by the instructor? It is to these questions that we now turn.

# Methods and Data

#### Methods Textbooks

A purposive sample of textbooks available for introductory courses in education research methods was drawn using the following selection criteria: attention to reasonably recently produced or revised volumes (within five years); texts with long-standing popularity as evidenced by there being four or more editions produced; and texts that are from different publication houses. Two of the three textbooks examined (Fraenkel and Wallen; Wiersma) were utilized by the researcher in course instruction. The three textbooks selected for analysis are listed in Table 1.

Table 1: Introductory L	evel Textbooks on Education Re	search Methods		
Author(s)	Title	Publisher	No. of	Year Last
Editions Rev.				
Ary, Jacobs, Razavieh	Introduction to Research in Ed	d. Wadsworth	6	2002
Fraenkel and Wallen How to Design & Evaluate Research in Education				
		McGraw-Hill	4	2000
Wiersma	Research Methods in Ed.	Allyn and Bacon	7	2000

The analysis entailed the examination and comparison of chapter organization and contents and page allocation for each book along the following dimensions: the inclusion



of description of the field of education research; the presence or absence of an introduction of theoretical (and particularly epistemological) concerns in research; the presence or absence of a description of steps in research design; a count of the number and variety of methods included and excluded and the balance struck between quantitative and qualitative methods; and the inclusion of case studies and examples of those methods in use.

#### Student Surveys

Short surveys were distributed to two cohorts of graduate students in education at a Research I University in the northeast United States in the summer and winter of 2002. Copies of the survey are in Appendix 1. The cohorts were affiliated with two different competitive postgraduate degree programs in educational administration designed for teachers and administrators who are promising future education leaders. The first cohort (Cohort A) was selected from teachers and administrators in public schools in a suburb of New York City; the second (Cohort B) was selected from an international applicant pool of independent school teachers and administrators. Both cohorts were required to take a course in introductory research methods as part of their degree requirements. Each cohort received the same curriculum from the same instructor. Potentially significant differences in course content and conditions beyond the make up of the cohorts themselves included the fact that Cohort A was instructed in a compressed three week period during the summer while Cohort B had a full semester length period of instruction. Cohort A had already cycled through several compressed semesters of courses, while Cohort B was working through its first semester of instruction. Textbooks assigned for the two cohorts were different, although additional assigned reading material was the same. Class assignments were also different in light of the very different amount of time available for instruction.1

#### Findings

#### Methods Textbooks

The results of the rudimentary analysis along the dimensions of attention to relevance, balance of coverage and attention to key topics can be seen in Table 2. Of particular interest are the two dimensions that attempt to get an indicator of the integration of methods instruction with relevance to the field of education, namely, whether or not there is a discussion or description of education research as an undertaking or as a field of study included in the textbook and whether or not there are case studies and concrete examples of methods use integrated within the text. All three volumes pay scant attention to the job of describing the idiosyncrasies and challenges associated with education research, although Fraenkel and Wallen do finish their volume with a special

<sup>&</sup>lt;sup>1</sup> Cohort A used Fraenkel, J. and Wallen N. "How to design and evaluate research in education" and was assigned two article critiques and a research project proposal. Cohort B used Wiersma, W. "Research methods in education" and was assigned two article critiques, a library exercise, a group research project proposal and the completion and presentation of a group research project.



section on doing research in school settings. Not surprisingly, all three textbooks pay attention to the integration of examples from education research, although the amount of space allotted to longer examples and case studies varies quite a bit. Fraenkel and Wallen provide the most consistent and comprehensive set of examples, particularly in the chapters covering specific methods. Ary, Jacobs and Razavich provide short references and examples, but with the exception of a full study exemplifying qualitative analysis, devote little attention to education examples when describing the various methods. Wiersma consistently uses short examples of education research throughout the text.

Whether or not the texts examined privileged quantitative orientations is relatively difficult to surmise from this limited data. We can see that the amount of statistical instruction included in all three is about the same amount in terms of chapter counts and that there are always more chapters devoted to descriptions of quantitative methods than qualitative, although that ratio varies either by chapter count or page count. Once again, Fraenkel and Wallen stands out with their relative balance of coverage and their special attention to education practitioners and their research pursuits.

In terms of two specific areas of focus, attention to epistemological and theoretical concerns, and coverage of research design steps, there is also divergence. Ary et. al. focus a large part of the first chapters of their text on describing the philosophy, constructs and theories around knowledge building. They also devote approximately 30% of their chapters to the various steps entailed in producing research, from development of the research question to dissemination and critical reading. Fraenkel and Wallen give very short shrift to abstraction and historical context, but provide the most extensive coverage of research design steps, utilizing 39% of their total chapters on the subject. Wiersma pays almost as much attention to theoretical and epistemological concerns as Ary et. al, but only devotes 25% of his chapters to the research design process.

Rudimentary analysis can only suggest rudimentary findings. The lack of consistent attention to drawing in and engaging educators is striking. The nature of the enterprise itself, especially its politics, the relevance of methods to pressing educational questions and the larger epistemological and theoretical debates are not major emphases of these texts. On the other hand, the building blocks of research design are clearly and appropriately the major focus of the volumes. Finally, the amount of pages allocated to positivist approaches and statistical instruction is consistent with conventional wisdom, that is, that quantitative issues get consistently more coverage than qualitative matters. However it should be acknowledged that the complexity of positivist methods necessitate careful explanation of numerous tools of analysis as well as specific vocabulary and procedures, and thus perhaps the allocation of space is justifiable and should not be attributed to author or field bias. Tentative generalizations to be made from this data suggest that the goals of comprehensiveness coverage seem generally well served by these texts, although the mission of relevance seems to be more inconsistently handled.



Table 2: Textbook Analysis	_		
Dimension		_	
	Ary, Jacobs and Razavieh	Fraenkel and Wallen	Wiersma
Description of the field of education research?	1 page at end of introductory chapter	1 page, first page, but chapter on during research in schools at end (10 pages)	2.5 pages at end of introductory chapter
Attention to theories and epistemologies	Yes: 1.5 chapters	Yes: brief consideration for 2-3 pages	Yes: most of 1 chapter
Coverage of Research Design Steps	2 sections (5 chapters) + part of final chapter on reporting : 30% of chapters	2 sections (9 chapters total): 39% of chapters	4 chapters:25% of chapters
Number of Methods Featured	4 quant	5 quant	3 quant
as Chapters  Quantitative/Qualitative  Balance (number of text pages)	2 qual 144 pages quant 68 pages qual ratio = 1:2.1	4 qual 184 pages quant 139 pages qual ratio = 1:1.3	2 qual 168 quant 69 qual ratio = 1:2.4
Use of Case Studies and Examples from Schools and Educational Research	Short examples from studies throughout text. Single study as example of Qualitative Research	Lengthy sample studies throughout text. Full section for practitioners.	Short examples from studies throughout text
Amount of Statistical Instruction	2 chapters (One section): 12% of chapters	3 chapters: 13% of chapters	2 chapters: 12.5% of chapters
Total Chapters	17 (Six sections)	23 (Seven sections)	16
Total Pages of Text	533	642	415

# Student Surveys

In analyzing the results of the student surveys, the sample was stratified along two dimensions of interest: by the public or private nature of the school system the student came from, and by the professional category the student claimed: either as a teacher, administrator or combined teacher/administrator. The second order concern in both



circumstances was whether or not the student had taken previous courses in methods, thus belonging to either a novice or experienced category.

Table 3 indicates the breakdowns for the public/private and professional category dimensions, as well as the novice/experienced category.

Table 3: Student Survey Sprofessional category and			school distinction,
	Number of	Novice in	Experienced in
	Students	Methods	Methods Courses
	(n=53)	Courses	
Public School	26 (49%)	31%	69%
Background			
Private School	27 (51%)	67%	33%
Background			
Teachers	25 (47%)	44%	56%
Administrators	10 (19%)	40%	60%
Teacher/Administrators	12 (23%)	67%	33%
Other Professionals	6 (11%)	50%	50%
Novice Students	26 (49%)		
Experienced Students	27 (51%)		

The sample broke down fairly evenly in terms of public/private school background and novice and experienced status with methods instruction. The highest percentage of students previously exposed to methods courses were groups with public school backgrounds (69%) or those who identified themselves as teachers or administrators (56% and 60% respectively.) The groups with the lowest exposure were teacher/administrators (33%) and those with private school backgrounds (33%).

The survey itself had four parts: 1) a brief section of demographic descriptors; 2) a Likert scale series on the usefulness of the various elements of the methods course, including class lectures and activities, readings, and assignments; 2) a check off list of methods from which the students were asked to indicate those that they had developed a preference for using; 3) a check off list of methods from which they were asked to indicate which they would like to learn more about; and 4) a question about whether or not they would like to take further courses in those methods with an open ended response opportunity.

The core questions to be answered from the surveys included the following: 1) Which of the five groups identified was the most resistant to being instructed in methods? This issue area was broken down into several sub-sets;

How did the groups break down in terms of developing preferences for methods?

How did the groups break down in terms of wanting to acquire more knowledge about methods?



- 2) Did elements that the instructor thought important to include in the course, such as exposure to academic publications and creating the capacity among students to become critical readers of research, seem useful to the students?
- 3) Did these future education leaders prefer the more practitioner-oriented methods presented? What were the most popular methods among those that had preferences?

Resistance to instruction, derived from questions dealing with methods preference and intentions to learn more, resulted in the following frequencies:

Table 4: Resistance to methods instruction by public/private school distinction,			
professional category and novice/experienced status			
	Developed	Want to learn	Interested in
	methodological	more about	taking more
	preferences?	methods?	methods
	Answered No	Answered No	courses?
			Answered No
Public School	58%	15%	46%
Background			
Private School	33%	33%	44%
Background			
Teachers	32%	32%	52%
Administrators	60%	20%	50%
Teacher/Administrators	50%	17%	58%
Other Professionals	66%	0	33%
Novice Students	54%	23%	54%
Experienced Students	37%	22%	48%

The majority of students in all categories want to learn more about methods, indicating general openness to learning, but the students' identification of a method of preference, which is a crude indicator of their degree of engagement with or focus on the domain of methodology, is quite a bit more varied. Teachers and private school background students in the sample are more strongly inclined to state their methodological preferences, as are experienced students. Graduate students from public schools, administrators, other professionals and novice students are more reluctant to indicate their preferences. There is also some uniformity concerning interest in taking additional courses. Except in the case of other professionals, about half of all respondents said that would not be interested in doing so. It is important to note about that result, however, that interest and opportunity to select another methods course might have been confounded in the survey. Written comments indicate that for many students there is a feeling that there is inadequate time or credit allowance for an additional methods course in their degree program structure. "I would if I could" seemed to be the message for a number of respondents. Given these results, in terms of public versus private, overall, private school students were more resistant to method instruction. Administrators, teacher/administrators and other professionals seemed to be more aware of their



methodological preferences, and more willing to take on additional instruction than teachers. Similarly, novice students were less engaged than experienced students, but both groups were similar in their interest and intent to learn more.

As mentioned, several assignments given to these cohorts were seen by the instructor as being crucial in terms of promoting knowledge about the sources of research and gaining capacity in critical reading. Did the students find those course elements to be valuable? Students were asked to use a 1-4 Likert scale to indicate whether or not particular course elements were of use to them. Table 5 indicates reactions to the publications exercise in which students were asked to inquire and select academic publications, and a journal critique exercise, which required students to produce an essay that critiqued the methodological choices and presentation in particular academic journal articles.

Table 5: Ratings of instructor emphases as useful by students by public/private school distinction, professional category and novice/experienced status (Scale 1-4: 4 highest; simple averages)

1 1, 1 mgnese, simple aver			
	Rating of	Rating of	Average Score
	Publications	Critical Reading	of Two
	Exercise	Capacity	Exercises
		Exercise	
Public School	3.15	3.08	3.12
Background			
Private School	1.77	2.93	2.35
Background			
Teachers	2.4	3.25	2.83
Administrators	1.45	3.15	2.30
Teacher/Administrators	2.83	2.84	2.84
Other Professionals	3.0	2.58	2.79
Novice Students	2.35	3.14	2.75
Experienced Students	2.58	2.95	2.77

The results indicate that students were generally much less enthusiastic than the instructor about the need to take on these assignments. The critical reading exercise was (with the exception of the miscellaneous professionals) considered to be more useful than the publications exercise by the students. Public school background students, teachers and administrators thought fairly highly of the critical reading assignment. Public school background students in general liked both assignments. Private school background students and administrators found the publications exercise to be less than useful. Both of these groups found the two exercises to be less helpful than their counterparts. Novice/experienced status did not seem to cause much variation in this set of comparisons.



Finally, checking the notion that practitioners will prefer to learn about practitioner-oriented methods such as action research yielded the following results:

Table 6: Practitioner Methods' popularity and most popular methods by			
public/private school distinction, professional category (% answered			
affirmatively)			
	Practitioner	Most Popular Methods Listed	
	Method		
	(Action		
	Research)		
	Popular?		
Public School	44%	Qualitative methods generally;	
Background		Action research; Historical methods	
Private School	35%	Qualitative methods generally;	
Background		Interrogative research; Survey	
		research	
Teachers	40%	Qualitative methods generally;	
		Ethnography; Interrogative research	
Administrators	10%	Qualitative methods generally;	
		Quantitative methods generally	
Teacher/Administrators	50%	Qualitative methods generally,	
		Action research; Content analysis	
Other Professionals	66%	Qualitative methods generally;	
		Action research; Interrogative	
		Research	

The respondents' relative lack of interest in practitioner-oriented methods is somewhat surprising. With the exception of the other professional category, 50% or less of all the students indicated a particular interest in Action Research. Action Research appeared as a top choice among public school background students, among teacher/administrators and other professionals, but was not a specified top choice for other student groups. However, the students overwhelmingly indicate general interest in using qualitative methods. Is this a function of these particular students' general preference for non-quantitative work and lack of comfort with statistically-based methods, or a reflection of the instructor's own proclivities and biases toward certain kinds of methods? Unfortunately, the data do not give us any straight answers, although I suspect that both played a role in these results.

## Conclusion

Making the case for the relevant, yet comprehensive coverage of research methods is tough in the face of resistance from the future education leaders. The findings of this paper focus the spotlight on several issues including:



- The challenges of scope and breadth in designing introductory methods courses;
- The fact that some popular textbooks do not confront the problem of relevance very well;
- The gap between faculty and student perceptions of key competences needed in research methodology;
- The benefits of potentially incorporating more case studies and hands on instructional experiences for graduate-level introductory methods course as a means of better engaging educational leaders.

In light of the challenges facing educational leaders and their use of education research, now more than ever, delivering well thought-out curriculum on research methodologies is an important goal for Schools of Education. This paper is only a first attempt at laying out the general issues and concerns surrounding an increasingly important and pertinent feature of graduate training in education. Hindered in generalizability by its use of data from only two programs at a single institution and a small but purposive sample of textbooks, this paper cannot identify best practices or identify the best resources available to instructors. To accomplish that goal, further research is called for that can incorporate comparisons of similar courses taught at a variety of Schools of Education, accompanied by faculty interviews and student surveys as well as a more comprehensive comparison of available textbooks.

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#### **Descriptors**

Research Utilization; Instructional Design/Development; Leadership; Teacher Educational Development

#### **Appendix: Student Survey**

This survey should take approximately 10 minutes to complete.



Part I.		
What is your gender?	Male	Female
What is your age?		
What professional category	y do you feel describe	s you best? (Please check one)
Teacher	Administrator	Other
How long have you been a years)?	teacher or administra	ator (please indicate number of
If you are a teacher, what s	subject do you teach?	
If you are a teacher, what o	grade level do you tea	nch?
If you are an administrator,	, what is your title?	
If you are an administrator,	, do you work at the b	uilding, district or county level?
Building	District	County
Please list your previous po	ostsecondary academ	nic degrees:
Degree	Field Ye	ear
Have you taken previous courses in research methods? Yes No		

Part II.



On a scale of 0 to 4, with 4 being the highest score possible, how **useful** did you find the following elements of the Introduction to Research Methods course in **support of your understanding of education research**? Circle the most appropriate score.

Journal exercise	0	1	2	3	4	
2. Library resources guest lecture	0	1	2	3	4	
3. Assigned readings	0	1	2	3	4	
4. Textbook	0	1	2	3	4	
5. Class handouts	0	1	2	3	4	
6. Class lectures	0	1	2	3	4	
7. Class discussions	0	1	2	3	4	
8. Group article critique	0	1	2	3	4	
9. Interview simulation exercise	0	1	2	3	4	
10. Research proposal exercise	0	1	2	3	4	
11. Individual article critique	0	1	2	3	4	
12. Other (please indicate)		0	1	2	3	4

#### Part III.

1. In light of the information you have been given in class about different qualitative and quantitative methods, have you developed a preference for using a particular class of methods or research techniques in your future work, either as a producer or consumer or research?

Yes \_\_\_\_ No \_\_\_\_

1.b If you answered yes, check all the responses that apply to you.

I have developed a preference for potentially using:



Qualitative methods in general
Ethnography
Ethnographic Methods
Historical Research
Interrogative Research (Interviews, Focus Groups)
Action Research
Content Analysis
Discourse Analysis
Quantitative methods in general
Experimental Research
Quasi-experimental Research
Associational Research (Correlational, Causal-Comparative)
Survey Research
2. Have you developed an interest in learning more about particular research methods and techniques? Yes No
2.b If you answered yes, which of the following would you like to learn more about? (Please check all that apply.)
Qualitative methods in general
Ethnography
Ethnographic Methods
Historical Research
Interrogative Research (Interviews, Focus Groups)
Action Research



Content Analysis				
Discourse Analysis				
Quantitative methods in general				
Experimental Research				
Quasi-experimental Research				
Associational Research (Correlational, Causal-Comparative)				
Survey Research				
Other (Please specify below)				
2.c If you answered yes, would you be interested in taking a course the focuses on the methodologies and/or techniques that you have listed?  Yes No	at			
2d. If you answered yes, can you comment below on what about thes methods and techniques are attractive to you as either a producer or consumer of research?	e			
•				

Thank you for your assistance!





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