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Why Action Research?

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Welcome! The launch of this new journal marks an important achievement for all of us who identify ourselves as action researchers. We hope that this journal will serve, not only as a forum for the presentation of important innovations in the theory and practice of action research, but as an open invitation to new scholars and activists. For the inaugural issue, we have prepared this article to serve two purposes. The first is to present some of the major issues and tensions currently under discussion by those of us committed to the practice of action research. You will see these questions repeatedly discussed, debated, and disagreed about in the pages of this journal. Our intention here is to begin to identify some of these issues and to acknowledge both areas of commonality and of controversy among action researchers.

Our second purpose is to introduce readers of *Action Research* to members of the editorial board. Action research is not an impersonal practice and we want you to know who we are, how we came to the practice of action research, and what we stand for, both individually, and as a community. This article is built on responses from members of the editorial board to the following query:

> We'd like your thoughts on the 'Why?' question. Why do you choose to do action research? What brought you to this practice? What keeps you involved? Do you have particular stories that illustrate why you practice action research? What issues, values, experiences, personal characteristics or other factors underlie your commitment to action research and shape your practice?

We (Mary, Davydd and Pat) have taken the responses to that query, including our own, and have identified some of the themes and concerns expressed by our colleagues, as well as some of the unspoken issues we feel need to be addressed if the practice of action research is to fulfill our hope for it to become a force for social change both within and beyond academic settings. We are grateful to all of those who were able to respond. We wish to acknowledge that, in attempting to create this brief overview, we have not done justice to the diversity of experience and the depth of insight reflected in the comments submitted to us by our colleagues. For this we apologize in advance and we hope that you, our readers, will be inspired, intrigued or irritated enough by what you find here to seek out additional works by these scholars.

Defining Action Research

Action research, as defined by Peter Reason and Hilary Bradbury, is:

> a participatory, democratic process concerned with developing practical knowing in the pursuit of worthwhile human purposes, grounded in a participatory worldview which we believe is emerging at this historical moment. It seeks to bring together action and reflection, theory and practice, in participation with others, in the pursuit of practical solutions to issues of pressing concern to people, and more generally the flourishing of individual persons and their communities. (2001, p. 1)

Action research has a complex history because it is not a single academic discipline but an approach to research that has emerged over time from a broad range of fields. There are strong elements of action research in the work of John Dewey, both in his philosophical work and in his studies and experiments in education. Action research perspectives can be found in the early labor-organizing traditions both in the US and Europe, in the Catholic Action movement and in liberation theology. Kurt Lewin brought an action research perspective to the US in the 1940s and succeeded for a time in making the notion of collaborative research with stakeholders with a liberating intent a central interest of a broad range of social scientists. The anthropologist, Sol Tax, founded what he called 'action anthropology' to promote both collaboration with local stakeholders and democratization processes. The Tavistock Institute for Human Relations supported action research efforts combining the work of British, Norwegians, and Australians on work in both the UK and Scandinavia. This work has spread to Sweden, Denmark and Germany. Myles Horton and his collaborators founded Highlander in Tennessee to promote social justice, civil rights, and democracy. Paulo Freire, Budd Hall, Marja-Liisa Swantz, Orlando Fals-Borda and others developed and promoted an action research approach to oppression and institutional change. Chris Argyris, Donald Schön, Reg Revans, William Torbert, Peter Reason and

John Heron promoted this kind of work in a wide variety of organizations, ranging from private sector companies to public authorities.

As disparate as these traditions are, what links them is the key question of how we go about generating knowledge that is both valid and vital to the wellbeing of individuals, communities, and for the promotion of larger-scale democratic social change. Action research challenges the claims of a positivistic view of knowledge which holds that in order to be credible, research must remain objective and value-free. Instead, we embrace the notion of knowledge as socially constructed and, recognizing that all research is embedded within a system of values and promotes some model of human interaction, we commit ourselves to a form of research which challenges unjust and undemocratic economic, social and political systems and practices.

Action research is a work in progress. As readers of this journal will discover, there are still many unanswered questions and many unresolved debates. We invite you to join us and the many action research practitioners throughout the world in shaping our practice, in defining our goals, in articulating the theoretical frameworks to support our work and in discovering ways in which our shared commitment to social justice can be realized.

The Journey to Action Research

The members of the editorial board reflect the diverse fields in which action research has begun to have an influence, among them organization development, anthropology, education, economics, psychology, sociology, and management. From the descriptions of the journey to action research we received from editorial board members, it appears that many of us have one thing in common – our profound dissatisfaction with where we were.[2] As Ortrun Zuber-Skerritt observed,

> I was alone, but deep inside I could not accept that majority views must be right, accepted or adhered to simply because of their majority status. I recognised that we should not leave a paradigm unchallenged simply because it is dominant. (Zuber-Skerritt and Farquhar, 2002, p. 103)

Acting from this sense of dissatisfaction, we began our search for a new research practice. But the road to action research was not clearly marked, especially for those of us who have pioneered the re-emergence of this approach. Reflecting on her entry into participatory action research over 35 years ago, Marja-Liisa Swantz recalls, 'I had no knowledge or training in action research and the participatory method I knew about was the anthropological participant observation. I found it untenable. I mingled in the affairs of the community in many and varied ways.' Similarly, Werner Fricke notes, 'I had been studying economics and sociology at several German universities. There

was never a word about action research at the university; it was unknown in German academia in the late sixties and seventies even more than it is today.' Bob Dick's experience, or a variation on the theme, is also familiar to many of us, 'my early training was as an experimental psychologist. I wasn't given even a hint of the existence of action research.'

Fortunately, tenacity is also something of a commonality. Bob goes on to recall that, 'some colleagues mentioned something called action research. Others tried to dissuade me from even looking at it. "Not much action, and not much research", was how one of them characterized it. That was reason enough to examine it for myself.' Shankar Sankaran describes a similar experience and acknowledges that following his first encounter with action research he 'came away very puzzled. Most of us were positivists brought up with a scientific background.' But further reading of action research brought him back to his childhood heroes, 'Gandhi and Nehru, whose democratic principles I admired a lot.' Shankar recalls how, 'reading Lewin's papers and hearing about some of the AR stories kindled the free spirit that I had when I was younger although I was much poorer. I started feeling more comfortable about action research.'

The struggle for congruency between our theories and practices is another commonality among action researchers. Bill Torbert says it clearly – our practice 'aims toward greater congruity between the values one espouses and the values one enacts'. Pat Maguire recalls how that very struggle in the early 1980s brought her and others at the Center for International Education to participatory action research. 'We realized that our approaches to research and evaluation were incongruent with the values of the empowering, non-formal education we espoused in our work outside the academy.' After changing from being a laboratory-based experimental psychologist to an educator, Bob Dick also felt the tension of incongruity, 'The research methods I knew well didn't fit my new situation. Either I found something else or I abandoned research altogether.'

In describing their journeys to action research members of the editorial board cite a variety of influences, including Kurt Lewin, Paulo Freire, Thomas Pettigrew, Chris Argyris, Gregory Bateson and John Dewey. But as important as these fellow scholars have been, it is also clear that for many of us early political activity, community development efforts and the inspiration of the people we've met through these experiences have been the real impetus behind our dedication to this work. Werner Fricke, for example, describes taking part in an investigation of Nazi-era judges in post-war West Germany; Victor Friedman recalls his work as a young scholar in the Jewish community on an island off the coast of Tunisia; Olav Eikeland relates his experience in a progressive high school; and L. David Brown writes of his time as a Peace Corps volunteer in Ethiopia. These experiences were pivotal in their development as action researchers. Through such experiences many of us reached the same conclusion as Robin McTaggart. 'What really is the purpose of social

research? The answer to this question to me now is quite straightforward: the improvement of social practice.'

L. David Brown's description of the journey captures what many of us seem to feel.

> I believe that many events in my work and life have been a matter of luck or accident. But I am also aware of several occasions on which I explicitly made choices to step off the obvious path, and do something that others thought odd or worse.... I have come to think of these events as 'detours' from the obvious career paths stretching before me. Frequently these detours have become the main road for me. There are obvious costs to such detours. Other choices might have made me richer, more influential, more famous, more productive, and so on. But I like what I am doing, even though the path has involved a lot of wandering through uncharted territory.

A Shared Commitment to Democratic Social Change

Action research rejects the notion of an objective, value-free approach to knowledge generation in favor of an explicitly political, socially engaged, and democratic practice. John Shotter states it quite succinctly, 'research into our ways of life cannot be conducted in the same, value-free way as in the natural sciences.'

David Coghlan, describing the impact of Kurt Lewin's work on his practice, describes a basic tenet of action research, 'the powerful notion that human systems could only be understood and changed if one involved the members of the system in the inquiry process itself'.

A key value shared by action researchers, then, is this abiding respect for people's knowledge and for their ability to understand and address the issues confronting them and their communities. Ernie Stringer reflects this position when he suggests that our task should be to:

> provide people with the support and resources to do things in ways that will fit their own cultural context and their own lifestyles. The people, we knew, not the experts, should be the ones to determine the nature and operation of the things that affected their lives.

As Elizabeth Kasl suggests in writing with Lyle Yorks, it is by working in collaboration with others that we are able to achieve the most. They describe how in their own community-based work, the participants 'grew to appreciate how their interrelatedness created a power greater than a sum of individual powers' (2002, p. 16).

Working collaboratively with others leads not only to community and organizational changes, but also to personal changes in the action researcher. As action researchers reflect on their experiences, they acknowledge being

profoundly changed by those experiences. Marja-Liisa Swantz recalls a project with 50 students at the University of Dar Es Salaam that engaged student-researchers directly with village youth and women cleaners.

> In each case the researchers became involved in the problems of the people concerned over a period of time. The research changed the attitudes of the students radically and made the research mode a thorough educational process for the villagers, students, and myself as a scholar.

Similarly, Elizabeth Kasl wrote, 'From my experience as a participatory research methods teacher and dissertation chair, I have second hand experience of witnessing the transformative power of participatory processes as launched by students in course practicum projects and dissertation work.'

Action research, according to Werner Fricke, is:

> empathy and listening while meeting the other, it is a commitment to basic values like human creativity and democratic participation, it is based on the perception of social reality as a continuing process with individuals being subjects of their history and the social contexts they are dependent on.

He goes on to insist, we 'cannot (and must not) avoid values and personal commitment'.

These values require action. Knowledge comes from doing. Action researchers feel compelled to act collectively on and with that knowledge. Hilary Bradbury urges, 'Action research must draw power from the premises of pragmatism, that belief that we can know through doing.' She continues, 'I realize I am particularly comfortable with knowing through doing, as much, if not more so, than knowing through conceptualization.' Robin McTaggart reflects this commitment to action in describing the difference between action research and other forms of inquiry, 'the crucial difference lies in the commitment of action researchers to bring about change as part of the research act. Fundamental to action research is the idea that the social world can only be understood by trying to change it.' Pat Maguire wrote, 'I stay involved with action research because all the theorizing in the world, feminist or otherwise, is of little use without the doing. And action researchers are doers.'

A respect for people and for the knowledge and experience they bring to the research process, a belief in the ability of democratic processes to achieve positive social change, and a commitment to action, these are the basic values which underlie our common practice as action researchers. Ian Hughes sums up how many of us seem to feel:

> I choose action research because I have a long standing commitment to developing more effective strategies and methods to promote social justice.... I choose action research because I believe in old fashioned virtues like compassion and truth. I know this sounds corny, but it is real.

The Integration of Theory and Practice

Many of us cite Kurt Lewin, who once observed, 'there is nothing so practical as a good theory' (1951, p. 169), as a major influence on our work. But action research goes beyond the notion that theory can inform practice, to a recognition that theory can and should be generated through practice, and, as the earlier discussion of values would suggest, that theory is really only useful insofar as it is put in the service of a practice focused on achieving positive social change.

Werner Fricke recalls that his 'entrance was research praxis, not theory'. We think many action researchers would have to admit that they came to theory largely as a way of justifying what they knew was correct to begin with; to legitimize a politically informed and effective form of knowledge generated through experience. We were able to justify our work as academics through reference to theoretical frameworks challenging the dominant positivistic worldview of the social sciences. Critical theory in particular made much of our work possible and we draw upon many of the more recent theoretical frameworks to provide new perspectives on our work. As Ortrun Zuber-Skerritt notes, theory provided the insights needed for 'effective intellectual argument'.

But having embraced critical theory, or feminism, or pragmatism, we began to discover the ability of theory to frame issues of power and identity; to suggest strategies for action and explanations for outcomes which had earlier left us puzzled; to provide structures within which our work could be better understood and our practice improved. Theory provided a grounding for our attempts to take the next step. L. David Brown describes his experience of trying to bring together community activists and business leaders. After his first efforts ended in a weary stalemate, Brown reconceptualized the process in terms of intergroup tensions and power differences. The success of this second project 'confirmed that both practice and theory could benefit from combining action and research'.

Wrestling with this connection between theory and practice can provide an intellectual challenge as well. Ernie Stringer notes that action research,

> provides the impetus for me to continue to explore the academic and intellectual roots of this tradition, enabling me to seek affirmation for my work in the postmodern, feminist and critical theories that are, for me, the most significant discourse in the academic world I inhabit.

In some cases, theory has led not only to a critique of conventional research practices, but to a much needed re-examination of our own practice. As Pat Maguire recalls:

> the juxtaposition of everyday activism in the women's movement with theorizing action research led me to feminist critiques of traditional social

science research as well as feminist critiques of international development assistance. It didn't take long to superimpose feminist critiques on participatory action research.

There is much work left to be done in adequately articulating strong theoretical foundations for our work as action researchers. Olav Eikeland notes, 'I think most action research doesn't understand itself in adequate ways, which often, but not always, means that action researchers have better practices than theoretical self-understandings.'

There is also work to be done in articulating inclusive theoretical foundations that build more extensively on indigenous knowledge systems (see for example Hermes, 1999; Smith, 1999), feminist theories (Brydon-Miller, Maguire & McIntyre, in press; Morawski, 2001), postcolonial (Bhabha, 1994; McClintock, Mufti & Shohat, 1997) or critical race theories (Crenshaw, Gotanda, Peller & Thomas, 1995; Delgado & Stefancic, 2000; Parker, Deyhle & Villenas, 1999). It is our hope that this journal may provide a forum for such conversations regarding theory, and in doing so, might help to advance both the theory and practice of action research.

Relationships for Learning and Action

Some contributors indicated that during their professional training at university, they never heard of action research. Or, as Bob Dick's earlier comment demonstrates, if they did hear of action research, they were discouraged from exploring it. Others note that they were discouraged as scholars-in-training from combining research and action. Mary Brydon-Miller wrote, 'There are those who say that direct action is not, nor should be, the responsibility of social scientists.' She continues, 'one graduate school advisor told me, "You can't mix your politics and your psychology."' To which she responded, 'If I have to choose one, I'll choose my politics.' Fortunately, action research provided a way to preserve both while losing the advisor.

Still others note that their university-based doctoral training proved inadequate for the questions they grappled with and the challenges they faced in the field. Through his PhD studies, Ernie Stringer 'sought to understand how teachers and school systems could provide appropriate and successful educational experiences for Aboriginal children'. He continues, 'By the early eighties, I came to realize that all my expertise, the now diverse array of quantitative and qualitative research tools I now had at my disposal, would fail to provide what I was seeking.'

Despite the absence of action research from university curricula or faculty discouragement, many of the editorial board contributors did indeed learn about action research through other university faculty or students, as well as through readings, and classes. It was during McTaggart's move from a teachers

college to a university setting, Deakin, that he was introduced to action through work with Stephen Kemmis. In graduate school, Hilary Bradbury was introduced to action research concepts by Bill Torbert, while Mary Brydon-Miller was 'rescued from a life of positivism' by Peter Park. Despite Shankar Sankaran's 'puzzlement' after his initial introduction to action research in his PhD program, he went on to complete an action research doctorate supervised by Bob Dick and Alan Davies. Shankar recalls, 'My emancipatory spirit had been awakened and I started feeling restless after I finished my doctorate. My world had been changed and I was looking at it from different eyes.'

Indeed one of the themes that emerged from these contributions is how critical it is for us to create and sustain spaces in universities and training institutes through which we support, nurture, and challenge action researchers. Through collegial persistence over the years, many of the members of the editorial board have contributed energetically to the development of university-based action research programs or networks. These include such action research programs or networks as: Deakin University School of Education; University of Bath Centre for Action Research in Professional Practice; the Cornell Participatory Action Research Network; Participatory Research in Asia; Southern Cross Institute of Action Research; Case Western Reserve Department of Organizational Behavior; the Leadership for Change executive program at Boston College (which brings together faculty from the Lynch School of Education, the Carroll School of Management, and the Sociology Department); Boston University School of Management; Griffith University; the University of Sydney; and research groups such as Action Learning, Action Research and Process Management (ALARPM); the UK-based Collaborative Action Research Network (CARN); the New Zealand Action Research Network (NZARN); and the newly formed US-based Community-based Research Network.

Our stories indicate that the mentoring and collegial sharing that many of us have enjoyed with others has been crucial to our development as action researchers and as human beings passionately concerned with injustices and inequities. To paraphrase Elizabeth Kasl and Lyle York, we have developed and learned 'in relationship'. Many of us came to action research through our work with indigenous people – Australian Aboriginals, American Indians, African villagers – or those marginalized in more industrialized nations, such as the elderly, people with disabilities and factory workers. Yet our voices as editorial board members are disproportionately white, male and from industrialized nations. In her response to the query which launched this article, Mary Brydon-Miller quoted Wildman and Davis, '... to end subordination, one must first recognize privilege' (1996, p. 20).

Essentially, we editorial board members are a privileged group, functioning in a gate-keeping capacity both as editors and in our university and institutional affiliations. But our commitment to action research requires us, collectively and individually, to reach and push beyond our comfort zones to

truly diversify the editorial board, in each volume of this journal, in our institutions, and in our networks, formal and informal. We hope to turn the conventional gate-keeping function into a door-opening function and to do so in a collaborative spirit with those who are disseminating action research through other journals and book series.[3] While we started out this article with an invitation and hope that new action researchers would 'join us', it can certainly be intimidating to try to join an ongoing network of academics and practitioners who have enjoyed various relationships with each other over the years. Our challenge is to reach out.

Similarly, our challenge is to diversify the knowledge base of the field that gets shared with newcomers. Editorial board member Yoland Wadsworth, current President of ALARPM, recently came across an article that gave an overview of action research. Skipping down to the reference list, which serves to codify the legitimate knowledge of action research, she was appalled to find the work of so few women action researchers. Yoland noted, 'the life work of feminist and women action researchers is being disappeared before our eyes' (personal communication). While many contributors to this article noted the influence of pioneering 'fellow' action researchers, we have a collective responsibility to introduce the next generation of action researchers, indeed ourselves, to the work of the action researchers such as Alice McInytre, Ella Bell, M. Brinton Lykes, Yoland Wadsworth, Judi Marshall, Michele Fine, Patti Lather, Ortrun Zuber-Skerrit, Jean King, Penny Barnett, Jan Barnsley and Diana Ellis, Francesca Cancian, Irene Guijt and Meera Kaul Shah, Korrie De Koning and Marion Martin, Renu Khanna, Susan Noffke and Marie Brennan, Britt-Marie Berge and Hildur Ve, Sandra Hollingsworth, Patricia Hill Collins, Colleen Reid, Marie Mies, and Marja-Liisa Swantz, who is credited with coining the term 'participatory research'. There are so many others.

Action Researchers as Educators

In our roles as academics or facilitators, many of us have found that the road to action research also required changes in our teaching practices. Ernie Stringer notes,

> Enacting participatory approaches requires me to take quite a different stance to my work. I now realize the necessity to thoughtfully engage in practices that involve changes in relationship, positioning, authority, and knowledge production practices. As a teacher, researcher or professional practitioner, I am a changed person.

Many contributors wrote of the various ways that they incorporate democratic, participatory, and experiential methods into their university action research classes, cognizant of the need for congruency in teaching about action research through active, reflective, and relational practices (David Coghlan,

Elizabeth Kasl and Lyle Yorks, Bill Torbert and Dawn Chandler, Marja-Liisa Swantz, Davydd Greenwood). Bob Dick writes about the dialectical relationship between teaching about action research and engaging in action research on our teaching practices. 'When I began to build regular monitoring and reflection into my university classes, they began to improve noticeably.... As my educational skills improved, so did my action research. As my action research was refined, so were my educational skills.'

It's a good thing that tenacity seems to be a shared trait among action researchers. While action research is enjoying a period of expanded legitimacy, we have to be tenacious in advancing the practices. Although Marja-Liisa Swantz wrote about a Tanzanian project which took place many years ago, the dynamics are similar to those faced in using participatory processes in development contexts today. 'Ministries and the district offices were not ready to make use of the benefits of the study. It became clear to me that there must be institutional preparedness to act on the basis of the results gained at the community level.' She continues, 'I am perplexed that after all the work done with PAR and the evident successes in using it, the main-line social scientists still largely ignore it.'

Werner Fricke, in writing of the isolation experienced trying to advance action research in the German trade unions observes,

> We all know the great difficulties action researchers face to bridge the two worlds of theory and praxis, but if they try to avoid these difficulties, they will be reduced to either consultants or academic scientists. In both roles they are missing the social function of action research: to enhance democratic participation and to create public spaces in [the] economy.

The World of Heretics

We all can, and must, do our part to contribute to the goal of achieving greater social justice and each of us brings a unique set of experiences and talents to the task. But even given the diversity of disciplines, locations, and perspectives, there do seem to be certain characteristics common to many of us currently engaged in this practice. For one thing, we're basically a hybrid of scholar/activist in which neither role takes precedence. Our academic work takes place within and is made possible by our political commitments and we draw on our experience as community activists and organizers to inform our scholarship.

In general, we don't do well with boundaries, witness the interdisciplinary nature of our editorial board and the broad range of influences cited by contributors. In addition, as the story of our journeys to action research suggests, on the whole those of us who define ourselves as action researchers are not the world's greatest rule-followers. As Robin McTaggart puts it, 'Welcome to the world of the heretics!'

On the other hand, we do tend to be practical and concerned with achieving real outcomes with real people. Hilary Bradbury speaks for many of us when she notes, 'it's more satisfying for me to help create desired change, rather than merely observe life go by.' L. David Brown suggests how we bridge these two inclinations, 'I learned to be a maverick early, but I like to be a maverick with influence.'

It helps to be patient. Building trust in communities that have every reason to be wary of outsiders and especially of academic outsiders doing research is a long-term project. Jim Kelly describes the 10 years he and his students dedicated to working with African-American community leaders in Chicago on the Developing Communities Project (Kelly, Azelton, Lardon, Mock & Tandon, in press), but the impact of the project on the community and the richness of the insights generated in their work together are testament to the value of such patience.

We also tend to be optimistic. We believe in the possibility of change, 'surprising changes ... changes that happen unexpectedly, changes that strike us with amazement and wonder', as John Shotter describes it. And we continue to believe in the potential for change, often despite years of fighting battles within our institutions and communities that might deter a less determined soul. We take joy in what we do (mostly) and we even tend to like one another! Ian Hughes observed, 'action researchers are a friendly and supportive community,' and Hilary Bradbury concurs, noting, 'all of my best friends are action researchers.'

The Beauty of Chaos

It also helps to be able to handle a certain degree of chaos, uncertainty and messiness. As Victor Friedman put it, it helps to have 'a preference for learning from experience and especially from engaging uncertainty/complexity'. You have to be willing to be wrong, to trust that other people know their own lives and their own interests better than you do. This comes hard to those of us who have been trained to believe that we are smarter than everyone else.

Russell Ackoff's (1999) term 'messes' sums up one of the ways a great many action researchers differ from their conventional social science colleagues. Messes are complex, multi-dimensional, intractable, dynamic problems that can only be partially addressed and partially resolved. Yet most action researchers have disciplined themselves to believe that messes can be attractive and even exciting. We try not to avoid messy situations despite knowing that we do not have the 'magic bullet' because we believe that, together with legitimate community stakeholders, we can do something to improve the situation.

Just how action researchers come to have this way of living in the world is not at all clear. Nearly all of us have conventional disciplinary training built on a Fordist division of intellectual labor, hermetic professional hierarchies and

disciplinary peer control systems of ranking and reward. No way of organizing intellectual life could be more antithetical to engagement with messes because messes require the recognition of the limitations and weaknesses of single discipline knowledge systems and methods and engage us in collaboration, not only with other disciplines, but with non-academic partners.

Some of this emerges directly from ethical and political commitments. As convenient as Fordism is, it makes it impossible to address any significant social issue. Those action researchers committed to social change necessarily have to deal with messes; we are forced to follow the problems wherever they take us, and the best among us learn the theories, methods, and processes we need along the way. Whatever our uncertainties, we seem to tolerate them because we are committed to changing the world in some positive way.

Another element of this is a kind of fundamental sociability that shines through in all the contributions from the editorial board members. Many action researchers find joy in being with others, in working passionately in groups, in brainstorming, in struggling together. Through experience, we have learned that it is not reasonable to try to be alone in our work. Again, the contrast with the isolated disciplinary scholastic hero with 20 books, hundreds of articles and a solitary life is sharp.

There is a clear legacy of pragmatism and feminism that helps explain our penchant for messes. As a group, we seem unable to resist 'embodied' intellectual practice. We never leave our corporeality; we are engaged in ongoing cycles of reflection and action in which our bodies and ourselves and those of our collaborators are not only present to us but essential to the very process of understanding messes. Pain, joy, fear, bravery, love, rage – all are present in our action research lives.

There may also be a kind of 'aesthetic' at work in action research that welcomes complexity, uncertainty, and struggle as energizing and filled with possibility. We seem to tolerate paradoxes and puzzles and to survive them through a sense of their beauty and some kind of sense of humor as well. When non-action research colleagues greet us with fear and hostility, we probably should attribute some of this defensive reaction to their sense that we have a worldview that is too dynamic, too unstable, and too chaotic to be acceptable.

Of course, our community has its share of less dynamic participants. Personal uncertainties, weaknesses in research training, poor writing skills and other defects are also with us and we need to work hard as networks to improve both the quality of action research and the ongoing training of those with a will to improve their own practices.

Facing the Challenges of Change

Robin McTaggart's answer to his question, 'What really is the purpose of social research?' was 'the improvement of a social practice'. As action researchers,

what are some of the challenges we face in improving our action research practices, individually and collectively?

Perhaps one of the first challenges is tackling and changing or improving the places within which many of us practice. Many action researchers do not have university affiliations. Indeed a few would actively reject them. But on the whole, most editorial board members are affiliated with universities and research institutes. There can be no question that universities are a key institution for teaching about, conducting, and publishing action research. The editorial board's personal stories are almost always of personal transformation into action researchers after a long period of unsatisfying university training or work. This path does not recommend itself as a way of promoting action research. We cannot be content to permit universities to continue to train most social scientists out of their values and social engagements and then try to convert them later into action researchers. To paraphrase Jill Morawski's challenge to feminist scientists, our task is to continue to 'modify the near environment' (2001, p. 68) in which we conduct our action research, learn, teach, and evaluate our efforts.

We cannot do this from a position of arrogance and, unfortunately, in response to the arrogance of the disengaged positivists, against whom we routinely rail, we often place ourselves on a moral high ground that blocks genuine and direct dialogue with the very colleagues we should be challenging.

Given this, our collective near silence on universities as institutions and why action research has a hard time prospering in them is concerning.[4] We should take up the challenge to develop and articulate an analysis of the dynamics that make universities as institutions behave as they do. Only then can we develop practical strategies and mechanisms for transforming universities into real learning institutions at the service of the communities in which they are situated.

This means adopting conscious pedagogies of action research and furthering the crisis into which the conventional social sciences have fallen. At present, abstract economics, sociology, political science, psychology, and anthropology are largely socially disengaged and self-referential. While they are being supplanted by management studies, organizational behavior, human resource management, program evaluation, and so on – all fields with more regular extra-university social contacts – this is not leading to the re-emergence of action research. Rather, the 'new' social sciences are being looked at by university administrations as entrepreneurial centers of research revenue generation and the 'old' social sciences are losing ground to them. At the end of the day, the corporate entrepreneurial university of the 21st century will certainly be more socially connected but its connection is likely to be mainly through competition in the neo-liberal global market. Action research, with its multi-college, multi-disciplinary, critical view, may be the last source of resistance to this process and the source of a renewed university–society relationship. But this will only happen if we take on the universities as they are.

It is one thing to be a 'heretic' and another thing to accept this as a desirable status for action research.

Davydd vividly remembers our late friend and colleague, Donald Schön, at the end of a wonderful workshop day in which all had outdone themselves being smart and collaborative, saying, 'If we are so smart, why did action research die in universities?' He went on to say that he did not want to be right and defeated again.

To live up to Don's challenge, however, requires an effort that most action researchers in a position to do so are not yet making – beyond the paradigm clarifications, the critiques of positivism, the ethical exhortations – an effort to understand and change the conditions that continue to produce undemocratic and disengaged social research and increasingly neo-liberal universities and institutions.[5]

It is not enough to be right and comfortably better than others; if we really believe what we say about action research, then we have to bend our efforts to the comprehensive reform of universities because they are institutions with so much power and so many resources that ignoring them means that we are likely to live out Don's fear of being right and defeated again.

While action researchers situated within university settings may be having a rough time getting our message about action research heard in university forums, we do seem to have had a modicum of success impacting international development assistance or donor agencies and NGOs (Gaventa & Cornwall, 2001; Guijt & Shah, 1998; Wilson & Whitmore, 2000). Many editorial board members have been working for years bringing participatory action research, evaluation, and learning approaches to international development work. Indeed, there are close relationships between our work through universities and development agencies and NGOs at the international, national, and local levels. University faculty and personnel have provided leadership and expertise in project partnerships with international and community development agencies to address capacity-building for sustainable development and poverty reduction. From the World Bank to United Nations agencies to a range of NGOs, increasingly, 'participation' has become a required component of evaluation, assessment, appraisals, training, and research projects. This causes us both celebration and serious caution. On the one hand, action research is being legitimized as a useful strategic tool to include community people in addressing the critical issues of their lives. Participatory approaches to research, evaluation, appraisal, and training are being promoted as part of a complex counter to the 'dismal failure of the past several decades of world "development" efforts in improving the conditions of the poor' (Wilson & Whitmore, 2000, p.104). On the other hand, as these participatory processes have been scaled up and integrated into development policy initiatives at many levels, action researchers are called to resist co-optation and reinforcement of existing power relations (Gaventa & Cornwall, 2001). Just as the corporate university's social connection is mainly

through competition in the neo-liberal global market, development practitioners who promote action research must continue to promote dialogue on how best to mount a meaningful challenge to the neo-liberal global development enterprise. Who actually participates and for whose purposes? Whose practices are targeted for improvement? How are inequitable power relations actually unsettled and rearranged?

While promoting participatory and action-oriented processes in the field, many development agencies remain hierarchical, rigid institutions with little sense of how to operate democratically and inclusively. Hence the challenges of 'scaling up' participatory, action-oriented processes for social justice and meaningful change are similar whether we work in and through universities or development agencies. Although we seem to have had more success promoting participatory processes and action research in development assistance agencies, there is still extensive work to do to help create attitudes, skills, and processes that truly challenge and unsettle deeply entrenched power relationships and interests that resist meaningful democratization. The need to intervene and 'modify the near environment' of development agencies and NGOs is surely as acute as in the universities. To paraphrase Geoff Mead (2002), these institutions have been good at 'activating their immune responses' to the values and practices of action research. The potential contributions of action research to social change are limited if we are a marginal force within universities, yet the challenges of scaling up, a measure of the acceptance of action research in the development arena, are equally daunting.

One of the weaknesses of action research is its localism and the difficulty we find in intervening in large-scale social change efforts. The bulk of action research takes place on a case by case basis, often doing great good in a local situation but then failing to extend beyond that local context. For quite some time, practitioners like Björn Gustavsen, Werner Fricke, and Morten Levin have been struggling with the construction of broader, societal-level action research initiatives where the local interventions are part of larger-scale networks and social change strategies. Absent such broader social change strategies and commitments, action research is likely to win local skirmishes but not the bigger social battles that face us all. How should action research address problems such as war and peace, environmental degradation, and a world increasingly hostile to the poor and powerless?

But action research is not merely about 'doing good', it is also about doing things well. One of the tenets of action research is that research that is conducted without a collaborative relationship with the relevant stakeholders is likely to be incompetent. The respect action researchers have for the complexity of local situations and for the knowledge people gain in the processes of everyday life makes it impossible for us to ignore what the 'people' think and want.

From this initial respect, based on both democratic and empirical principles, action research moves on to the affirmation that action research is much

more able to produce 'valid' results than ordinary or conventional social science. This is because expert research knowledge and local knowledges are combined and because the interpretation of the results and the design of actions based on those results involve those best positioned to understand the processes: the local stakeholders. Further, action research meets criteria of validity testing more effectively than do most other forms of social research. Action research projects test knowledge in action and those who do the testing are the interested parties for whom a base result is a personal problem. Action research meets the test of action, something generally not true of other forms of social research.

Conventional researchers worry about objectivity, distance, and controls. Action researchers worry about relevance, social change, and validity tested in action by the most at-risk stakeholders.

Many of the editorial board members appear confident that action research has somehow survived and is more prominent now than it has been for a generation or two. The inaugural issue of this journal supports that contention. We must however initiate more inquiry to explain why this new prominence has happened and what can be done to sustain and expand it with integrity. With increased legitimacy comes the challenge to maintain connections to our radical roots. Our hope is that as readers and contributors to this journal, you will keep our feet to that fire.

Notes

1. We would like to thank the following members of the editorial board for their contributions: Hilary Bradbury, L. David Brown, David Coghlan, Bob Dick, Olav Eikeland, Werner Fricke, Victor Friedman, Ian Hughes, Elizabeth Kasl, James Kelly, James Ludema, Robin McTaggart, Peter Reason, John Shotter, Ernie Stringer, Shankar Sankaran, Marja-Liisa Swantz, Bill Torbert, and Ortrun Zuber-Skerritt. We would also like to thank Mary's students Cassandra Bolden, Beverly Eby, and Steve Kroeger for their helpful comments on an earlier draft of this article. Unless otherwise noted, quotations are drawn from unpublished responses to our query. Copies of the original contribution on which this article is based can be viewed at: http://www.scu.edu.au/schools/gcm/ar/whyar/html

2. We wish to thank Mary's colleague Lanthan Camblin for this insight. As he observed, 'Wherever they are isn't giving them what they want.' Quite right!

3. Among the action research publication and dissemination networks with which we hope to collaborate are the journals *Concepts and Transformation, Systemic Practice and Action Research, Convergence, Action Research International, Human Relations* and the book series, *Dialogues on Work and Innovation*. We expect our efforts to be collaborative in the worldwide promotion of action research.

4. A recent volume that addresses this issue very directly is Francine Sherman and William Torbert's *Transforming social inquiry, transforming social action: New paradigms for crossing the theory/practice divide in universities and communities* (2000).

5. Davydd has written a very critical review of the failings of action research recently, which is published in *Concepts and Transformation* (Greenwood, 2002).

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2

Mapping the Field of Practitioner Research, Inquiry and Professional Learning in Educational Contexts: A Review

Anne Campbell and Olwen McNamara

Introduction

The stimulus for this chapter came from the authors' discussion of the plethora of terms used to describe practitioner research and inquiry and related professional learning in educational contexts. The abundance and variation in terminology presented a complex and messy picture. We began by listing all the terms we had encountered in our reading and discussions. We sought to clarify our ideas through mapping the area, not to 'tidy' it up but to get an analytical purchase on the field; what it might mean for practitioners to be researching their own practice, how this relates to activities like inquiry, reflective practice, professional learning and how they are accounted for in the educational research literature. We thought we might develop a typology but, in the event, for the purposes of this chapter, we attempted first to organise our list of terms under three headings: practitioner research; practitioner inquiry; and professional learning: see Figure 1.

Practitioner research
- Action research
- Collaborative/participatory action research
- Critical action research
- Teacher research
- Research lesson study
- Action research
- Participatory research
- Pedagogical research
- Curriculum research
- Evaluation research

Practitioner inquiry/enquiry
- Evidence based practice
- Self study
- Teacher inquiry
- Action inquiry
- Narrative inquiry
- Padagogical inquiry
- Inquiry as stance
- Inquiry for social justice
- Social inquiry

Professional learning
- Inquiry based professional learning
- Action learning
- Evidence-based learning
- Evidence informed teaching and learning
- Reflective practice
- Coaching
- Mentoring
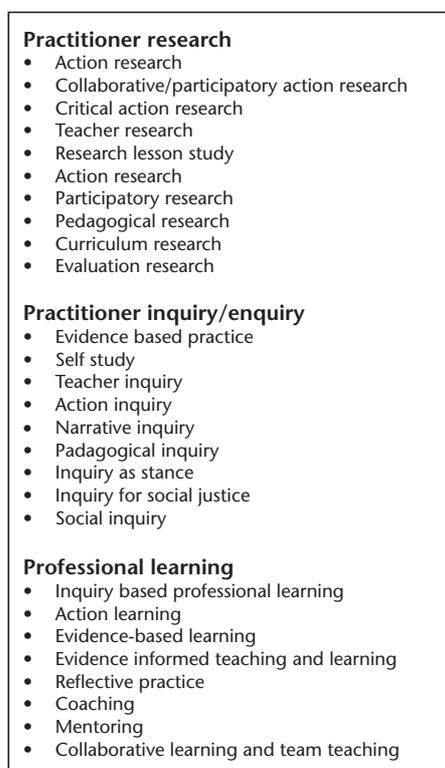- Collaborative learning and team teaching

Figure 1: Terms used in research enquiry and professional learning

This did not, however, result in the elucidation to which we aspired; there were too many overlaps and cross-cultural differences in usage. For example, it could be argued that reflective practice was the basis of some approaches of action research and that self evaluation shared many of its features, yet neither we deemed research. Campbell and Groundwater-Smith (2007: 4) applaud the difference in language and 'hope it enriches the reading process and reminds us of the need for understanding each other's cultures and contexts in a global research community.'

We then thought of conducting a literature review but that was clearly too weighty an undertaking for one chapter and the time we had available. So we decided to inspect the three umbrella terms we had identified and attempt to start developing some principles for inclusion in order to define the parameters of the sub groups. This too proved challenging so we settled on a Venn diagram in which we hoped we might locate some of the key components to instigate a discussion of the complexities of the field. We also hoped it might serve as a tool to reflect upon and unpick the terminology and associated discourses surrounding practitioner research, inquiry and professional learning.

In the process of our deliberations, a number of common themes began to emerge, and these posed questions through which we hoped to develop our thinking and around which we will organise this chapter. These questions, for example, might be about ownership and autonomy, and about the relationships between academic partners and practitioners. First, however, we need to situate our domain: practice-based research.

What is the Field of Practice-based Research?

Practice-based research in the education field, we would argue, covers all research about and into practice, whether by practitioners or researchers. This would include research into contexts, pedagogy, curriculum and professional learning (Figure 2). We would also argue that much educational research is qualitative and applied, and has much engagement with, and relevance to, its participants, whether university or school teachers. Educational research also crosses the boundaries of theory and practice where it creates praxis, the synthesis of theory and practice. It is values driven with an emphasis upon doing what is regarded as equitable and honourable. Values and ethics should underpin research whether 'pure' or 'applied' and in educational research, knowledge creation is based on the inquirers' norms, values and interests. These should be articulated so that subjectivities are made conscious and shared. Furthermore, Gibbons *et al.* (1994) offer notions of mode 2 knowledge that emphasise reflexivity, and inquiry-contextualised results.
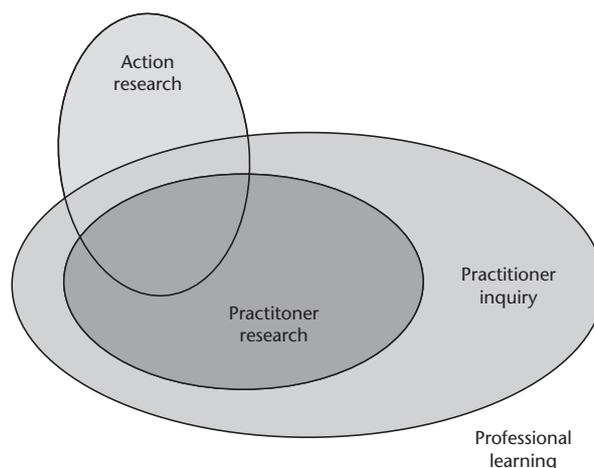

Figure 2: Some key components in the field of professional learning

Furlong and Oancea (2005: 1) suggested practice-based research was 'an area situated between academia-led theoretical pursuits – such as historical research – and research-informed practice and consisting of a multitude of models of research explicitly conducted in, with and/or for practice.'

This huge field serves as a boundary within which to locate our knowledge and understanding of research. We attempt now to explore some characteristics of our three fields, not in order to develop a typology or hierarchy, because in practice these umbrella terms and the particular activities we have included within them are, and will continue to be, used variously/differentially in the literature in different cultures and settings. Instead, we hope to unpick the principles upon which we can begin to make distinctions between them to illuminate the discussion with some illustrations from a collaborative practitioner research project with which we have been involved.

What is Practitioner Research?

Practitioner research, located in the larger field of practice-based and applied research, is distinguished by its focus on research done by practitioners themselves, usually an investigation of practice with a view to evaluation or improvement. Practitioner research is often an umbrella term for many practice-based research activities undertaken by practitioners in the fields of education and social and health care.

This chapter focuses on teachers as practitioners, although much will be applicable to other professional groups, especially health and social care. We draw upon some of the literature from those fields to support ideas and aid clarification of terms. We turn to Stenhouse (1975), Elliott (1985, 1991), Cochran-Smith and Lytle (1993, 2007) and Zeichner and Noffke (2001) and their work which promoted curriculum reform and teachers as researchers of the curriculum and the practice of teaching. They foreground:

- teachers' work and teachers themselves as a basis for research;
- critical reflection and systematic study of practice;
- practitioner control and ownership of research.

Many of us in the field take these as key reference points for teacher research.

More recently, authors such as Dadds and Hart (2001), Campbell and Jacques (2003), Bartlett and Burton (2006) and McLaughlin *et al.* (2006) have described, discussed and evidenced a variety of initiatives where practitioners have undertaken research. Saunders (2004) was guest editor of a double edition of *Teacher Development*, which evidenced teachers'

engagement with and in research and celebrated their success in a peer reviewed journal. These authors drew on teachers' research, which was supported through involvement in best practice research scholarships (BPRS), Networked Learning Communities (NLC), the National Foundation for Educational Research (NFER) and the Research Engaged Schools Project, and through award-bearing postgraduate courses that promoted practitioner research approaches.

Methodologically, practitioner research draws centrally on the methods of the 'family of action research' described by Kemmis and McTaggart (2005: 560) and other traditions and methodologies applicable to small-scale research such as case study and ethnography. Practitioners are often encouraged to be eclectic in their use of methods (Campbell *et al.* 2004: 80) and to address historical, sociological, cultural and philosophical influ-ences in their research contexts, as well as more pragmatic concerns (Kinchloe 2003).

The relentless drive for raising standards in teaching and learning, partly through evidence-based practice, intense accountability pressures and empha-sis on continuing professional development has contributed to a proliferation of practice-based and practitioner research and the search for evidence of improvement. Practitioner research has gained increasing recognition as a valued way of exploring and developing research-informed practice, not only in the UK but also in the North American and Australian contexts (Sachs 2003; Rowland 2005; Cochran-Smith and Lytle 2007). The Higher Education Academy (HEA) promotes pedagogical research by practitioners and for many new researchers in higher education (HE). This seems an attractive pathway, as demonstrated in Campbell and Norton (2007) in their efforts to build capacity at one institution. Developing reflective practice in a collaborative research community where practitioners undertake small action research proj-ects is mirrored in many of the new universities (Burchell and Dyson 2005).

What of action research, a tradition almost exclusively associated with practice-based research and practitioner research? Elliott (1991: 69) describes action research as 'the study of a social situation with a view to improving the quality of the action within'. It was influenced by Lewin (1948) in America in the post-war 1940s as a research strategy for addressing social problems: analysis, fact finding, conceptualisation, plan-ning, execution, more fact finding and evaluation. It was an iterative cycle: values driven, emancipatory and transformative. The fundamental aim of action research is to improve practice rather than produce knowledge, and this differs from most other research aims, but may be closer to Gibbons *et al.*'s (1994) mode 2 knowledge, which facilitates knowledge production via application. Perhaps it is time to revisit what constitutes teacher pro-fessional knowledge in relation to mode 2 knowledge and to research more about 'knowledge about practice'. Improvement of practice consists

of realising those values that constitute its ends, for example 'justice' for legal practice, 'patient care' for medicine, 'preserving peace' for policing, 'education' for teaching. Such ends are not simply manifested in the outcomes but are intrinsic qualities of the practices themselves (Elliott 1991:69).

Yet much of the work done in schools under the banner of school self-evaluation could be said to fall into this category. As can be seen in this annotated cycle, elements of performance management data gathering, analysis, evaluation and target setting fit perfectly with Elliott's action research (AR) cycle – yet would these be called research?

- It has a pedagogical aim (e.g. improving teaching of shape and space in year 6) which embodies an educational ideal (improving standards).
- It focuses on changing practice (curriculum development and/or teacher professional learning) and making it more consistent with the pedagogic aim.
- It gathers evidence about the extent to which practice is consistent or inconsistent with the aim (peer observation and monitoring, analysis of SATs results).
- In identifying inconsistencies between aspirations and practice, it problematises the assumptions and beliefs (theories) which tacitly underpin classroom practice (through performance management).
- It involves teachers in the process of generating and testing new forms of action for realising their aspirations and thereby new theories to guide their practice (target setting).
- It is a pedagogic process characterised by teacher reflexivity (what does the statistical and observational evidence say about me as a year 6 teacher?).

(Elliott 1995:10–11)

Elliott claims that teaching is a form of action research and vice versa. Yet, would we wish to designate teaching 'practitioner research'? Clearly, practitioner research is not just about process, although those processes are intrinsic to it. But what else is involved? Lawrence Stenhouse (1975) seminally described research as 'systematic enquiry made public'. So, first, research must be 'systematic', and, second, it must be 'made public'. Comparing Elliott with Stenhouse, we see that the action research process may or may not be 'research' as, for example, it may fail on the 'made public' criterion, depending of course on how we conceptualise 'public'. The traditional interpretation is to present at conferences or to publish. Perhaps it is time to consider other interpretations such as networks, groups of practitioners working together on projects and internet resources. Some key issues arising from rethinking this area, to which we will return later, are ethics, trust and quality.

What is Practitioner Inquiry?

Examining the difference between practitioner research and practitioner inquiry causes us to consider some cultural and linguistic issues as well as epistemological and ontological ones. Carr and Kemmis (1986: 162) offer action research as a 'form of self-reflective inquiry'. Kember (2000: 35) sees action research as synonymous with action inquiry and as a methodological and rigorous form of action learning in which results are published and argues that, 'all action research (inquiry) projects are therefore action learning projects, but the converse is not true'. This implies that inquiry and research are of the same order and does seem to fit with work in the USA from Cochran-Smith and Lytle (2007) and Zeichner (2003), who talk about inquiry as research or inquiry as stance. Cochran-Smith and Lytle (2007: 24) address this point in a short review of working in the field:

> We use 'practitioner inquiry' as a conceptual and linguistic umbrella to refer to a wide array of educational research modes, forms, genres and purposes. It is not our intention to suggest that the terms encompassed by the general phrase are synonymous nor do we want to blur the important ideological, epistemological, and historical differences that exist between and among them. Rather we hope to illuminate the differences across these forms of inquiry at the same time that we clarify some of their commonalities.

It seems sensible to accept that research and inquiry in the contexts described are closely aligned, and may often be the same activity.

A Case Study

What would we categorise under the field of practitioner research? What are the issues for us, as academics, entering into collaborations with practitioners undertaking research? Our case study is a project in which both authors were involved. Four consortia of schools, local authorities (LAs) and higher education institutes (HEIs) were funded for three years by the Teacher Training Agency (TTA), a quasi-autonomous non-government organisation (QUANGO) established in 1994 to manage teacher education. In this partnership we worked with the Manchester and Salford Schools' Consortium, and although located in a very particular time and context, it makes an interesting case study as it symbolizes, we think, the dawn of the era of colonisation of practitioner research by government. It is also interesting because of the significant questions it poses about collaborative practitioner research which we will explore through four familiar themes. We will illustrate these themes by drawing on the book that was written by the consortium project team (McNamara 2002).

Theme One: An Illustration of the Political Context of Teacher Research

'The research-based consortia were born, in part, from a national debate about educational research instigated by the Teacher Training Agency (TTA, now the Training Development Agency, TDA) a self-styled 'catalyst for change' in this highly politicised arena. In their move to promote 'teaching as a researched-based profession' they sought to 'improve the accessibility of the existing stock of knowledge; improve the quality and relevance of research; help teachers play a more active role in conceiving implementing, evaluating and disseminating research'. This led to claims by some that the TTA wanted to 'get its hands on' government research funding. 'Allegations regarding the relevance, quality, and accessibility, of educational research to teachers were made by Hargreaves in the 1996 TTA Annual Lecture. Such was the battle-strewn landscape when the 'research-based consortia' entered the scene.

'Research-based' shifted into 'evidence-based' and was variously inter-preted by protagonists as a formal and specialised evidence-base that would enhance professional autonomy and status; or, a technology of teaching that would deny 'craft' knowledge and reduce capacity for professional action. In the to-ing and fro-ing of academic debate, notions of 'recipe knowledge' and 'repertoire of skills' were tossed around and the teacher was positioned vari-ously as kitchen orderly or master chef. Summer 1998 saw two further reports on the health of educational research funded by The Office for Standards in Education (Ofsted) and The Department for Education and Skills (DfES). Reynolds, launching the TTA Corporate Plan 1998–2001, denounced D-I-Y and prescribed a 'technology of teaching'. He invoked some interesting meth-odological metaphors, declaring teachers to have 'validity' but not 'reliability'. In the early days of the partnership, direct encounters between the protagonists in the debate included regular, but relatively minor, skirmishes in the board-room of the TTA, where 'key contacts' of the consortia met with the National Steering Group, including representatives of all the major educational stake-holders. A further, and to us rather more distressing, assault came when we (two HE researchers) and two teacher colleagues offered a presentation of work in progress at the Collaborative Action Research Network (CARN) con-ference in October 1998. It was a hostile reception. How could this be called proper research? Was it supposed to be generalisable? Were we not traitors to the cause of educational research accepting funding, from the TTA? It was not exactly CARNage, but some did have to lick their wounds, while others were 'bloody but unbowed!' (McNamara 2002: 159).

Theme Two: Issues of Ownership and Autonomy

Issues of ownership and autonomy were apparent very early in the project. The TTA, assertive in their management of the projects, required consortia

to develop a common pedagogic theme with a view to creating a coherent evidence base. Arguably this could be seen as commendable and worked well to facilitate collaborative learning in other consortia which were focused on the substantive areas of thinking skills, mathematics and disaffection. Our consortium, however, was focused on 'school improvement' and developing a 'common pedagogic theme' conflicted with one of our research design principles that required individual projects to be embedded in their school's development plan to support systemic change. We did eventually come to a mutually agreed accommodation with the TTA on a common theme. But even the notion of what constituted 'pedagogic' research was contested and when one of our projects, which focused on 'setting and streaming', was judged to have crossed that boundary, another heated debate ensued.

Theme Three: The Role of Academic Partners

The eight research projects in the consortium were undertaken by a teacher researcher and an academic partner and these pairs operated discretely, and to a degree autonomously, a strength but also a weakness. This meant that relationships which were developed, positioned teachers very differently.

Most HEI and LA colleagues found it difficult to avoid paternalist relationships with individual teachers. The power differential was denned to include such terms as hierarchy, research experience, professional status, and attempts at empowerment of teachers, therefore, could easily fail. Again, a power dynamic inevitably operates between employers (the LA) and employees (the teachers). Gender dynamics added a further dimension to the developing picture. In the beginning all but two teachers were women; all but one of the HEI and LA men. In addition, the seven men of the HEI and LA were in positions of considerable power (inspectors, professors, principal lecturers); the eighth (a woman) breached convention in that she was at one and the same time the most powerful (as project coordinator) and (as Senior Research Fellow) the least. Apart from the teachers, that is!

A tempting conclusion would be that teachers end up at the bottom of the pile, whatever the talk about partnership, empowerment, critical friends, action research, co-researchers, and so on. This is not necessarily true. A judicious reading of the TTA might see it making all partners equal but some (the teachers) more equal than others. Teachers, it will be recalled, in the TTA grand plan, were to play a larger role in all phases of research – 'conceiving, evaluating, implementing and disseminating'. Again, a different power relationship between teachers and the HEI can be seen in the TTA 'teacher research grant scheme' (forerunner to the BPRS, a four-year project funding some 4,000 teacher researchers to the tune of £12 million) in which the grant holders (teachers) were required to use funds to buy support from HEI colleagues. In this requirement the TTA disrupted the unequal relation between teacher and academic and rebuilt

instead a 'different-but-equal' model. We might speculate whether the equality spawned by such contracts, actually brought an increased subordination of all parties to the TTA. A question that arises is: 'Is this a UK problem or is it a global issue in research communities?'

In the event, all but one pair – of teacher researcher and academic partner – claimed to have engaged in a truly collaborative research venture, although within this the range of engagement of individuals in data collection, analysis, dissemination and writing up was vast. Of the one pair that did not represent themselves as engaged in a collaborative research, the HEI colleague wrote in the project report:

> Initially, the process of research was supposed to be teacher-led. It was, in the sense that the teacher decided on the focus of the research, while the researcher looked for practical and economical ways of addressing the teachers' concerns. The researcher concluded that the process, as opposed to the focus, was researcher-led: the teacher simply did not have the time to engage in research processes in a more active way. Her conclusion was that such work was 'massive' and unrealistic to expect from the majority of teachers.
>
> (Stronach 2002: 61)

Theme Four: Issues to do with Representation of Outcomes and Practitioners

What of the visibility of practitioners that is often lost in the writing or authoring of the research outputs? In this case all but one waś involved in the writing and all the projects reported in the chapters were authored or co-authored by practitioners. But this was not without debate.

The dynamics of the partnership can be usefully illustrated by exploring the unproblematic narrative genre adopted in the story of the project, which has involved the suppression of endless crises of identity. As the story evolved, and the envelopes fell though the letterbox, the characters were created, one by one. The 'we' who planned the consortium and agreed terms and conditions were the two HEI authors together with the head teachers of the schools and some of the teacher research coordinators. The 'we' who actually wrote the bid were largely the HEI staff. The 'we' who signed the contract was the Head of the Manchester School Improvement Service. The resulting consortium involved a cast too numerous to mention across, initially, two universities and two LAs. The attempt to reconcile these manifold identities at times involved the consortium in open and productive dissonance. Difference and ambiguity in the 'meshing subplots', not only between partners but also within institutions, became part of the lived experience. Where conflict occurred in the writing of the narrative accounts in the book, for example, the resolution involved not agreeing an 'authentic' reality, but agreeing what could not be said. Luckily,

or unluckily, as the case may be, virtually all meetings, even from the early bidding phase, were either subject to a written record or taped, providing ample data for the authentication of 'accounts' and the interpretation of events. Autonomy, ownership of research focus, involvement in the process, representation of teacher researchers, writing up and dissemination are all illustrated there as infinitely problematic (McNamara 2002: 12).

These thèmes, hopefully, have helped to illustrate the issues arising from research partnership between schools, universities and local government. We can now move to our third area of concern, the relationship between research, inquiry and professional learning.

What is the Relationship between Research, Inquiry and Professional Learning?

Arguably, engagement in teacher research and inquiry increases teacher ownership of the agenda for reform and improvement. In professional learning there has been a proliferation of terminology such as action learning, critical friendship groups, peer coaching, critical evaluation and analysis. The key discriminator we believe is that practitioner research and inquiry involves the teacher in systematic investigation and the gathering and synthesising of knowledge, whether theoretical or practical. Central to professional learning is the assimilation of knowledge rather than its gathering. Can inquiry and research-based professional learning involve the production of knowledge about practice in different ways than previously conceived?

The relationships between practitioner research and professional knowledge and learning are becoming clearer as teachers rake ownership of their professional learning and manage change in their classrooms and schools through knowledge production in action research initiatives. The centrality of collaboration and networking was evident in the cases illuminated in Campbell and Macgarvey (2006), where teachers on an MA course in Practitioner Inquiry and Research were supported in leading their own learning through inquiry and research approaches (Campbell *et al.* 2004)[1]. Teachers spoke of 'cultural shifts' as a result of action research and described this as a movement away from the purely routine or superficial, to a situation in which pupil learning and teachers' strategic awareness and professional development were all subject to discussion and investigation. What also emerged, was a complex web of skills, types of knowledge and professional dispositions and attitudes that are the anatomy of teaching and constitute professional knowledge. Taken alongside the work of Gibbons *et al.* (1994) and Day's (1999: 55) observations about good teaching, 'the application of wisdom, insight, experience, content knowledge and pedagogical and organisational strategies varies according to the context of the problem', we can see the impossibility of providing universal definitions and understanding of professional knowledge.

The importance of context is paramount. We would argue that teachers doing research helps to contextualise professional knowledge and learning.

Ken Zeichner (2003: 319) identified several conditions under which school-based teacher research becomes a transformative professional development activity for teachers – and we would argue for those academic partners who support them, as the following:

- creating a culture of enquiry and respect for teacher knowledge;
- encouraging learner-centred instruction;
- developing and controlling their own foci for enquiries;
- engaging in collaborative work and study groups for intellectual challenge and stimulation.

We still need to know more about the relationship between teacher research and inquiry and teacher professional learning. We now turn to other key issues.

Ethics, Trust and Quality Issues

Furlong and Oancea (2005, 2006), in their papers funded by the Economic and Social Research Council (ESRC), tackle the complex question of quality in applied and practice-based research. The paper was commissioned to inform the national Research Assessment Exercise and intended to support better understanding of the status and value of applied and practice-based research. Groundwater-Smith and Mockler (2006: 114) pose broad, over-riding 'ethical' guidelines for practitioner research, which require observation of ethical protocols, transparent processes, collaboration, justification to a community of practice and transformability in intent and action. The above help to form the criteria on which quality of research could be judged.

In the context of quality, the roles of critical friends and critical communities shape validity and authenticity. Some new networks of researchers emerged, such as BPRS (2000–2004), Schools University Partnership for Research (SUPER) (McLoughlin *et al.* 2006), the CARN and NLC supported by the National College of School Leadership (NCSL) (2002–2006). We believe the role of HE personnel in teacher research is vital in providing support for research through a wide range of partnerships. Collaboration, networking and critical appraisal are key to the research process and need to be nurtured systematically. Hargreaves (1994: 195) states:

> In their more robust (and somewhat rarer) forms, collaborative cultures can extend into joint work, mutual observation and focused, reflective inquiry in ways which extend practice critically, searching for better alternatives in the continuous search for improvement.

Trust, accountability, responsibility and ethics are key aspects of practitioner research. Campbell and Groundwater-Smith (2007), in their introduction to their edited collection on practitioner research and ethics, identify the major areas of concern for practitioner researchers as: whether anonymity for respondents and participants was always necessary; the sensitivities involved in working with young children or vulnerable young people or adults; the benefits and problems of collaborative research with participants; roles, relationships and power differentials, stakeholders, accountability and responsibility within research ventures and projects, especially within commissioned research projects; and the complex issues involved in informed consent. They also discuss the significance of the relationship between the field-based practitioner researcher and the academic researcher who may be acting as a research mentor and critical friend under the auspices of award-bearing courses or engagement in government initiated projects. Following moves to promote professional learning and development in the workplace, there is also an increase in the number of practitioners engaging in such action or inquiry-based learning supported by university staff or consultants, as identified above. Tensions are inherent in relationships between practitioners and academics in terms of the setting of the research agenda, the policy implications that may flow from it and the right to publish outcomes. Negotiating these relationships requires ethical probity where each party recognises, understands and respects mutual responsibilities. Moreover, each may be governed by research ethics standards institutionally determined. These may not always be compatible or serve the mutual interests. The boundaries may become more blurred when the academic researcher is engaged in investigating his or her academic practice either internally or in conjunction with the professional field, or where the academic researcher is formally engaged as a consultant in a practice-based research project. To achieve quality, ethics and trust are central.

Conclusion

Increasingly, classroom and school settings have become the sites of investigation of professional learning for educational practitioners. Inquiry-based learning has been employed in the UK by academia as a key device to develop knowledge and understanding since the early 1970s in curriculum development projects; initial education of teachers; and award-bearing courses at postgraduate levels. More recently, inquiry-based learning has been commandeered by the UK Government where it has been incorporated into performance management systems and used as a methodology to underpin professional development activities, for example best practice research scholarships (Furlong *et al.* 2003).

Crucially, teacher self appraisal and evaluation are very important to how current teacher research initiatives are viewed within the research community. A strategy to promote critical thinking and high quality of research might include:

- control of research questions and project design by the teacher researchers;
- high quality of support for research projects;
- robust processes of self monitoring, critical reflection and evaluation;
- transparent procedures for dissemination and promoting debate of research projects and findings;
- establishment of critical communities in which teachers' research is made public.

We have illustrated themes arising in practitioner research, inquiry and professional learning from the case study of the Research-based School Consortia (RBSC) which spawned the government funded NLC initiative in which HE partners were often notably absent with no requirement for a research mentor from HE. A review of NLCs and their links with HE reported only 30 per cent of NLCs actually engaged in collaborative activity with HEI (Campbell *et al.* 2005). The TTA Teacher Research Grants in which HE were required to be involved, were taken up by DfES under the £12 million BPRS programme, 2000–04, where HEI partners were again often absent. In the recent Continuing Professional Development awards tender (www.tda.gov.uk) for best practice in professional learning, yet again reference to HE is not visible.

More recently, the beleaguered circumstances of many English university education departments mean that they have not the capacity to support practitioners as a result of years of under funding of core activities, the loss of Quality Research funding and the impact of the Research Assessment Exercise on the research agenda, where the pressure for high status/quality outputs is seen in some quarters as antithetical to practitioner research.

We would argue that from the catalogue of government funded research initiatives in England in the last decade (the BPRS and TTA research grants and the RBSC described earlier) criteria have on the whole been tightly denned to ensure that teachers focused on the technical-rational level, researching the improvement of their pedagogical practice rather than directing their attention to matters of curriculum, strategy or policy. We would further argue that academic partners have gradually been either excluded, or have excluded themselves, from that learning climate. We would also argue that there is a critical role for academic partners in the plethora of practitioner research, inquiry and professional learning initiatives. If ethics, trust and quality are to be given the central place they deserve and governments are to recognise that an 'investment in the transformative agenda' (Groundwater-Smith and Mockler 2006) is necessary, then academic partners are not optional.

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3

Relationships of Knowledge and Practice: Teacher Learning in Communities

Marilyn Cochran-Smith and Susan L. Lytle

Over the last 20 years, teacher learning has become one of the most important concerns of the educational establishment. It has been more or less assumed that teachers who *know* more teach better. This "simple" idea has governed multiple efforts to improve education in the arenas of policy, research, and practice by focusing on what teachers know or need to know. In this chapter, we do not question this basic idea. Rather, we point out that within various change efforts, there are radically different views of what "knowing more" and "teaching better" mean. In other words, there are radically different conceptions of teacher learning, including varying images of knowledge; of professional practice; of the necessary and/or potential relationships that exist between the two; of the intellectual, social, and organizational contexts that support teacher learning; and of the ways teacher learning is linked to educational change and the purposes of schooling. Different conceptions of teacher learning – although not always made explicit – lead different ideas about how to improve teacher education and professional development, how to bring about school and curricular change and how to assess and license teachers over the course of the professional life span.

What is most at stake in this discussion is how teachers and teacher learning – widely acknowledged as the sine qua non of every school change effort – are understood and positioned in the debate as well as how universities

and other educational agencies – widely touted for their collaborative relationships – are actually organized as they conduct business with schools. This chapter provides a framework for considering various initiatives related to teacher learning that, although sometimes described in similar language and even featuring what appear to be similar methods and organizational arrangements, are actually very different in purpose and have very different consequences for the everyday lives of students and teachers.

In this chapter, we make distinctions among three prominent conceptions of teacher learning by unpacking their differing images. The first conception is what we refer to as "knowledge-*for*-practice." Here it is assumed that university-based researchers generate what is commonly referred to as formal knowledge and theory (including codifications of the so-called wisdom of practice) *for* teachers to use in order to improve practice. The second conception of teacher learning is what we think of as "knowledge-*in*-practice." From this perspective, some of the most essential knowledge for teaching is what many people call practical knowledge, or what very competent teachers know as it is embedded in practice and in teachers' reflections on practice. Here it is assumed that teachers learn when they have opportunities to probe the knowledge embedded *in* the work of expert teachers and/or to deepen their own knowledge and expertise as makers of wise judgments and designers of rich learning interactions in the classroom The third conception of teacher learning involves what we call "knowledge-*of*-practice" Unlike the first two this third conception cannot be understood in terms of a universe of knowledge that divides formal knowledge, on the one hand, from practical knowledge, on the other. Rather, it is assumed that the knowledge teachers need to teach well is generated when teachers treat their own classrooms and schools as sites for intentional investigation at the same time that they treat the knowledge and theory produced by others as generative material for interrogation and interpretation. In this sense, teachers learn when they generate local knowledge *of* practice by working within the contexts of inquiry communities to theorize and construct their work and to connect it to larger social, cultural, and political issues.

In the final part of this chapter, we suggest directions for thinking about teacher learning as we enter the 21st century. We do so by outlining the major dimensions of the construct *inquiry as stance*, which is based on a 3-year study of the relationships of inquiry, knowledge, and professional practice in urban inquiry communities and on our experiences as university-based teachers and researchers working with student teachers and experienced teachers over the last 20 years. Derived from the knowledge-*of*-practice conception of teacher learning, we suggest that this new construct permits closer understanding of knowledge-practice relationships as well as how inquiry produces knowledge, how inquiry relates to practice, and what teachers learn from inquiry within communities. We believe that *inquiry as stance* may offer promising directions for initiatives related to preservice education, professional development,

curriculum construction/reconstruction, and school and social change. This construct also helps point to some of the most interesting but difficult questions related to teacher learning and the role of communities as we enter the new century.

It may be useful here to say a few words about what this chapter is *not* intended to do. It is not intended to provide an exhaustive or comprehensive review of the literature on teacher learning, teacher knowledge, teacher research, or teacher communities. In this volume itself, there are two other chapters that explore teacher learning from different perspectives, and there are countless articles and chapters elsewhere that relate to these topics. Our intention here is to offer a way of rethinking teacher learning that is not based on the particular strategies of teacher education programs, the particular arrangements of professional or curriculum development projects, or the specific content of assessment tools. Rather, our framework for understanding teacher learning is based on the images and assumptions that underlie methods and on the educational purposes that drive various teacher learning initiatives.

Finally, it is worthwhile to note that although we have drawn on selected pieces of work that are relevant to the concepts considered here, our unit of analysis is not the individual but the underlying conception of teacher learning. Our intention in this chapter, then, is to write conceptually – to provide an analytic framework for theorizing teacher learning on the basis of fundamental ideas about how knowledge and practice are related and how teachers learn within communities and other contexts.

Rethinking Teacher Learning: Three Contrasting Relationships

What we wish to propose in this chapter is that three significantly different conceptions of teacher learning drive many of the most prominent and widespread initiatives intended to promote teacher learning. These three conceptions derive from differing ideas about knowledge and professional practice and how these elements are related to one another in teachers' work. Although competing in fundamental ways, these three conceptions coexist in the world of educational policy, research, and practice and are invoked by differently positioned people in order to explain and justify quite different ideas and approaches to improving teaching and learning. Although they are considerably different, however, the lines between the three are not perfectly drawn, and the language that emanates from them to describe various policy initiatives for teacher learning is not mutually exclusive.

This is the case in part because there are no particular methods of teacher education and no particular organizational arrangements for improving teachers' practices or altering curriculum that follow directly or necessarily

from any of the three conceptions of teacher learning. Rather, initiatives for teacher learning are driven primarily by interpretations and ideas – even if these are unexamined and tacit – and not simply by methods and practices. For example, some of the most widespread methods of preservice teacher education – mentoring, reflection, and teacher research/action research – carry multiple meanings and are connected to agendas that are quite different from one another. By the same token, some of the most prominent strategies for promoting professional development – inquiry groups, school-wide projects, coaching, and collaborations with universities – are constructed

TEACHER LEARNING: **A CONCEPTUAL FRAMEWORK**	
KNOWLEDGE-PRACTICE RELATIIONSHIP	What is understood or assumed to be the relationship of knowledge and practice? what is assumed about how "knowing more" and "teaching better" are connected?
IMAGES OF KNOWLEDGE	What knowledge are teachers assumed to need in order to "teach better"? what are the domains, sources, or forms of that knowledge? who generates that knowledge? who evaluates and interprets that knowledge?
IMAGES OF TEACHERS, TEACHING, AND PROFESSIONAL PRACTICE	What is assumed about the nature of the activity of teaching? what is included in the idea of "practice"? what are assumed to be the primary roles of teachers in and out of classrooms? what is the relationship of teachers' work in and of classrooms?
IMAGES OF TEACHER LEARNING AND TEACHERS' ROLES IN EDUCATIONAL CHANGE	What is assumed about the roles teachers and teacher learning play in educational change? what are assumed to be the intellectual, social, and organizational contexts that support teacher learning? what is the role of communities, collaboratives, and/or other collectives in these?
CURRENT INITIATIVES	What are current initiatives in teacher education, professional development and/ or teacher assessment that are based on these images?

Figure 1:

quite differently and serve very different purposes. This is possible because the salient differences among the three conceptions of teacher learning reside not in the methods used to foster teacher learning but, as Figure l indicates, in the assumptions that underlie these methods – in the images of knowledge, practice, and teachers' roles that animate them.

In the instance of a particular method (such as reflection or structured discussions about cases of practice or networks formed in collaboration with university educators, for example), it is more important to consider what is made problematic and what is assumed when these methods are used than that they are used or that they are described in similar language. In order to get at the conception of teacher learning underlying a particular initiative, then, we would need to ask what teachers were reflecting on and for what ultimate purposes, or what counted as a case of something and how and in whose interest it was enlisted, or what inquiry groups were inquiring about and what they presumed were the "givens" of teaching and schooling, or whether a school-wide group or a school-university partnership operated from a shared idea about the larger intellectual and political project in which participants were engaged.

For each of the three conceptions of teacher learning we suggest, we provide a brief overview and then discuss major images. We use the term *images* to mean the central common conceptions that seem symbolic of basic attitudes and orientations to teaching and learning. Then we discuss several actual (and, in most cases, highly visible) initiatives related to teacher learning that are undergirded by each conception. Each of these initiatives, whether related to and labeled teacher education and professional development, curricular and school change, or teacher assessment and licensure, has to do with teacher learning.

As Figure 2 indicates, each of the three sections that make up the bulk of this chapter is organized as follows:

- overview of the conception of teacher learning and the knowledge-practice relationship from which it derives
- images of knowledge
- images of teachers, teaching, and professional practice
- images of teacher learning and teachers' roles in educational change
- current initiatives animated by the conception

Focusing on images is a heuristic for taking each conception apart and considering the dominant ideas and tendencies within it. Elaborating on the conceptions by describing current initiatives puts the pieces of the conception back together and reveals how each is instantiated in the complex worlds of schools and schooling. None of the initiatives we use as examples are to be considered exemplars of the conception or its embodiment as a "pure type." Rather, each reflects what we understand to be the dominant ideas

CONCEPTIONS OF TEACHER LEARNING: 3 KNOWLEDGE-PRACTICE RELATIONSHIPS			
Knowledge-Practice Relationship	*Knowledge-For-Practice*	*Knowledge-In-Practice*	*Knowledge-Of-Practice*
Images of knowledge			
Images of teachers, teaching, and professional practice			
Images of teacher Learning and Teachers' Roles in Educational Change			
Current intiatives in Teacher Education, Professional Development, and/or teacher Assessment			

AQ:1 **Figure 2:**

that animate the initiative and also reflects the unique ways these ideas are played out in particular contexts and at particular points in time. Note that, in this chapter, we devote proportionately more space to the second and third conceptions of teacher learning than to the first. We do so primarily because these tend to be instantiated in ways that are collaborative or collective and/or that feature teacher communities, which is a central interest of this chapter.

Teacher Learning, Conception 1: Knowledge *for* Practice

The first conception of teacher learning is based on an understanding of the relationship of knowledge and practice that may be thought of as knowledge-*for*-practice. One of the most prevalent conceptions of teacher

learning, this first conception hinges on the idea that knowing more (e.g., more subject matter, more educational theory, more pedagogy, more instructional strategies) leads more or less directly to more effective practice. Here, knowledge for teaching consists primarily of what is commonly called "formal knowledge," or the general theories and research-based findings on a wide range of foundational and applied topics that together constitute the basic domains of knowledge about teaching, widely referred to by educators as "the knowledge base." These domains generally include content or subject matter knowledge as well as knowledge about the disciplinary foundations of education, human development and learners, classroom organization, pedagogy, assessment, the social and cultural contexts of teaching and schooling, and knowledge of teaching as a profession. The idea here is that competent practice reflects the state of the art: that is, highly skilled teachers have deep knowledge of their content areas and of the most effective teaching strategies for creating learning opportunities for students. Teachers learn this knowledge through various preservice and professional development experiences that provide access to the knowledge base. To improve teaching, then, teachers need to implement, translate, or otherwise put into practice the knowledge they acquire from experts outside the classroom.

Images of Knowledge

The knowledge-*for*-practice relationship depends on the assumption that the knowledge teachers need to teach well is produced primarily by university-based researchers and scholars in various disciplines. This includes subject matter knowledge, educational theories, and conceptual frameworks, as well as state-of-the-art strategies and effective practices for teaching a variety of content areas. The knowledge-*for*-practice conception is based on the premise that teaching has a "distinctive knowledge base" that, "when mastered, will provide teachers with a unique fund of knowledge (e.g., knowledge that is not pedestrian or held by people generally)" (Gardner, 1989, pp. ix–x). Furthermore, it is assumed that it is possible to be explicit about a formal knowledge base rather than relying on the conventional wisdom of common practice, which some have referred to as natural, intuitive, or normative (Gardner, 1989; Huberman, 1996; Murray, 1989). This conception of teacher learning indirectly underlies the burgeoning number of handbooks of research on teaching, learning, and schooling that are intended to codify and disseminate the bodies of knowledge that inform the profession (e.g., Banks, 1996; Flood, Jensen, Lapp, & Squire, 1991; Gardner, 1989; Murray, 1989; Richardson, in press; Sikula, 1996; Wittrock, 1986) Part of the point of constructing the formal knowledge base for teaching is to establish the "truth of educational practices as they may be derived from a theory" by determining the "correctness" of the theory, the educational practice, and the process by

which the second is derived from the first (Murray, 1989, p. 7) In much of the literature of research on teaching it is assumed that formal knowledge is generated through "studies of teaching that use conventional scientific methods, quantitative and qualitative; these methods and their accompanying designs are intended to yield a commonly accepted degree of significance, validity, generalizability, and mtersubjectivity" (Fenstermacher, 1994, p. 8).

As Shulman (1987) pointed out more than a decade ago, however, the knowledge base needs to include an array of knowledge categories and sources. He argued that what was one of the most important sources of the knowledge base for teaching – the wisdom of practice – was generally missing from the literature. Of particular interest was what he called "pedagogical content knowledge," which he defined as:

> that special amalgam of content and pedagogy that is uniquely the province of teachers, their own special form of professional understanding . . . it represents the blending of content and pedagogy into an understanding of how particular topics, problems, or issues arc organized, represented, and adapted to the diverse interests and abilities of learners, and presented for instruction, (p. 8)

Following Shulman's suggestion, a number of researchers have attempted over the last decade to codify the practical, pedagogical wisdom of able teachers. Pedagogical content knowledge, or how teachers understand subject matter and how they transform it into classroom instruction, has thus become a central construct within the knowledge base. Two related programs of research, developed initially by researchers at Stanford University (e.g., Grossman, 1990; Shulman, 1986, 1987; Shulman & Grossman, 1987; Wilson, Shulman, & Richert, 1987) and at Michigan State University (e.g., Ball, 1990; McDiarmid, Ball, & Anderson, 1989; Wilson, 1994; Wilson, Miller, & Yerkes, 1993), have explored these areas, especially in relation to teachers' pedagogical reasoning as they transform their personal understandings of content into representations that can be taught to students (Grossman, 1990; McDiarmid & Ball, 1989; McDiarmid, Ball, & Anderson 1989; Wilson, Shulman, & Richert, 1987). These and other programs of research have attempted to formalize what teachers need to know about their subjects as well as what they need to know in order to choose, construct, use, and evaluate representations of subject matter in ways that are teachable for diverse student populations.

The image of knowledge in this first conception of teacher learning is a familiar one. It bespeaks the educational community's quest to join the other major professions by establishing an official and formal body of knowledge that distinguishes professional educators from laypersons. In that sense, it reflects what Donmoyer (1996) calls a "fundamental faith in expertise and scientific knowledge as a source of that expertise" (p. 98). In another sense, the idea of a formal knowledge base that includes "the wisdom of practice"

is somewhat perplexing. On the one hand, it seems critically important to acknowledge that excellent teachers have important knowledge, some of which may certainly be thought of in Shulman's terms as pedagogical content knowledge. However, including this knowledge in the formal knowledge base, which is the case in every major publication that attempts to organize and disseminate "the knowledge base," depends on codifying what competent teachers know using the standard methods, frameworks, and language of university-based researchers. It is not entirely clear, then, what it means for university-based researchers to codify school-based teachers' knowledge. The difficulty here may be due to the fact that Shulman's concept of pedagogical content knowledge, which has spawned a decade of important research and influenced the way most current teacher education programs are conceptualized and presented, does *not* fit neatly into a universe of knowledge types that subdivides into the categories of formal knowledge and practical knowledge (Fenstermacher, 1994). When all knowledge is divided into two parts, conceptions like Shulman's that attempt in certain ways to bridge the two become problematic. Perhaps, however, as we suggest in the final section of this chapter, the problem is with the application of the formal-practical knowledge distinction itself and *not* with notions of knowledge for teaching that are not easily subsumed by the distinction.

Images of Teachers, Teaching, and Professional Practice

Implicit in the knowledge-*for*-practice relationship is an image of practice as how, when, and what teachers do as they use the formal knowledge base in the daily work of the classroom. This includes the ways teachers organize lessons and units of study, the activities and materials teachers use for various groups of students, the sequence of content matter teachers present, the ways teachers structure lessons and classroom interactions, and the methods teachers use to assess individual and group progress. Teaching, then, is understood primarily as a process of applying received knowledge to a practical situation: Teachers implement, translate, use, adapt, and/or put into practice what they have learned of the knowledge base. As we said earlier, the assumption in this relationship is that the knowledge that makes teaching a profession comes from authorities outside of the profession itself. The image of the professional teacher is one who adeptly uses the knowledge base in daily practice. It is important to note here that from this perspective, teachers *are* regarded as knowledgeable in that they have "insights" as well as "knowledge, skills, and dispositions" (Reynolds, 1989, p. 138) that they call upon to explain phenomena and make judgments about practice. Generally speaking, however, teachers and other practitioners are not regarded as those who generate knowledge or theorize classroom practice (Lytle & Cochran-Smith, 1992; Schon, 1987).

The image of practice in this first conception of teacher learning, then, is one of knowledge *for* use – teachers are knowledge users, not generators. As Murray (1989) points out, educational theories do not necessarily lead directly to effective educational practices. Rather, teachers need to be knowledgeable about "educational practices that have proven records of accomplishment" (p. 12) and skeptical about the claims of educational theorists and researchers that are not warranted empirically. Efforts to improve practice through implementation of the knowledge base, then, are based more or less on an instrumental view of the relationship between theory/research/knowledge and practice. In discussions about teaching and the knowledge base, some acknowledge the teacher as decision maker and emphasize the importance of judgment and practical reasoning much more so than others (e.g., Donmoyer, 1996; Griffin, 1989). Feiman-Nemser and Remillard (1996), for example, suggest that many of the prominent knowledge base conceptions "leave open the question of what it means to know and use such knowledge in teaching … misrepresent[ing] the interactive character of teachers' knowledge and sidestep[ping] the issue of knowledge in use" (pp. 73–74). They point out the limitations of prepositional knowledge as a guide to practice and insist that teachers do not use knowledge one domain at a time but rather meld knowledge from many domains as they make judgments and reason about what to do in a particular context. (This idea is further elaborated in the discussion of the second conception of teacher learning that follows.)

Images of Teacher Learning and Teachers' Roles in Educational Change

Over the last several decades, what some people refer to as a "new" image of teacher learning, or a "new model" of teacher education/professional development, has emerged (Grimmett & Neufeld, 1994; Hargreaves & Fullan, 1991; Lieberman & Miller, 1991; Little, 1993; McLaughlin, 1993). For prospective teachers, teacher learning is no longer seen as a one-time process of "teacher training" wherein undergraduates are equipped with methods in the subject areas and sent out to "practice" teaching. Similarly, for experienced teachers, teacher learning is no longer seen as a process of periodic "staff development" wherein experienced teachers are congregated to receive the latest information about the most effective teaching processes and techniques. The "new" image of teacher learning has been informed by research on how teachers think about their work (Clark & Peterson, 1986), and emphasis has shifted from what teachers do to "the knowledge teachers hold, how they organize that knowledge, and how various knowledge sources inform their teaching" (Barnes, 1989, p. 17). The general orientation of the "new" approach to teacher learning is more constructivist than transmission oriented – that is, it is recognized that both prospective and

experienced teachers (like all learners) bring prior knowledge and experience to all new learning situations, which are social and specific. In addition, it is now broadly understood that teacher learning takes place over time rather than in isolated moments in time and that active learning requires opportunities to link previous knowledge with new understandings.

Very broadly speaking, this new vision of teacher education and professional development is shared by all three of the conceptions of teacher learning that we are exploring in this chapter. Just below the surface, however, this new vision looks very different, depending on underlying assumptions. In efforts animated by knowledge-*for*-practice, teacher learning centers around enhancing teachers' knowledge of subject matter, of the standards and content of the various professions, and of research-based strategies for effective teaching and classroom organization. A heavy emphasis here is on the need for teachers to learn additional and richer content information as well as new bundles of strategies and skills. Knowledge-*for*-practice emphasizes the acquisition of content area knowledge for elementary-level teachers as much as it does for secondary teachers. It also maintains clear distinctions between expert and novice teachers as well as between very competent teachers and those who, albeit experienced, simply do not know enough content or methods to teach effectively.

The assumption is that it is impossible for teachers at any level to teach students effectively and/or to meet the standards of the various subject matter professions without fundamental knowledge of the disciplines they teach. As McDiarmid (1989) points out, however, rich and deep subject matter knowledge is only the beginning. Following Shulman (1986), he argues that learning subject matter knowledge must be coupled with learning subject-specific pedagogy, particularly understanding the critical role of representation in subject matter teaching and being able to construct and evaluate appropriate representations.

There is some discussion in the literature about how prospective and experienced teachers might learn about subject matter representations – for example, by discussion and evaluation of the multiple representations of a particular concept that are generated by the participants in a particular class or seminar (McDiarmid, 1989). However, the overriding emphasis in this first conception of teacher learning is on what, not how, teachers are supposed to learn.

In a sense, then, the emphasis in teacher learning initiatives based on knowledge-*for*-practice is on helping new and experienced teachers come to know what, generally speaking, is already "known" – at least already known by university-based researchers or other outside experts. There are some obvious tensions and even contradictions in the ways this is played out in real situations. Perhaps the clearest example is the tension between *transmitting* a widely accepted pedagogical theory – like constructivist teaching, for example – *to* new and experienced teachers and, in contrast, *constructing it*

along with them. Over the last few decades, as psychological and cultural theories of knowledge construction and constructivist teaching have been more fully worked out in the literature, these distinctions have become more elusive. Richardson (1997), for example, argues that constructivist teacher education derived from Piagetian psychology focuses on teaching teachers to teach in a very particular constructivist manner that is more or less already worked out. Constructivist teacher education derived from sociocultural and situated theories of learning, on the other hand, prompts teachers to understand and reconsider their own prior understandings and to do the same with their students. We would caution, of course, that there is no necessary relationship between a particular version of constructivism and a particular pedagogy of teacher education. However, Richardson's example highlights an obvious tension in knowledge-*for*-practice: The image of teacher learning that emerges from direct instruction about constructivism is quite different from the image that emerges from constructing constructivist pedagogy.

When teacher education programs or projects are animated by knowledge-*for*-practice (where there is so much emphasis on the knowledge base and on what teachers need to know of formal knowledge), there is an inevitable pull toward teaching as transmission and learning as accruing knowledge. This emphasis is exacerbated by high-stakes teacher assessments that privilege formal knowledge, particularly subject matter knowledge that is generally separated from knowledge of pedagogy and practice.

Implicit in the knowledge-*for*-practice conception is the assumption that teachers play a central role in educational change by virtue of their state-of-the-art knowledge acquired through teacher preparation and continuing professional development. Their role is to solve problems by implementing certified procedures rather than to pose problems based on their first-hand observations and experiences. This vision of educational change is primarily an individualistic one, even when it is carried out at the whole-school level. The goal is for each and every teacher to enact practices consistent with the knowledge base and with empirically certified best practices, as instantiated in the various curriculum and assessment frameworks that are implemented at local and state levels.

Current Initiatives in Teacher Learning

Many of the most widespread current initiatives for improving teacher learning are grounded in a conception of knowledge-*for*-practice. In particular, this conception drives many highly visible and highly politicized efforts to improve preservice teacher education, professional development for experienced teachers, whole-school change efforts, and national and/or state certification and licensure policies. In preservice teacher education, the most obvious example is the effort over the last 10 years to make the burgeoning

codified knowledge base the centerpiece of the preservice curriculum. Part of what has motivated this effort is the belief that the curriculum of teacher education programs has been for the most part idiosyncratic and normative. Two major projects have spearheaded this effort: the production by the American Association of Colleges for Teacher Education (AACTE) of two knowledge base books (Murray, 1996; Reynolds, 19891) and the compilation of two handbooks of research on teacher education (Houston, 1990; Sikula, 1996) by the Association of Teacher Educators (ATE).

As Gardner (1989) points out in the preface to the first knowledge base book, "The basic premise of this book is that teacher education has for too long been a normative enterprise, and it is now time to become a state of the art enterprise ... more deliberate and rational" (p. ix). The knowledge-*for*-practice idea is perhaps nowhere as clearly articulated as in the AACTE committee's statement of intent for the first knowledge base books project:

> We believed that by specifying the knowledge considered to be relevant for the beginning teacher, a basis for several second-order functions would be created, including the systematic delineation of prerequisites for obtaining that knowledge and for constructing assessment procedures to evaluate both individuals and programs in the several knowledge domains. Thus, it is intended that the *KBBT* [Knowledge Base for the Beginning Teacher] project should be helpful as one source of guidance in planning for pre-education and foundation courses, in facilitating work on the assessment of teacher knowledge, and in helping to specify standards for the accreditation of teacher preparation programs, (p. x)

The knowledge base books emphasize what teachers and teacher educators need to know. The ATE handbooks of research on teacher education echo the same premise – that compiling the knowledge base for teacher education is essential to making it more on par with other professions: "Few of the several hundred professions have as little of a consensus about a common knowledge base as does the teaching profession. ... There is a growing consensus today about the need to move the profession of teaching in the direction of a more common knowledge base" (Sikula, 1996, p. xv).

Since the mid-1980s, the National Council for the Accreditation of Teacher Education (NCATE) has evaluated teacher preparation programs according to the extent to which they successfully incorporate into the curriculum the professional knowledge bases for teaching and learning (Christensen, 1996). As is stated succinctly in the introduction to the current standards:

> The NCATE standards are designed to encourage units to develop a coherent program of study according to the current and emerging knowledge bases in the respective fields of inquiry (e.g., science and science education). Education units must demonstrate that the knowledge bases are understood by – and can be articulated and applied by – faculty and students alike. (NCATE, 1995, p. 11)

With this heightened emphasis, the quality of teacher education programs has in large part been determined by fealty to the idea of a formal knowledge base, as constructed and disseminated not only by the professional organizations in teacher education but also by the professional organizations in each subject matter discipline or certification area (e.g., the National Council of Teachers of English for secondary English teaching, the Council on Young Children for early childhood education, the Council on Exceptional Children for special education, the National Association for Social Studies Teaching for teaching in history and the social studies, and so on).

The knowledge-*for*-practice conception also drives some of the most publicized and commercialized initiatives in professional development for experienced teachers. This conception is deeply embedded in many school-wide and school-system-wide professional development projects that use the now-common language of "best practice." Here the idea is that there are empirically verified strategies for classroom management, instruction, curriculum, and assessment that transcend differences in local contexts and hence require minimal translation by teachers for use in classrooms (Fashola & Slavin, 1998). From this perspective, it is pointed out that "best practices," identified through empirical research on high performing schools and teachers, are not necessarily the same as widespread practices, which, as some critics remind us, may be based on tradition (Gardner, 1989), idiosyncrasy (Carter, 1990), opinion (Fenstermacher, 1986), lore (North, 1987), inaccuracy (Murray, 1989), superstition (Leinhardt, 1989), and even delusion (Huberman, 1996) rather than on empirical warrant. Best practices, on the other hand, are based on empirical evidence of effectiveness. They are distinct from general theories or concepts that may imply practices that are not empirically certified and/or from which specific teaching practices are not apparent. This perspective is crystal clear in a recent issue of the journal of the American Federation of Teachers, an issue titled "Moving From Fads to What Works: Building a Research-Based Profession." Grossen's (1996) article in this issue, from which the title is taken, makes the following argument:

> The reformers who provide teachers with theories – but no evidence that they arc effective and no details for how to use them – are really demanding that teachers do most of their work for them. To ask that teachers create all of their own tools and curricula is like asking doctors to invent all of their own drugs; like asking airplane pilots to build their own airplanes. When would teachers have time to do this? Engineering a highly effective instructional sequence would more than consume most teachers' private time.
>
> To be a profession is to have a professional knowledge base comprised of shared procedures and strategies that work. This may be a new idea for teachers, though it is quite old for other professions. Good teachers using well-engineered tools and detailed procedures can achieve remarkable results and – this is the good news – teachers can get these results and also have a personal life. (p. 27)

From the perspective of those who advocate for professional development based on teachers' learning of best practices, then, the most accomplished teachers are those who are most knowledgeable about these practices and who most accurately and consistently use these practices in the classroom. In many school change efforts animated by knowledge-*for*-practice, teachers are presumed to learn from ongoing training and coaching provided by officially certified "trainers" in a particular model. The preferred contexts in which this training and coaching occur are the course, workshop, or whole-school training project sponsored by a university, school district, or educational publisher. Currently, this kind of professional development also occurs as part of whole-school reform models wherein not-for-profit and, increasingly, commercial and privatized companies offer complete (not to mention extremely expensive) packages designed to transmit to teachers specific instructional strategies certified through large-scale, long-term, replicated (and replicable) empirical research (Fashola & Slavin, 1998; Grossen, 1996).

Finally, the knowledge-*for*-practice conception of teacher learning underlies most of the teacher tests that are currently required for initial teaching certification in nearly every state nationwide. Passing initial certification tests is generally part of the minimal standard for state licensure as distinct from national board certification or other advanced performance assessments, which are voluntary and intended to assess a higher level of professional experience and expertise (Roth, 1996). Initial certification tests generally assess some combination of communication and literacy skills, on the one hand, and knowledge of subject matter and pedagogy, on the other. Particularly the subject matter tests, which assess basic knowledge of, for example, American and world history, zero in on items of knowledge that are completely decontextualized from the contexts of teaching and from the needs and prior knowledge of individual learners or learning communities.

Teacher Learning, Conception 2: Knowledge *in* Practice

A second conception of teacher learning that is prominent in various initiatives to enhance what teachers know and improve classroom practice is what we call knowledge-*in*-practice. From this perspective, the emphasis is on knowledge in action: what very competent teachers know as it is expressed or embedded *in* the artistry of practice, *in* teachers' reflections on practice, *in* teachers' practical inquiries, and/or *in* teachers' narrative accounts of practice. A basic assumption here is that teaching is, to a great extent, an uncertain and spontaneous craft situated and constructed in response to the particularities of everyday life in schools and classrooms. The knowledge teachers use to teach well under these conditions is manifested in their actions and in the decisions and judgments they make in an ongoing way. This knowledge is acquired through experience and through

considered and deliberative reflection about or inquiry into experience. From this perspective, which enhances and elevates the status of teachers' practical knowledge, it is assumed that teachers learn when they have opportunities to examine and reflect on the knowledge that is implicit in good practice – in the ongoing actions of expert teachers as they choose among alternative strategies, organize classroom routines, and make immediate decisions as well as set problems, frame situations, and consider/reconsider their reasoning. To improve teaching then, teachers need opportunities to enhance, make explicit, and articulate the tacit knowledge embedded in experience and in the wise action of very competent professionals. Facilitated teacher groups, dyads composed of more and less experienced teachers, teacher communities, and other kinds of collaborative arrangements that support teachers' working together to reflect in and on practice are the major contexts for teacher learning in this relationship.

Images of Knowledge

The knowledge-*in*-practice conception of teacher learning depends on the assumption that the knowledge teachers need to teach well is embedded in the exemplary practice of experienced teachers. Rooted in a constructivist image of knowledge, this includes how outstanding teachers make judgments, how they conceptualize and describe classroom dilemmas, how they name and select aspects of classroom life for attention, and how they think about and improve their craft. The knowledge-*in*-practice conception is based on the premise, best articulated by Donald Schon (1983, 1987, 1995), that there is knowledge implicit in action and artistry – that artistry itself is a kind of knowing.

> When we go about the spontaneous, intuitive performance of the actions of everyday life, we show ourselves to be knowledgeable in a special way. Often we cannot say what we know. When we try to describe it, we find ourselves at a loss, or we produce descriptions that are obviously inappropriate. Our knowing is ordinarily tacit, implicit in our patterns of action and in our feel for the stuff with which we are dealing. It seems right to say that our knowledge is *in* our action. And similarly, the workaday life of the professional practitioner reveals, in its recognitions, judgments, and skills, a pattern of tacit knowing-in-action. (Schon, 1995, p. 29)

This view of professional knowledge breaks epistemologically with what Schon calls "technical rationality," wherein it is assumed that professionals are problem solvers, that the problems of professional practice present themselves ready made and full blown, and that they can be solved instrumentally through the application of research-based theory and technique. Instead, from the knowledge-*in*-practice perspective, it is acknowledged that competent professionals pose and construct problems out of the uncertainty and

complexity of practice situations and that they make new sense of situations by connecting them to previous ones and to a variety of other information. Here, thought and action are linked, and the lines between knowledge generation and knowledge use are blurred. This view of knowledge is the basis of the claim that in order to understand and improve practice in the professions, it will take new epistemologies that are outside of the positivist paradigm, particularly what Schon (1983) has referred to as a "new epistemology of practice" (p. 69). The idea that there is knowledge *in* practice is congruent with the increasing acknowledgment in the educational community that much formal research has little bearing on the most immediate and central problems of education. Increasingly, there are serious questions about the usefulness for teaching and learning of a paradigm that divides knowledge generation from knowledge application.

Russell (1987) points out that Schon's general idea of professional knowing-in-action is closely akin to what many educational researchers refer to as "practical knowledge," a term that is regularly used to conceptualize and sort out varying perspectives on knowledge for and about teaching (Carter, 1990; Clandinin & Connelly, 1987, 1995; Fenstermacher, 1994; Hargreaves, 1996; Richardson, 1994b). Carter (1990) uses the term broadly as part of a category that refers to the knowledge teachers acquire that is directly related to classroom performance. She suggests that practical knowledge is "the knowledge teachers have of classroom situations, the practical dilemmas they face in carrying out purposeful action in these settings ... the complexities of interactive teaching and thinking-in-action" (p. 299). Fenstermacher (1994) defines practical knowledge as "what teachers know as a result of their experience as teachers" as distinct from what they know based on research that has been produced by others for them to use. He includes here "how to do things, the right place and time to do them, or how to see and interpret events related to one's actions" (p. 12). Similarly, Richardson (1994b) suggests that there is a certain immediacy and practicality to the knowledge needs of teachers, which are not necessarily or even often met by what she calls the "law-like statements" (p. 8) of formal research. Richardson argues that practical inquiry is more likely both to respond to the immediacy of the knowledge needs teachers confront in everyday practice and to afford foundations for formal research by providing new questions and concerns.

There have been a number of interesting efforts to discuss and develop expanded views of teachers' practical knowledge (e.g., Carter, 1990; Clandinin, 1986; Clandinin & Connelly, 1987; Elbaz, 1983, 1990; Fenstermacher, 1994; Grimmett, personal communication, September 1998; Grimmett, MacKinnon, Erickson, & Riecken, 1990; Leinhardt, 1989; Munby, 1987; Richardson, 1994a; Russell, 1987; Shulman, 1986, 1987). Although these efforts share respect for the practicality of teaching, there are many meanings attached to the term *practical knowledge* and to the larger frameworks within which the idea is located. Some elaborations seek to enrich and elevate the notion of

"practical knowledge" by breaking epistemologically with the idea that there is a body of formal knowledge generally applicable across school and classroom contexts. This view does not assume there is formal knowledge and there is also practical knowledge. Conceptions of practical knowledge based on an epistemological break with the knowledge-claiming conventions of formal knowledge refuse to make apologies for the practicality of teaching or to act as if practical work is somehow "less than." Rather, they explore how teachers invent knowledge in action and how they learn to make that knowledge explicit through deliberation and reflection (e.g., Clandinin, 1986; Clandinin & Connelly, 1987; Elbaz, 1983, 1990; Grimmett, personal communication, September 1998; Grimmett, MacKinnon, Erickson, & Riecken, 1990; Munby, 1987; Russell, 1987).

In contrast, other discussions of practical knowledge are deeply embedded inside an epistemology wherein the universe of knowledge types is accounted for by the distinction between formal knowledge, on the one hand, and practical knowledge, on the other (e.g., Carter, 1990; Fenstermacher, 1994; Leinhardt, 1989; Richardson, 1994a). From these perspectives, even though the possibility of "new epistemologies" of practical knowledge is considered, the knowledge-claiming conventions of traditional social science research and hence the hegemony of formal knowledge conventions are maintained (e.g., Fenstermacher, 1994; Huberman, 1996).[2]

Other differences among notions of practical knowledge hinge on the significance of social context for understanding and interpreting individual teachers' stories and on methods for determining the validity and trustworthiness of teachers' views (Grimmett, personal communication, September 1998). Some who work from the knowledge-*in*-practice conception talk about teachers' personal practical knowledge, or what Clandinin and Connelly (1995) refer to as "embodied narrative relational knowledge" (p. 3), which is "practical, experiential and shaped by a teacher's purposes and values" (Clandinin, 1986, p. 4). Here, there is an emphasis on the "landscapes" or milieu in which teachers' work is conducted; practical knowledge is understood to include "that body of convictions and meanings, conscious or unconscious, that have arisen from experience (intimate, social and traditional) and are expressed in a person's practices" (Clandinin & Connelly 1995 p. 7) This knowledge is conveyed in the language of story, "which is prototypical, relational among people, personal, contextual, subjective, temporal, historical, and specific" (p. 14). From this perspective, the classroom is thought of as a knowledge landscape – epistemologically different from the landscape outside the classroom.

Another image of knowledge prevalent in the knowledge-*in*-practice conception of teacher learning builds on the idea of teaching as "craft" (e.g., Grimmett & Erickson, 1988; Grimmett & MacKinnon, 1992; Grimmett, MacKinnon, Erickson, & Riecken, 1990; Leinhardt, 1989), a notion that was for a long time maligned by educational scholars as a conservative one oriented more or less to trial and error (read: "anti-intellectual") (Tom &

Valli, 1990). More recently, however, the terms *craft* and *knowledge* have been coupled, changing the valence of meaning from one of experience alone to one of experience married to deliberate inquiry and reflection and thus upping (or at least attempting to up) the epistemological status of "craft." Leinhardt's ideas (1989), although often cited within a string of names of people who have developed this notion, are something of an anomaly here in that she couples "craft" and "knowledge" but includes in this conception both "deep, sensitive, location-specific knowledge of teaching" and "fragmentary, superstitious, and often inaccurate opinions" (p. 18) It seems more than a little contradictory to refer to fragments, superstitions, and inaccuracies as "knowledge," and indeed this elaboration works against the goal of elevating the status of the wisdom of practice.

Grimmett and MacKinnon (1992), on the other hand, define "craft knowledge" as an amalgam of teachers' pedagogical content knowledge (Shulman, 1987) and what they call "pedagogical learner knowledge," or "pedagogical procedural information useful in enhancing learner-focused teaching in the dailiness of classroom actions" (p. 387). They point out that craft knowledge is understood differently depending on underlying views of the educational process: conservative, progressive, or radical. Their own view takes a progressive perspective:

> Craft knowledge is a particular form of morally appropriate, intelligent, and sensible know-how that is constructed by teachers holding progressive and radical educational beliefs, in the context of their lived experiences and work around issues of content-related and learner-focused pedagogy. In the final analysis, the essential validity and morality of craft knowledge reside in readers' "living" the life of particular teachers through stories, narrative, case studies, and other forms of vicarious experience, (p. 396)

Grimmett and MacKinnon's image of craft knowledge is distinct from several other ideas about practical knowledge in that it carries with it a sense of critique, a particular political perspective, and an emphasis on the formation of learners as citizens for a democratic society. From Grimmett's perspective on craft, the image of knowledge in teacher learning resonates deeply with Dewey's (1916) ideas about democratic schooling and preparing citizens for a democratic society. Grimmett (personal communication, September 1998) suggests that the art of teaching emerges out of a craft that has become "exceedingly accomplished" and enacted in ways that are "gripping, communicative, and ultimately educative" (p. 1).

Images of Teachers, Teaching, and Professional Practice

Implicit in knowledge-*in*-practice is an image of teaching as wise action in the midst of uncertain and changing situations. Schon (1987) suggests that

different professions have different conventions for action, including the varying tools, media, and language they share as well as the different units or chunks of recognizable and recurring activity that make up practice. From this perspective on the profession of teaching, the words used interchangeably with teaching – artistry, craft, performance, skill – and many of the words used to describe practice – practical, concrete, procedural, specific – convey a valence of action and activity guided by teachers' judgments and ways of conceptualizing subject matter and classroom situations. Teaching, then, is understood primarily as a process of acting and thinking wisely in the immediacy of classroom life: making split-second decisions, choosing among alternative ways to convey subject matter, interacting appropriately with an array of students, and selecting and focusing on particular dimensions of classroom problems. To do this, outstanding teachers draw on the expertise of practice or, more precisely, on their previous experiences and actions as well as their reflections on those experiences.

Here the focus is on teaching as action, but this is not at all like the idea of teaching as simply technique and routine or the idea of teacher as technician. Rather, the images of teaching and professional practice implicit in knowledge-*in*-practice are linked to those of other professions that require artistry and design – architecture, psychoanalysis, musical performance, surgery – wherein differences in artistry are matters not simply of style but of the need to invent new knowledge and strategies in the face of unexpected situations. Schon (1995) likens the idea of design in professional practice to Dewey's (1916) notion of inquiry as thought intertwined with action. Schon suggests:

> Dcweyan inquiry is very close to the notion of *designing* in the broad sense of that term – not the activities of "design professions" such as architecture, landscape architecture, or industrial design, but the more inclusive process of making things (including representations of things to be built) under conditions of complexity and uncertainty. This broader sense of designing includes a lawyer's design of a case or legal argument, a physician's construction of a diagnosis and course of treatment, an information technologist's design of a management information system, and a teacher's construction of a lesson plan. (p. 31)

From the design or artistry perspective on practice, there is a clear emphasis on teaching as something that takes place primarily inside the classroom in the form of a performance (often a solo performance) – a teacher working with a group of students or a teacher preparing to or following up on her or his work with a group of students. In addition to a focus on action inside the classroom, there is also an image of the expert teacher, distinguishable not only from the novice but also from the teacher who, albeit very experienced, is simply not outstanding, that is, not sufficiently competent, wise, effective, or accomplished to be considered an expert.

From the perspective of knowledge-*in*-practice, it is not assumed that the knowledge that makes teaching a profession is generated exclusively or even primarily by experts who have studied about teaching and schooling from their professional locations outside of schools. Rather, it is assumed that professional expertise comes in great part from inside the teaching profession itself. In that there is knowledge *in* wise action, teachers, who are understood to be the designers and architects of that action, are also understood to be the generators of knowledge. As Richardson (1994a) points out, "The conception of teaching underlying these projects rejects the dominant notion among many educators and policy makers that the teacher is a recipient and consumer of research and practice. Rather, the teacher is seen as one who mediates ideas and constructs meaning and knowledge and acts upon them" (p. 6).

Images of Teacher Learning and Teachers' Roles in Educational Change

As we pointed out earlier in our discussion of the first conception of teacher learning, there has been a shift in thinking about teacher learning over the last several decades from an emphasis on what teachers do to what they know, what their sources of knowledge are, and how those sources influence their work in classrooms. New visions of teacher learning, acknowledging the importance of prior knowledge and of learning over time, are implicit in all three of the conceptions of teacher learning we are elaborating in this chapter. However, in efforts animated by knowledge-*in*-practice, teacher learning hinges on enhancing teachers' understandings of their own actions – that is, their own assumptions, their own reasoning and decisions, and their own inventions of new knowledge to fit unique and shifting classroom situations. This view of teacher learning is based on the idea that knowledge comes from reflection and inquiry in and on practice, or what Schon, following Dewey, calls reflection "in the crucible of action" (cited in Grimmett, 1988, p. 13). This idea is similar to what Britton (1987) means by his proposal that teaching – intrinsically – is a form of inquiry or knowledge generation and also similar to Berthoff's (1987) demur of the idea that teachers need to do more data gathering. Rather, she asserts that teachers already have all of the information they need and should instead learn to reexamine or, in her word, "RE-search" their own experiences.

In one sense, then, the emphasis in this second conception of teacher learning is somewhat similar to the first in that both imply that teachers learn to teach better by learning to construct and articulate their understandings of what, generally speaking, is already "known." But, of course, there is a critical difference between the first and the second. Knowledge-*for*-practice emphasizes teachers' learning of knowledge that is already known by someone else (i.e., outside experts and researchers who have developed formal

information and theory in the various domains of the knowledge base, particularly knowledge of subject matter and of instructional strategies). The knowledge-*in*-practice conception, on the other hand, highlights teachers' learning of knowledge that is already known by expert teachers themselves albeit often known tacitly and in ways that are unable to be articulated clearly or appropriately to others.

From the perspective of knowledge-*in*-practice, both what teachers need to learn and how they need to learn it in order to teach better are clear. The "what" is practical knowledge, craft knowledge, or knowing-in-action – that is, the knowledge that is generated by competent teachers as they deal with classroom situations that are inherently indeterminate, including how decisions are made, how strategies are selected, how disparate instances are connected to one another, how subject matter is conveyed, and how new occurrences are understood and framed. The "how" is deliberation and consideration/reconsideration – that is, consciously reflecting on the flow of classroom action and invention of knowledge in action in order to take note of new situations, intentionally and introspectively examining those situations, and consciously enhancing and articulating what is tacit or implicit. This kind of learning sometimes occurs in dyadic situations (as in exchanges between an expert and a less experienced or less expert teacher) and sometimes in groups or communities (as in groups of experienced educators working together to reflect on, inquire about, and transform their experiences). Schon's (1987) early ideas about the context for this kind of professional learning focused on what he called the professional practicum, a term commonly used in preservice teacher education, although not necessarily with the nuances of meaning suggested by Schon. Schon made emphatic that a professional practicum was distinct from both learning on one's own, which offers freedom but requires each newcomer to reinvent the wheel, and apprenticeship, which offers real-world experience but is not conducive to professional initiation or education. Schon suggested that the professional practicum could be constructed to provide a sheltered learning space of sorts, not completely of the real world, which might be overwhelming to the newcomer, but a space that nonetheless approximated the world of practice.

Schon's ideas about the contexts for professional learning are, in general, quite similar to Dewey's (1904) ideas about teacher learning, more than 80 years earlier. Making a distinction between an apprenticeship model and a laboratory model of teacher education, Dewey cautioned against plunging would-be teachers too early into the real world of schools where they were forced to focus on details and outward management issues and hence likely to develop habits fixed through "blind experimentation" rather than considered deliberation:

> The student adjusts his actual methods of teaching, not to the principles
> which he is acquiring, but to what he sees succeed and fail in an empirical

way from moment to moment; to what he sees other teachers doing who are more experienced and successful in keeping order than he is; and to the injunctions and directions given him by others. In this way the controlling habits of the teacher finally get fixed with comparatively little reference to principles in the psychology, logic, and history of education, (p. 14)

Closely akin to the work of Dewey and Schon, the knowledge-*in*-practice conception of teacher learning is based on the idea that good teaching can be coached and learned (but not taught) through reflective supervision or through a process of coaching reflective teaching. These ideas are played out and elaborated in many current initiatives, as we point out subsequently. It is important to note, however, that there is a significant difference between coaching reflective practice, as Schon and Dewey suggest, and coaching as a way of experts training nonexperts to use teaching or cognitive strategies that are already worked out (e.g., Colton & Langer, 1994; Joyce, Showers, & Rohlheiser-Bennett, 1987). The latter is congruent with the knowledge-*for*-practice conception of teacher learning, while the former is congruent with knowledge-*in*-practice.

Current Initiatives in Teacher Learning

The knowledge-*in*-practice conception of teacher learning animates many current efforts to professionalize and improve teaching by foregrounding the teacher as valid knower of practical knowledge. For years now and almost universally, preservice student teachers have been placed with experienced teachers whose function is to teach by example about the practicalities of everyday life in classrooms. Increasingly, however, there has been emphasis on the need to identify "cooperating," "host," or "mentor" teachers on the basis not simply that they have experience but that they have expertise and artistry, or, put differently, because they are "master teachers" (Grant, 1997). Generally, this means that these teachers are knowledgeable about subject matter and pedagogy, knowledgeable about how to reflect on and learn from their practice, and knowledgeable about how to participate in learning situations, whether mentoring relationships, inquiry groups, or communities of reflective practitioners.

It is important to note once again, however, that it is not language, organizational context, or method that reveals the conception of teacher learning underlying a particular initiative. As we suggested earlier, this is the case because the salient differences among and across the three conceptions of teacher learning reside not in methods but in the ideas and assumptions that animate them. Thus, not every initiative that uses the language of "master teachers" or "mentors" for inexperienced teachers, whether at the preservice or induction level, is based on the knowledge-*in*-practice approach to teacher

learning. Indeed, as Little (1990) has pointed out, the "mentor phenomenon" is played out quite differently in various state and local initiatives for beginning teacher induction, preservice teacher education, and professional development. When initiatives are, in fact, based on a view of knowledge-*in*-practice, the emphasis of mentoring or coaching arrangements is to help newcomers participate in dialogue with puzzling problems of practice – what some have referred to as a "new pedagogy of teacher education" (Heaton & Lampert, 1993) or "an approach to teacher education ... rooted in the study of practice" (Lampert & Ball, 1998, p. vii).

Grounded in a view of learning as social and situational and in a view of knowledge as socially constructed, this approach conceptualizes teacher learning as "assisted performance" (Feiman-Nemser & Remillard, 1996) and focuses on how "experienced teachers can induct novices into the intellectual and practical challenges of reform-minded teaching" (Feiman-Nemser & Beasley, 1997). This approach is the basis of a number of initiatives for teachers' learning of "adventurous teaching" (Heaton & Lampert, 1993) or "teaching for understanding" (Cohen, McLaughlin, & Talbert, 1993), conceptualized as a kind of educational practice where "students and teachers acquire knowledge collaboratively, where orthodoxies of pedagogy and 'facts' are continually challenged in classroom discourse, and where conceptual (versus rote) understanding of subject matter is the goal" (McLaughlin & Talbert, 1993, p. 1). Initiatives based on this conception of teacher learning often provide social and organizational contexts for teacher education in which teachers work together in pairs one less experienced teacher and one more experienced in the kind of constructivist classroom practice that is the target or in small groups where several inexperienced teachers observe and reflect on the work of a more experienced one Lampert and Ball's (1998) recent book on teaching multimedia and mathematics provides some of the most fully elaborated analysis of teacher education initiatives from this perspective They describe a design for a pedagogy of teacher education that presents preservice students with various opportunities to conduct what they refer to as "pedagogical inquiry" (p. 110) – for example reading or experiencing in a multimedia environment a more experienced teacher's records of practice and then reflecting on these records with the guidance of a teacher educator who may or may not be one and the same with the experienced teacher they have observed.

Other teacher education and professional development initiatives based on knowledge-*in*-practice start with what teachers (or would-be teachers) believe and what they are doing or trying to do in their own classrooms. These initiatives focus on helping practitioners develop their artistry by exploring problems of practice that cannot be solved by the straightforward application of established theories and by reconsidering their own assumptions and reasoning processes. In many of these initiatives, like the ones just described, the role of the facilitator, who coaches or guides a group in the process of learning how to reflect and/or to conduct inquiry on practice, is

central. Grimmett and Dockendorf (in press) provide an interesting analysis of what they refer to as "the labyrinth of researching teaching" – that is, the complex dilemmas and issues that teacher research group leaders face when they attempt to "deconstruct our role as presenter in order to reconstruct our role as facilitator." From the perspectives, respectively, of a facilitator of a teacher research leaders group and a facilitator of teacher research groups themselves, Grimmett and Dockendorf explore the difficulties and possibilities of facilitators functioning not as university experts but as colleagues.

In preservice teacher education, this role is often taken on by a university-based instructor or fieldwork supervisor who teaches student teachers how to reflect on their experiences by guiding and shaping journal writing or other self-reflective activities. There are also many preservice initiatives where students are guided to be reflective and questioning about teaching and to practice their decision-making skills by considering cases of practice (e.g., Merseth, 1996; J. Shulman, 1992; J. Shulman & Colbert, 1989; Wasserman, 1993). As Wasserman (1993) points out, cases are "meant to provide pictures of life in schools, raising issues that beg for enlightened and informed examination. If, through studying these cases, teachers grow in their ability to see beyond the surface and feel ready to deal with deeper, more complete meanings, the cases will have served their purpose" (p. xiii).

In professional development initiatives based on this second conception of teacher learning, facilitators often work with groups of teachers, functioning as supportive outsiders who push others to question their own assumptions and reconsider the bases of actions or beliefs. Richardson's notion of practical inquiry (1994a) as a method of staff development (Anders & Richardson, 1994; Richardson & Hamilton, 1995), for example, is based on the idea that consultants, often from a university, work collaboratively with teachers to help them see the discrepancies between their beliefs and practices. This process of teacher learning hinges on constructing and reconstructing the "practical arguments" (Fenstermacher, 1994) that guide practice and consequently experimenting with alternative practices (Richardson, 1994a). The parallel initiative at the higher education level, often referred to as "self-study," also focuses on professional development by clarifying assumptions, recognizing discrepancies between beliefs and practices, and rethinking practices based on self-reflective analyses (e.g., Hamilton & Pinnegar, 1998a, 1998b; LaBoskey, Davies-Samway, & Garcia, 1998).

Duckworth's (1987, 1997) approach to working with experienced teachers also highlights the importance of teachers learning from each other as well as being guided by an insightful facilitator. Duckworth (1987) says the following about her own role as a person who helps teachers learn:

> What I love to do is to teach teachers. I love to stir up their thoughts about how they learn; about how on earth anyone can help anyone else learn; and about what it means to know something. … [I love to] find out what people

> think about things and to find ways to get them talking about what they
> think; to shake up things they thought they knew. … I love to see the most
> productive of questions be born out of laughter, and the most frustrating of
> brick walls give way to an idea that has been there all along, (p. 122)

In each of these initiatives, the point is for teachers to consider and reconsider what they know and believe, to consider and reconsider what it means to know or believe something, and then to examine and reinvent ways of teaching that are consistent with their knowledge and beliefs.

The preceding discussion is not meant to suggest that every teacher learning initiative in preservice education or in professional development that uses strategies called "reflection," "case methods," or "inquiry" falls into this second conception of teacher learning. To the contrary, as a number of teacher educators have pointed out (Clift, Houston, & Pugach, 1990; Cochran-Smith, 1994; Grimmett, 1988; Grimmett, MacKinnon, Erickson, & Reicken, 1990; Houston & Clift, 1990; Tabachnick & Zeichner 1991; Tom, 1985), there may well be little shared meaning about what it means to do reflection or inquiry in preservice teacher education, even though similar language is used and activities that, at least on the surface, are similar to one another are encouraged. Likewise, many critics (Anderson, Herr, & Nihlen 1994; Cochran-Smith & Lytle, in press; Lytle, 1992; Noffke et al., 1996) have pointed out that among Professional development initiatives that feature inquiry, there are as many differences as similarities (This point is further developed in the third section of this chapter.) Rather than method or strategy, what makes the difference is the larger goal of using any of these for teacher learning as well as the images of knowledge, practice, and educational purpose to which they are attached. In teacher learning initiatives that derive from knowledge-*in*-practice, the point of using cases or reflections or inquires is to provide the social and intellectual contexts in which prospective and experienced teachers can probe the knowledge embedded in the wise teaching decisions of others and/or can deepen their own knowledge and their own abilities to make wise decisions in the classroom.

Finally, the knowledge-*in*-practice relationship underlies some of the newer assessments of teachers' professional knowledge and skill. Designed for experienced teachers rather than beginners, the National Board for Professional Teaching Standards, for example, includes assessments of how teachers document and reflect on their own work through journal writing, videotaping, and preparation of portfolios that represent the rich range of their reflections and deliberations.

Teacher Learning, Conception 3: Knowledge *of* Practice

The third conception of teacher learning is what we refer to as knowledge-*of*-practice. From this perspective, both knowledge generation and knowledge

use are regarded as inherently problematic. That is, basic questions about knowledge and teaching – what it means to generate knowledge, who generates it, what counts as knowledge and to whom, and how knowledge is used and evaluated in particular contexts – are always open to discussion. Furthermore, like the view of knowledge in the second conception of teacher learning, knowledge in this third conception is regarded as not existing separate from the knower. Rather, knowledge making is understood as a pedagogic act – constructed in the context of use, intimately connected to the knower, and, although relevant to immediate situations, also inevitably a process of theorizing. From this perspective, knowledge is not bound by the instrumental imperative that it be used in or applied to an immediate situation; it may also shape the conceptual and interpretive frameworks teachers develop to make judgments, theorize practice, and connect their efforts to larger intellectual, social, and political issues as well as to the work of other teachers, researchers, and communities. The basis of this knowledge-practice conception is that teachers across the professional life span play a central and critical role in generating knowledge of practice by making their classrooms and schools sites for inquiry, connecting their work in schools to larger issues, and taking a critical perspective on the theory and research of others. Teacher networks, inquiry communities, and other school-based collectives in which teachers and others conjoin their efforts to construct knowledge are the major contexts for teacher learning in this conception.

Unlike the first conception of teacher learning, the third does not build on the formal knowledge-practical knowledge distinction, nor does it, as the second conception does, use language that is (or is often taken to be) congruent with this distinction. That is, the knowledge-*of*-practice conception stands in contrast to the idea that there are two distinct kinds of knowledge for teaching, one that is formal, in that it is produced following the conventions of social science research, and one that is practical, in that it is produced in the activity of teaching itself. The knowledge-*of*-practice conception also differs from the first two in that it does not make the same distinctions between expert teachers, on the one hand, and novice or less competent teachers, on the other. Furthermore, in initiatives animated by the knowledge-*of*-practice conception, the idea is *not* to help teachers develop knowledge that is, in some senses, already known – either by outside experts or by expert teachers themselves.

We would like to stress that the idea behind knowledge-*of*-practice is *not* that practitioners' research provides all of the knowledge necessary to improve practice or that the knowledge generated by university-based researchers is of no use to teachers. Nor is it assumed here that using roughly the same strategies as university-based researchers, school-based teacher researchers add to the knowledge base a new body of generalizations based on their perspectives inside schools and classrooms. In other words, the assumption is not that expert teachers and others who are studying them (collaboratively or otherwise) generate a new or supplementary kind of

formal knowledge about expert practices in teaching. But it is also not assumed that they generate and codify a new body of practical knowledge based on epistemic standards that are different from but derivative of those of formal knowledge. Rather, implicit in the idea of knowledge-*of*-practice is the assumption that, through inquiry, teachers across the professional life span – from very new to very experienced – make problematic their own knowledge and practice as well as the knowledge and practice of others and thus stand in a different relationship to knowledge. The third conception of teacher learning is not to be taken as a synthesis of the first and second conceptions. Rather, it is based on fundamentally different ideas: that practice is more than practical, that inquiry is more than an artful rendering of teachers' practical knowledge, and that understanding the knowledge needs of teaching means transcending the idea that the formal-practical distinction captures the universe of knowledge types.

Images of Knowledge

The knowledge-*of*-practice conception turns on the assumption that the knowledge teachers need to teach well emanates from systematic inquiries about teaching, learners and learning, subject matter and curriculum, and schools and schooling. This knowledge is constructed collectively within local and broader communities. This image of knowledge has several iterations that grow out of different but somewhat related intellectual and educational movements. As we have suggested elsewhere (Cochran-Smith & Lytle, 1999), each of these movements constructs the role of teacher as knower and as agent in the classroom and in larger educational contexts, and most carry distinctly critical views of education and the power relations it entails. In his discussion of what constitutes knowledge, for example, Kincheloe (1991) asserts that, from a critical constructivist position, "there is no knowledge without a knower" and thus "it is impossible from [this] perspective to conceive knowledge without thinking of the knower" (p. 26). Linking knower and known is also part of the image of knowledge in the second conception of teacher learning, knowledge-*in*-practice. In this third conception, knowledge-*of*-practice, both knowers and knowledge are also connected to larger political and social agendas.[3]

In fact, some widely known advocates of action research regard constructing and reconstructing curriculum as central to the larger project of social change and the creation of a more just and democratic society (Anderson, Herr, & Nihlen, 1994; Carr & Kemmis, 1986; Noffke, 1991, 1997; Noffke & Brennan, 1997). From this perspective, the democratic impulse is paramount, as Noffke (1997) points out: Knowledge is constructed collaboratively by teachers, students, administrators, parents, and academics with the end of locally developed curriculum and more equitable social relations. The image of knowledge here is not narrow or technical, nor is the goal of inquiry taken

to be production of "findings" but rather the raising of fundamental questions about curriculum, teachers' roles, and the ends as well as the means of schooling. Noffke argues that knowledge generation of this kind "embodies a critical stance toward the interests represented in all research forms. It seeks not additions to a knowledge base for teaching, but a transformation of educational theory and practice toward emancipatory ends" (p. 324).

A related but different image of knowledge in this third conception of teacher learning is represented in the work of school-based and university-based teachers and researchers committed to progressive education, the social responsibility of educators, and the construction of alternative ways of observing and understanding students' work, solving educational problems, and helping teachers uncover and clarify their implicit assumptions about teaching, learning, and schooling (Bussis, Chittenden, & Amarel, 1976; Carini, 1979, 1982, 1986; Duckworth, 1987; Goodman, 1985; Perrone, 1989; Strieb, 1985; Traugh et al., 1986). For example, the reflective practices of Carini and her colleagues at the Prospect School and Center are based on a phenomenological or descriptive epistemology (Himley, 1991) that privileges the understandings that emerge from "deep talk":

> Essentially this kind of talk asks participants to engage in a process of collaboratively generated meaning that takes place over a relatively long period of time ... this reflective or descriptive process enables participants to see and re-see that shared focus of interest in view of an ever-enlarging web of comments, tensions, connections, connotations, differences, oppositions. This reading takes place within the permeable and interanimating border regions among writer, readers, language, and culture. Readers note emerging patterns and connections. They locate the topic within multiple contexts, widening the range of its correlatives, as they come to understand it more fully, both in its particularity and at the same time in its relatedness to other texts and contexts. (p. 59)

In work of this kind, the image of knowledge as collectively constructed is particularly striking; knowledge emerges from the conjoined understandings of teachers and others committed to long-term highly systematic observation and documentation of learners and their sense making. To generate knowledge that accounts for multiple layers of context and multiple meaning perspectives, teachers draw on a wide range of experiences and their whole intellectual histories in and out of schools.

A related image of knowledge grows out of work that links teacher education, qualitative research, and literacy studies. A central idea in this work is that knowledge of practice across the professional life span is generated by making classrooms and schools sites for research, working collaboratively in inquiry communities to understand the co-construction of curriculum, developing local knowledge, and taking critical perspectives on the theory and research of others (see, for example, Allen, Cary, & Delgado, 1995; Cochran-Smith & Lytle, 1993; Erickson, 1986; Fleischer, 1995; Florio-Ruane & Walsh,

1980; Hollingsworth et al., 1994; Ray 1993; Stock 1995; Vinz, 1996; Wells 1994). From this perspective, Lytle and Cochran-Smith (1992) have characterized teacher research as a way of knowing about teaching locally that can also be useful to a more public educational community. They argue:

> Teacher research . . . makes visible the ways teachers and students negotiate power, authority, and knowledge in classrooms and schools. As a way of knowing, then, teacher research has the potential to alter profoundly the cultures of teaching – how teachers work with their students toward a more critical and democratic pedagogy, how they build intellectual communities of colleagues who arc both educators and activists, and how they position themselves in relationship to school administrators, policy makers, and university-based experts as agents of systemic change, (p. 470)

Hargreaves (1996) also offers an image of knowledge as transformative. He argues for a new set of principles about knowledge development and use that would diversify what counts as knowledge, broaden the forms of discourse about knowledge, and widen the roles of teachers to include systematic inquiry and policy enactment.

Images of Teachers, Teaching, and Professional Practice

Implicit in the knowledge-*of*-practice conception of teacher learning is an image of professional practice as encompassing teachers' work within but also beyond immediate classroom action. As we have pointed out, the image of practice in the first conception, knowledge-*for*-practice, emphasizes how teachers use the knowledge base to solve problems, represent content, and make decisions about the daily work of the classroom. The image of practice in the second, knowledge-*in*-practice, emphasizes how teachers invent knowledge in the midst of action, making wise choices and creating rich learning opportunities for their students. Although different in important ways, both of these refer primarily to what teachers do within the boundaries of their roles as classroom managers, orchestrators, and planners. On the other hand, this third conception of teacher learning, knowledge-*of*-practice, emphasizes that teachers have a transformed and expanded view of what "practice" means. Teachers' roles as co-constructors of knowledge and creators of curriculum are informed by their stance as theorizers, activists, and school leaders. This image of practice entails expanded responsibilities to children and their families, transformed relationships with teachers and other professionals in the school setting, and deeper and altered connections to communities, community organizations, and school-university partnerships. We are not suggesting that an expanded view of practice results from *adding* teachers' activity outside the classroom to what they do inside but, rather, that what *goes* on inside the classroom is profoundly *altered* and ultimately transformed when teachers' frameworks for practice foreground the intellectual, social, and cultural contexts of teaching.

This third conception of teacher learning emphasizes images of teacher as agent and of teaching as agency in the classroom and in larger educational contexts. Although there are (and have been for some time) differing iterations of this idea, each carries with it a distinctly critical view of education and of knowledge and power relations within it. Each provides a critique – implicit or explicit – of prevailing concepts of the teacher as technician, consumer, receiver, transmitter, and implementor of other people's knowledge as well as a critique of many of the prevailing social and political arrangements of schools and schooling. Goswami and Stillman's (1987) volume, *Reclaiming the Classroom: Teacher Research as an Agency for Change,* suggests an image of practice transformed by teachers' research. They suggest that when teachers do research:

> [they] become theorists, articulating their intentions, testing their assumptions, and finding connections with practice. ... [Teachers] step up their use of resources; they form networks; and they become more active professionally. ... They become rich resources who can provide the profession with information it simply doesn't have ... they become critical, responsive readers and users of current research ... they collaborate with their students to answer questions important to both, drawing on community resources in new and unexpected ways. The nature of classroom discourse changes when inquiry begins, (preface)

From this perspective, changing the curriculum, changing the nature of teachers' work, and changing the cultures of teaching and learning in and out of schools and classrooms are part of grass-roots efforts to reimagine the teaching of literacy and language through inquiry (Goswami & Stillman, 1987; Lytle, in press). From this perspective, the teacher's relationship to knowledge is quite different from that assumed in other conceptions of teacher learning.

The images of practice we have been describing as part of this third conception of teacher learning – critical, political, and intellectual – are implicit in the writing of student teachers and experienced teachers who work as researchers in their own schools and classrooms. Drawing on the writing of student teachers, for example, Cochran-Smith (1999) suggests that:

> teaching for social justice is difficult and uncertain work . . . profoundly practical in that it is located in the dailiness of classroom decisions and actions – in teachers' interactions with their students and families, in their choices of materials and texts, in their utilization of formal and informal assessments . . . learning to teach for social justice is as much a matter of learning to construct particular practices as it is learning to theorize those practices.

In the writing of experienced teacher researchers (Ballenger, 1992; Fecho, 1998; Gallas, 1998; Resnick, 1996; Waff, 1994), there are elaborated and vivid images of what it means to construct pedagogies by challenging school

and classroom practices, deliberating about what is regarded as expert knowledge, examining underlying assumptions, and making the lives of families and communities part of the curriculum. In the image of practice embedded in knowledge-*of*-practice, teaching for change is an across-the-professional-life-span project (Cochran-Smith & Lytle, 1992a).

Kincheloe (1991) has written explicitly about the critical nature of professional practice and of teacher research as a path to empowerment. He uses the word *critical* to refer specifically to critical European social and economic theory (with its roots in the Frankfurt School) and to the idea that teacher research is always "mindful of the relationship between teachers', students', and administrators' consciousness and the socio-historical contexts in which they operate" (p. 35). Images of practice as critical are also found in Freire's (1970) notion of liberatory pedagogy, Giroux's (1988) concept of the teacher as "transformative intellectual," and Kincheloe's (1993) elaboration of "critical constructivism."

Some of those who take the view that practice is critical suggest that there is a necessary link between critical social theory and critical educational practice. For example, Leistyna, Woodrum, and Sherblo (1996) argue:

> Critical social theories thus function as both political and pedagogical practice. They should inspire the rcconceptualization of different ways of knowing that rupture entrenched epistemologies, and they can equally help to foster participatory spaces for the sharing and production of knowledge, and the mobilization of agency to effect changes in the world. The very act of engaging one another and theorizing around the issues of oppression is inherently a form, if not the first seeds, of transformative practice, (p. 7)

Others, although acknowledging the potential of critical inquiry to alter the nature of practice and the role of teachers, do not assume a necessary relationship. Rather, there is the persistent worry that the power of action research/teacher research can be severely diminished if its "democratic edge is blunted" (Kincheloe, 1991, p. 83), if it is separated from "the political sphere" (Noffke, 1997, p. 306), or if its "generative nature" is allowed to "contribute to either its marginalization and trivialization, on the one hand, or its subtle co-optation or colonization, on the other" (Cochran-Smith & Lytle, 1998, p. 21).

Images of Teacher Learning and Teachers' Roles in Educational Change

As we indicated earlier, "new visions" of teacher education/professional development have emerged over the last several decades. From the perspective of knowledge-*of*-practice, these new visions have been informed by explorations

of the cultures of schools and of teachers' work and workplaces. These suggest that what is needed in professional development are opportunities for teachers to explore and question their own and others' interpretations, ideologies, and practices (Grimmett & Neufeld, 1994; Hargreaves & Fullan, 1991; Lieberman & Miller, 1994; Little, 1993; Little & McLaughlin, 1993; McLaughlin, 1993). This means that teachers learn by challenging their own assumptions; identifying salient issues of practice; posing problems; studying their own students, classrooms, and schools; constructing and reconstructing curriculum; and taking on roles of leadership and activism in efforts to transform classrooms, schools, and societies.

Fundamental to this conception of teacher learning is the idea that teachers learn collaboratively, primarily in inquiry communities and/or networks (Lieberman, 1992) where participants struggle along with others to construct meaningful local knowledge and where inquiry is regarded as part of larger efforts to transform teaching, learning, and schooling. Over the last decade or so, a number of school-and university-based teachers and researchers have looked closely at the nature of teacher learning in inquiry communities (Allen, Cary, & Delgado, 1995; Banford et al., 1996; Cochran-Smith, 1991a, 1995a, 1995b, 1998; Cochran-Smith & Lytle, 1993; Evans, 1989; Gitlin et al., 1992; Goswami & Stillman, 1987; Grimmett & Neufeld, 1994; Hargreaves & Fullan, 1991; Hollingsworth & Sockett, 1994; Lytle, 1996; Lytle, Belzer, & Reumann, 1992, 1993; Lytle et al., 1994; Lytle & Fecho, 1991; McDonald, 1992; Meyer et al., 1998; Mohr & Maclean, 1987; Noffke & Stevenson, 1995; Wells, 1994). These communities often involve joint participation by teachers and researchers who are differently positioned from one another and who bring different kinds of knowledge and experience to bear on the collective enterprise. The key, however, is that all participants in these groups – whether beginning teachers, experienced teachers, teacher educators, or facilitators – function as fellow learners and researchers rather than experts. Although consultants and outside speakers as well as wide readings from multiple perspectives are often used as resources, the underlying conception is quite different from the idea of studying "the experts." Rather, new collaborative relationships are being crafted that replace the expert-novice relationship. These feature colleagues working together, bringing their perspectives to bear on inquiries into the complexities and messiness of teaching and learning.

In the knowledge-*of*-practice conception of teacher learning, the central image is of teachers and others working together to investigate their own assumptions, their own teaching and curriculum development, and the policies and practices of their own schools and communities. This means that teacher learning begins necessarily with identifying and critiquing one's own experiences, assumptions, and beliefs. This is related both to Freire's (1970) claim that it is critical for teachers to know their own knowledge and to Knoblauch and Brannon's (1988) notion that teacher researchers develop "knowledge of the making of knowledge" (p. 27).

Learning by engaging in systematic and intentional inquiry about practice (in the sense of the expanded notion of practice elaborated earlier) entails collaboratively reconsidering what is taken for granted, challenging school and classroom structures, deliberating about what it means to know and what is regarded as expert knowledge, rethinking educational categories, constructing and reconstructing interpretive frameworks, and attempting to uncover the values and interests served and not served by the arrangements of schooling. When work in communities is based on knowledge-*of*-practice – whether that work is referred to as teacher research, action research, or practitioner inquiry – the goal is not to do research or to produce "findings," as is often the case for university researchers. Rather, the goal is understanding, articulating, and ultimately altering practice and social relationships in order to bring about fundamental change in classrooms, schools, districts, programs, and professional organizations. At the base of this commitment is a deep and passionately enacted responsibility to students' learning and life chances and to transforming the policies and structures that limit students' access to these opportunities (Lytle & Cochran-Smith, 1994).

Teacher learning by constructing knowledge-*of*-practice – whether developing curriculum, understanding children's work, investigating how students and teachers together construct knowledge, or examining school policies and practices – always involves some kind of systematic collection, analysis, and interpretation of data sources. Of course, as Anderson, Herr, and Nihlen (1994) point out, what counts as data or as evidence in practitioner research is still being debated. Furthermore, teachers and other participants in inquiry communities have been inventing new forms and frameworks of analysis and interpretation. Some of these forms and frameworks may look quite unfamiliar to those who are accustomed to the traditional modes of data collection and analysis entailed in most university-based research. For example, one of the most striking images of learning by generating knowledge *of* practice is the image of teachers engaging in oral inquiry. Studying practice through oral inquiry is based on rich conversations about students' work, teachers' classroom observations and reflections, curriculum materials and practices, and classroom and school-related documents and artifacts. Although analyses of these data sources are primarily oral and constructed in the social interactions of a particular group, much of the documentation is in written form, as are group records. These enable teachers to revisit and reexamine their joint analyses.

Carini and her colleagues at the Prospect School and Center (Carini, 1975, 1986; Himley, 1991; Himley & Carini, 1991) provide the most elaborated accounts of what this kind of teacher learning through talk looks like. It is clear that what it does *not* look like is the casual chat of school hallways or lunchrooms. Nor, although relational, does it emphasize primarily the personal talk engaged in when offering moral support or empathizing. Rather, as Himley points out about the Prospect School in general, "'teacher talk'… is the central educational and epistemological activity" (p. 57):

> What I call deep talk is based on the reflective practices developed by Carini and her colleagues at Prospect. … Essentially, this kind of talk asks participants to engage in a process of collaboratively generated meaning that takes place over a relatively long period of time. The purpose is to open up intellectual space, to understand more fully and richly a shared focus of interes—a drawing or written text, a child's school self, a key-word—through language and the power of collective thought, (p. 59).

Oral inquiries such as these represent teachers' self-conscious and often self-critical attempts to make sense of their daily work by talking about it in planned ways. In communities convened to explore issues and practices across contexts by examining particular cases, the primary outcomes are the enriched understandings of the participants.

Hollingsworth et al. (1994) and McDonald (1992) also use the metaphor of "talk" to describe teacher learning. Hollingsworth refers to "sustained conversation" wherein participants learn to articulate an "emerging feminist consciousness" (p. 7) as they explore the many relationships – classroom, school, and community – that bear on how they make sense of teaching and learning. McDonald describes teacher learning as a matter of "breaking professional silence" when teachers come together to think, discuss, write, and "read the texts" (p. 43) of teaching, in part by collaboratively commenting on the vignettes and commentaries of group members and in part by responding to and critiquing the research of others.

It is clear from the examples we have mentioned so far that there is a strong image of community in this third conception of teacher learning – that is, an image of teachers and other group members constructing knowledge by conjoining their understandings in face-to-face interactions with one another over time. In fact, the knowledge-*of*-practice relationship depends on the assumption that knowledge is socially constructed by teachers who work together and also by teachers and students as they mingle their previous experiences, their prior knowledge, their cultural and linguistic resources, and the textual resources and materials of the classroom. Cochran-Smith and Lytle (1993) focus on this idea explicitly. They argue that teacher research can be a powerful way for teachers to get at what is being socially constructed in and out of their classrooms – or the understandings they and their students are building as they "construct the curriculum" (p. 51) as well as the discrepancies that may exist between practices and theories of practice.

Teachers' development of deeper understandings of their own learning as socially constructed is often parallel to their efforts to construct inquiry-based curriculum and instruction with their students (Branscombe, Goswami, & Schwartz, 1992; Pappas & Zecker, 1998a, 1998b; Short, 1996; Wells, 1994). The parallelism between practitioners' inquiry and their construction with students of inquiry-based learning is no accident. When teachers who see teaching as learning and learning as teaching (Branscombe, Goswami, & Schwartz, 1992) work together in learning communities, they link what they learn about their own learning to new visions of what can happen in

classrooms. Along these lines, Meyer (1998) characterizes teacher learning as a dialectic of composing and disrupting – composing a view of self, voice, relationships, and curriculum – while at the same time experiencing such elements as productively disruptive to many aspects of school life.

From the perspective of knowledge-*of*-practice, teacher learning is linked to larger change efforts – school reorganization, democratic schooling, and social justice – and to the expanded roles of teachers as leaders and activists. This image of teacher learning both invites and grows out of new kinds of collaborations among teachers and among teacher groups, schools, school systems, universities, and other organizations. For example, when teachers and teacher educators come together to construct and reconstruct curriculum (e.g., Hursh, 1997; Noffke, Mosher, & Maricle, 1994; Noffke & Stevenson, 1995), the goal is to unpack and remake the ideological underpinnings of the curriculum and reinvent their work along more ethical and democratic lines. The overarching agenda is political: to transform the relationships of the many stakeholders involved in the educational process and the traditional relations of power, voice, and participation. Noffke (1997) contrasts "a role for teachers in the collective production of knowledge leading to more democratic schools" (p. 319) with inquiry that focuses on the more narrow goal of individual development. Interestingly, Wells (1994) suggests that what "begins with the individual practitioner embarking on a personal inquiry" (p. 32) can evolve through more widespread collaboration into larger school change efforts. What may be important here is not the trade-off between an emphasis on individual development, on the one hand, and larger political agendas, on the other. Rather, what *is* important is whether or not and to what extent opportunities for individual learning and development are understood by the participants in learning communities to be *connected to* and carried out in the service of larger agendas for school and social change.

Clearly, there is a relationship between teacher learning in communities and larger efforts to change the cultures of schools and teaching. However, the exact nature of the relationship of the part to the whole is not so clear. Hargreaves (1994) suggests that in many cases it is impossible to change school cultures without first providing school structures that enhance opportunities for collaboration and collegiality among teachers. There are many initiatives related to teacher learning that grow out of the knowledge-*of*-practice conception of teacher learning and the idea of inquiry as reform. The complexity of the change process is clear in our discussion in the following section of some of these initiatives.

Current Initiatives in Teacher Learning

The knowledge-*of*-practice relationship is implicit in many of the projects related to the current wave of interest in teacher research and other forms of practitioner inquiry in the United States (Cochran-Smith & Lytle, 1999).

The current U.S. movement, now a little more than a decade old,[4] involves a variety of local and national efforts to professionalize teaching and bring about educational change by enlarging the teacher's role – as decision maker, consultant, curriculum developer, analyst, activist, school leader. As we have pointed out elsewhere (Cochran-Smith & Lytle, 1998, in press), for example, the idea of teachers actively initiating and carrying out research in their own schools and classrooms is connected to programs of professional development and other strategies to professionalize teaching, to school and curricular improvement, to various school-based and school-system-wide restructuring and organizational changes, to challenges to the hegemony of a university-generated knowledge base for teaching, and to larger movements for social change and social justice.

In initiatives that are based on the knowledge-*of*-practice conception of teacher learning, the inquiry community is understood as the central context within which teacher learning occurs. Throughout this chapter, however, we have made it clear that the language and methods of "reflection," "cases," "coaching," and "mentoring" were not the defining characteristics of teacher learning initiatives based on the knowledge-*in*-practice relationship. Similarly, we want to make clear here that the language and methods of "teacher research," "action research," "networks," and "inquiry communities" do not define teacher learning initiatives based on the knowledge-*of*-practice relationship. Indeed, there are initiatives referred to as teacher study groups or action research projects or inquiry communities that are animated by each of the three conceptions of teacher learning outlined in this chapter. Some would argue that this is not possible – that an action research group based on the knowledge-*for*-practice relationship, for example, misunderstands the historical roots of action research and dilutes its necessarily political edge (e.g., Kincheloe, 1991; Noffke, 1997).

Historical roots notwithstanding, however, the fact is that terms like action research and teacher research have been widely appropriated and have come to mean many things as they are attached to various teacher learning initiatives and various educational purposes. Cochran-Smith and Lytle (1999), for example, suggest that teacher research has a protean shape, commenting that:

> in this sense, the growth of the teacher research movement hinges on a paradox: as it is used in the service of more and more agendas and even institutionalized in certain contexts, it is in danger of becoming anything and everything. As we know, however, anything and everything often lead in the end to nothing of consequence or power.

We are suggesting here that sorting out the "anything and everything" of inquiry communities is a matter of understanding the larger educational purposes and the images of knowledge, practice, and change to which they are attached rather than the language used to describe them or the

organizational innovations put into place. In teacher learning initiatives that derive from the knowledge-*of*-practice conception of learning, the point of action research groups or inquiry communities or teacher networks is to provide the social and intellectual contexts in which teachers at all points along the professional life span can take critical perspectives on their own assumptions as well as the theory and research of others and also jointly construct local knowledge that connects their work in schools to larger social and political issues.

The knowledge-*of*-practice conception of teacher learning is reflected in a number of efforts at the preservice level to make teacher learning more critical, including strategies that prompt prospective teachers to investigate their own autobiographies. Based on the assumption that teachers' conceptions of teaching are grounded in what Bullough and Gitlin (1995) call their "personal theories," a number of initiatives prompt students to think about who they are as teachers and students (e.g., Cochran-Smith, 1995a; Florio-Ruane, 1994; King & Ladson-Billings, 1990; Knowles, 1992; Knowles & Cole, 1996), particularly with regard to race, class, culture, ethnicity, language, and gender (e.g., Cochran-Smith, 1995a; Cochran-Smith & Lytle, 1992b; Florio-Ruane, 1994; Maher, 1991; Rosenberg, 1994; Sleeter, 1995; Zeichner, 1993).

A related initiative is the increasing use in preservice programs of critical reflections, ethnographies, teacher research, and action research (Adler, 1991; Beyer, 1988, 1991; Cochran-Smith, 1991b, 1994, 1995a, 1995b, in press; Cochran-Smith & Lytle, 1993; Goodman, 1991; Gore & Zeichner, 1991, l995; Tabachnick & Zeichner, 1991). In most of these situations, student teachers are guided to connect their own experiences to critical social, cultural, political, and economic theories and studies. Usually the learning context is the student teaching seminar or university methods or foundations class. The point is to raise questions about the social conditions of schooling as well as teachers' and students' understandings of the subject matter and the students they teach.

These initiatives in the education of preservice teachers are parallel to some versions of "self-studies" at the higher education level (e.g., Albert et al., 1997, 1998; Cole & Knowles, 1998; Zeichner, 1998; Zollers, Albert, & Cochran-Smith, 1998) wherein teacher educators rethink their own assumptions, teaching strategies, and, in many cases, missed opportunities to clarify or connect with students (Cochran-Smith, 1995b; Zeichner, 1998). As Zeichner (1998) points out, self-study of this kind has the potential to move us "beyond the slogans of critical, multicultural and feminist pedagogies in teacher education and the uncritical glorification of methodologies such as case pedagogies and narrative" (p. 40) and toward interrogation and reconstruction of practice. Similarly, Cole and Knowles (1998) assert that self-study fundamentally challenges the status quo of the academy.

In some preservice initiatives, there are efforts to transform program and course contexts into communities of learners and to link the learning of

preservice teachers with the learning of experienced teachers and teacher educators (Cochran-Smith, 1991a, 1994; Hursh, 1997; Zeichner & Miller, 1997). Cochran-Smith (1994, 1998, 1999) refers to this initiative as "teacher education as inquiry," a term intended to highlight the importance of the inquiry community. A student teacher, Mary Kate Cipriani (cited in Cochran-Smith, 1999), makes the point best:

> My salvation became the teacher communities I [was part of]. … The term "communities" is used broadly. … It includes the mornings when [other student teachers] would come by my classroom to ask mc questions. … It includes the ethnography paper group and the Sunday nights we spent beside [our professor's] fireplace wrenching and writh-ing over our journals and papers, looking for themes. It includes [my cooperating teacher] and me chatting about our students' academic behavior. … It includes dinners at |my supervisor's| house, classes at Penn, and special events like the Ethnography Forum and the AERA annual meeting … I am a teacher because we are a teacher community, and because we are a teacher community, I am a teacher.

In preservice initiatives that locate teacher learning inside communities, work is deliberately structured so that multiple viewpoints are represented, includ-ing reading research by school-based as well as university-based researchers and teachers. Time is allotted for groups to work together to hash out issues, write about their experiences, and share the data of their classrooms with one another. The key is that student teachers are socialized into teaching by becoming part of a community of researchers and learners who see question-ing as part of the task of teaching across the life span.

Initiatives such as those just described are often located inside particular programs, or they may happen as the result of one or two teacher educators working closely with one or two school-based colleagues. Professional devel-opment schools, on the other hand, are part of a much larger initiative that links teacher learning at the preservice and in-service levels. Very loosely con-nected to one another, professional development schools are intended to pro-vide new kinds of spaces for student teachers to learn along with experienced teachers as they construct knowledge of practice (Levine & Trachtman, 1997). The goal is in part the generation and dissemination of knowledge grounded in practice; in part to provide sites for the teaching, scholarship, and service of increasing numbers of regular university faculty; and in part to encourage school-based faculty to take on newly invented teaching roles at universities (Holmes Group, 1996) coupled with a larger role in policy decisions.

The establishment of professional development schools as major sites for teacher learning has enormous potential. Darling-Hammond (1994) asserts that

> professional development schools [PDSs] are creating entirely new frames for teacher learning – frames that provide opportunity for learn-ing by teaching, learning by doing, and learning by collaborating. These

enhance the learning of teacher educators, and veteran teachers as well as beginning teachers. ... PDSs are creating possibilities for building entirely new ways of knowing and kinds of knowledge for the profession as a whole, (p. 10)

As we have argued throughout this chapter, however, simply because initiatives are characterized by the same language – here the language of professional development schools – does not mean that they are driven by the same conception of teacher learning. There have been some 250 professional development schools created at various locations across the country (Abdal-Haaq, cited in Levine & Trachtman, 1997). What happens inside each of them – the roles of teachers as leaders or organizers, the views of knowledge and practice that are reflected, and the changes that are actually made in terms of contexts for teacher learning – is not consistent. Zeichner and Miller (1997) rightly warn that "we must be very cautious at this early point in the evolution of Professional Development Schools about uncritically embracing the PDS as a panacea for the ills of teacher education" (p. 29). Despite a common rhetoric, there are professional development schools driven by each of the conceptions of teacher learning that we have outlined in this chapter, and thus this major initiative in teacher education takes many forms and has many different meanings.

Many current initiatives based on the knowledge-*of*-practice conception of teacher learning focus on the work of experienced teachers. Increasingly, these initiatives take the form of local, regional, or national networks, what Lieberman and Grolnick (1996) argue are "problematic but powerful third spaces [that] are becoming an important force for reform in American education" (p. 45). Networks vary in purpose and character but have in common the creation of contexts for teachers to direct their own learning and to do so in ways more congruent with their professional lives (Lieberman & Grolnick, 1996; McLaughlin & Talbert, 1993). Although not all teacher networks subscribe implicitly or explicitly to a knowledge-*of*-practice view of teacher learning, there are many that give inquiry-based professional development and the creation of teacher research teams or teacher inquiry communities primacy among their approaches to teacher learning.

The widespread activities of the National Writing Project, which some argue is the most successful large-scale professional development initiative ever, and the Breadloaf School of English are strong examples. Here the focus has been on writing, language, and literacy: Knowledge is constructed collaboratively, teacher to teacher, in institutes and on-line networks established to provide intellectual communities for exploring the social, cultural, and political dimensions of teaching and learning over time. Both the Breadloaf Rural Teachers Network and the National Writing Project teacher research groups place considerable emphasis on inquiry-based pedagogies and co-constructing knowledge with students. Many Breadloaf teacher

researchers, for example, focus on teacher and student-generated collaborative and community-based projects that combine action research, service, and advocacy. Writing project teachers also intentionally widen their inquiries to include other stakeholders in school change such as administrators, counselors, tutors, social workers, parents, and community members. Here and in other literacy-related teacher inquiry initiatives (e.g., Gallas, 1998; Wells, 1994), emphasis is placed on written documentation as a critical aspect of teachers' and students' inquiries as well as on the significance of disseminating knowledge beyond the local setting through presentation and publication.

Another set of initiatives features the efforts of teachers to improve their knowledge and practice by documenting children's learning in school contexts; uncovering and clarifying their implicit assumptions about teaching, learning, and schooling; and solving a variety of school-based educational problems. Examples include the work of the North Dakota Study Group, the Prospect School teachers' institutes, and the Philadelphia Teachers' Learning Cooperative. As Carini (1986) points out, an important dimension of work of this kind has been the development of research and evaluation methods – primarily structured oral inquiry processes – that promote understanding of children's learning and both inform and are informed by teaching practices. Oral inquiry processes such as these represent teachers' self-conscious and often self-critical attempts to make sense of their daily work by talking about it in planned ways. The documentary processes developed by Carini and others at the Prospect School are theory-based, in that they emerge from a phenomenological view of knowledge and learning, as well as grounded theory, in that they provide a social context within which teachers together theorize their practice. The Prospect School Archive of Children's Work and its long-term records of teachers' deliberations serve as a living resource for the study of children's development and teacher learning over time.

The knowledge-*of*-practice conception of teacher learning is also evident in the rapidly increasing number of school- or district-based teacher inquiry communities that grow out of enduring school-university collaborative partnerships (Allen, Cary, & Delgado, 1995; Erickson & Christman, 1996; Hursh, 1997; Lytle et al., 1994; Lytle & Fecho, 1991; Michaels, 1998; Mohr & Maclean, 1987; Noffke et al., 1996; Wells, 1994). Describing the evolution of two elementary schools that "left the road most traveled," Allen, Cary, and Delgado (1995), for example, explore how teacher learning through inquiry is explicitly connected to the project of radically altering schools' discourse and decision-making processes related to teaching and learning. In many of these school-based initiatives, teacher learning occurs as a consequence of collegial efforts among teachers to identify critical school issues and to invent ecologically valid ways of collecting, analyzing, and interpreting site documents as well as interviews with colleagues, staff, parents, and students.

Learning to use data for collaborative decision making is thus both a cause and a consequence of changing school culture.

A related set of initiatives for the learning of experienced teachers has been the result of efforts to create new and innovative research units, arrangements, or configurations either as expanded dimensions of university-school collaborations or as targeted efforts of foundations. Each of the eight specifically literacy-related national centers established in the last 10–15 years, for example, generated a unique program for teacher research reflecting that center's particular priorities and research programs (Lytle, in press). Another instance is the Santa Barbara Discourse Group (Green & Dixon, 1994), an unusual community of teachers, researchers, and graduate students who share a concern with "understanding how everyday life in classrooms is constructed by members through their interactions, verbal and other, and how these constructions influence what students have opportunities to access, accomplish, and thus, 'learn' in schools" (p. 231). Although its primary goal is the generation of knowledge about classroom and school life, the composition of this community and its program of research provide unique opportunities for school- and university-based researchers to learn from each other's contexts and to make their learnings available to other teachers and teacher groups through publication and presentation. In a growing number of cases, teacher learning as knowledge-*of*-practice also goes hand in hand with concerted efforts at "co-reform" (Allen, Cary, & Delgado, 1995) and the constructive disruption of school and university culture (Lytle & Cochran-Smith, 1994).

A particularly interesting initiative related to the knowledge-*of*-practice conception of teacher learning is the dissemination and funding of teachers' and other practitioners' research as well as studies of teachers' learning in inquiry communities and/or professional networks, as we have pointed out elsewhere (Cochran-Smith & Lytle, 1999). Although not entirely, most of these accounts and analyses stem from a knowledge-*of*-practice conception of teacher learning. In addition to Heinemann-Boynton/Cook, the National Council of Teachers of English, and other presses that have published teachers' writing for years, many prominent educational journals and yearbooks now include teachers' accounts of their own research. For example, the *Harvard Educational Review, Language Arts,* the *English Journal, Teaching and Change,* and the *National Writing Project Quarterly* publish research by teachers as well as articles about many aspects of teacher research. A recent yearbook of the National Society for the Study of Education (Hollingsworth & Sockett, 1994) was devoted entirely to teacher research and educational reform; a new journal, *Teacher Research: A Journal of Classroom Inquiry,* coedited by Brenda Power and Ruth Hubbard, has been published semiannually by the University of Maine since 1993; and a new series, *Practitioner Inquiry,* edited by Marilyn Cochran-Smith and Susan Lytle, has been published by Teachers College Press since 1996. In addition, several major research foundations,

federal offices such as the Office of Educational Research Institute and the National Institute for Literacy, and professional organizations such as the National Council of Teachers of English and the International Reading Association support teacher research in various ways, including grants for teacher researchers and teacher research groups, as do some local school systems and public education funds. Among these, the Spencer Foundation has led the way by having as goals both supporting the work of inquiry communities and developing a body of research about teaching and learning that is grounded in practice. In addition, the MacArthur Foundation and the Spencer Foundation have together mounted a program of support for research on professional development. Many of these grants have been awarded for professional development initiatives that are based on a knowledge-*of*-practice conception of teacher learning.

In addition to increased funding for initiatives related to professional development, recent or forthcoming editions of major research handbooks include chapters that synthesize teacher research or practitioner inquiry efforts (see, for example, Burton, 1991; Henson, 1996; Lytle, in press; Zeichner & Noffke, in press). Finally, a growing number of national conferences focus exclusively on teacher research or include a significant number of teacher researchers as presenters. AERA, for example, has had an active special interest group focusing on teacher research since 1990. As mentioned previously, the Ethnography and Education Forum at the University of Pennsylvania has featured "Teacher Research Day" for more than a decade. An international conference on teacher research has been held annually at rotating sites in the United States for the last 7 years. And the National Council of Teachers of English has for many years included (and continues to include) a large number of teacher researchers in its annual national and regional programs. Finally, but not by any means less important, a large number of local and regional organizations both publish and feature teacher research at meetings and conferences.

Directions Forward: Inquiry as Stance

In the remainder of this chapter, we point to some of the significant issues about teacher learning raised by the conceptual framework suggested here. We do so by outlining the dimensions of a new construct that we have begun referring to as "inquiry as stance" (Cochran-Smith, 1998; Cochran-Smith & Lytle, 1998; Lytle, 1998).[5] This idea reflects our understanding and analysis of the three conceptions of teacher learning described in this chapter, particularly our efforts to contribute to and conceptualize the third, knowledge-*of*-practice. More specifically, the construct *inquiry as stance* emanates from a 3-year study of the relationships of inquiry, knowledge, and professional practice in urban inquiry communities. We offer a brief version of this construct

in the final section of the chapter because we think it points to some of the most provocative questions related to teacher learning in communities as we move into the 21st century.

Inquiry as Stance: Beyond Certainty in Teacher Learning

The construct *inquiry as stance* is intended to offer a closer understanding of the knowledge generated in inquiry communities, how inquiry relates to practice, and what teachers learn from inquiry. In everyday language, "stance" is used to describe body postures, particularly with regard to the position of the feet, as in sports or dance, and also to describe political positions, particularly their consistency (or the lack thereof) over time. In the discourse of qualitative research, "stance" is used to make visible and problematic the various perspectives through which researchers frame their questions, observations, and interpretations of data. In our work, we offer the term *inquiry as stance* to describe the positions teachers and others who work together in inquiry communities take toward knowledge and its relationships to practice. We use the metaphor of stance to suggest both orientational and positional ideas, to carry allusions to the physical placing of the body as well as to intellectual activities and perspectives over time. In this sense, the metaphor is intended to capture the ways we stand, the ways we see, and the lenses we see through. Teaching is a complex activity that occurs within webs of social, historical, cultural, and political significance. Across the life span, we assert that an inquiry stance provides a kind of grounding within the changing cultures of school reform and competing political agendas.

Inquiry as stance is distinct from the more common notion of inquiry as time-bounded project or discrete activity within a teacher education course or professional development workshop. Teachers and student teachers who take an inquiry stance work within inquiry communities to generate local knowledge, envision and theorize their practice, and interpret and interrogate the theory and research of others. Fundamental to this notion is the idea that the work of inquiry communities is both social and political; that is, it involves making problematic the current arrangements of schooling; the ways knowledge is constructed, evaluated, and used; and teachers' individual and collective roles in bringing about change. *Inquiry as stance* as a construct for understanding teacher learning in communities relies on a richer conception of knowledge than that allowed by the traditional formal knowledge-practical knowledge distinction, a richer conception of practice than that suggested in the aphorism that practice is practical, a richer conception of learning across the professional life span than concepts of expertise that differentiate expert teachers from novices, and a richer conception of the cultures of communities and educational purposes than those implicit in many widespread school-wide reforms.

Against Dualisms: Limitations of the Formal Knowledge-practical Knowledge Distinction

As we have pointed out, the knowledge-*for*-practice conception of teacher learning foregrounds formal knowledge as a base for improving practice, while the knowledge-*in*-practice relationship focuses on the importance of teachers' practical knowledge. Although these are strikingly different, both derive – or, as we have pointed out, are mistakenly taken to derive – from the distinction between formal and practical knowledge. As we have tried to show, while some of those who use the language of practical knowledge are calling for new epistemologies, others take as basic premises (a) that it is possible to delineate two kinds of knowledge for teaching, (b) that this distinction accounts for the universe of knowledge types in understanding teaching, and (c) that the practical knowledge concept adequately captures the work of teachers and the activity of teaching. This distinction works to maintain the hegemony of university-generated knowledge for teaching and carries with it the same power and status differentials associated with the disconnections of basic from applied research and theory from practice. It follows, then, that from the perspective of the formal knowledge-practical knowledge distinction, practical knowledge is in some senses low-status knowledge – bounded by the everyday, excessively local and particular, and possibly trivial. These implications serve to reify divisions that keep teachers "in their place" – the separation of practitioners from researchers, doers from thinkers, actors from analysts, and actions from ideas.

The formal knowledge-practical knowledge distinction is a dualism that has been part of epistemological discussions for years, although, we have shown, a number of scholars have called for "new epistemologies" that would better serve the knowledge needs of teachers and other practitioners and, in doing so, have contested the ideological, political, and social systems of the academy (e.g., Grimmett & Neufeld, 1994; Schon, 1995). This effort to break with the dominant epistemology has led to the development of some of the rich conceptions of practical knowledge described earlier. However, in many instances, scholars who claim to accept the possibility of "new epistemologies" have continued to impose on these new conceptions the distinctions and conventions of the old. As we have argued in more detail elsewhere (Cochran-Smith & Lytle, 1998), for example, Fenstermacher (1994) argues that it is essential to make very careful distinctions whenever the word *knowledge* is used to describe teachers' "mental states." He insists that if practical knowledge is to be considered real knowledge, then its epistemic claims (even in a new epistemology of practice) need to be born of a science "analogous to the science that yields formal knowledge" (p. 48). Along very similar lines, Huberman (1996) raises questions about the value of knowledge generated through inquiry or teacher research. He argues that if teacher

researchers are not abiding by the established rules and not transcending the biases and perceptions of participants, then there is little possibility (and, Huberman would claim, little evidence) for the creation of a distinctive body of knowledge generated through inquiry. We think that part of what is happening in these critiques is what has often happened when new voices and modes of discourse push their way into existing conversations about ways of knowing, as Smith (1997) has skillfully pointed out in a discussion of the "stories researchers tell about themselves." Those located squarely inside the dominant epistemological and methodological paradigms use established terms, conventions, standards, and definitions to evaluate, and essentially dismiss, alternative ones (Cochran-Smith & Lytle, 1998). The concept *inquiry as stance* does not follow from the formal knowledge-practical knowledge distinction; rather, it emphasizes the importance of local knowledge that may also be useful to a more public educational community.

Teaching as Praxis: Beyond the Idea that Practice is Practical

In teaching, the term *practice* has typically been used to refer to doing, acting, carrying out, and/or performing the work of the profession. Often this term is juxtaposed with the terms *theory* and *research* to suggest both relationships and disconnections – as in the common phrases putting theory into practice and translating research for practice and/or in the complaints that something is too theoretical, not practical enough, or, quite to the contrary, only practical and even anti-intellectual. These phrases seem to equate practice with that which is practical (Britzman, 1991), or useful, immediate, functional, and concerned with the everyday. From the perspective of *inquiry as stance,* however, neither the activity of teaching nor inquiry about teaching are captured by the notion that practice is practical. Rather, teaching and thus teacher learning are centrally about forming and re-forming frameworks for understanding practice: how students and their teachers construct the curriculum, co-mingling their experiences, their cultural and linguistic resources, and their interpretive frameworks; how teachers' actions are infused with complex and multilayered understandings of learners, culture, class, gender, literacies, social issues, institutions, histories, communities, materials, texts, and curricula; and how teachers work together to develop and alter their questions and interpretive frameworks informed not only by thoughtful consideration of the immediate situation and the particular students they teach and have taught but also by the multiple contexts within which they work.

Our idea of *inquiry as stance* is intended to capture some of the nature and extent to which those who teach and learn from teaching by engaging in inquiry interpret and theorize what they are doing. As we have pointed out (Cochran-Smith & Lytle, 1998), this problem is nicely explicated in the writing of McEwen (1991), who in turn draws on Carr's (1987) analysis of educational practice:

Past efforts to understand the concept of practice within the field of education have tended to follow the natural sciences model in which theorizing is regarded as something distinct from the phenomena studied. In this view, practice is held to be, in itself, an atheoretical object – something theories are about rather than something that is inherently theoretical. The aim of theorizing according to the natural sciences model is to gain greater technical control over the phenomenal world. Thus, the concept of practice has become fixed in our minds as inhabiting the phenomenal world rather than the theoretical world. But to make such a division between theory and practice is to misunderstand the nature of practice. ... By making the twin assumptions that all theory is non-practical and all practice is non-theoretical, this approach always underestimates the extent to which those engaged in educational practices have to reflect upon, and hence theorize, what, in general, they are trying to do. (pp. 13–14)

McEwen's commentary makes it clear that it is limiting to regard practice as primarily practical. A more generative conception is of "teaching as praxis," that is, the idea that teaching involves a dialectical relationship between critical theorizing and action (Britzman, 1991; Freire, 1970). The point here is that teachers theorize all the time, negotiating between their classrooms and school life as they struggle to make their daily work connect to larger movements for equity and social change.

Local Knowledge: Toward Constructing Interpretive Frameworks

We have suggested elsewhere that it is possible and indeed quite useful to talk about knowledge of teaching in ways that break with the traditional formal-practical knowledge distinction and that teachers' work in inquiry communities generates knowledge of teaching that is both local and public (Cochran-Smith & Lytle, 1998; Lytle & Cochran-Smith, 1992). Our local-public conception does not posit two kinds of knowledge analogous in any way to the distinction made between practical and formal knowledge. Rather, borrowing Geertz's (1983) term, we use *local knowledge* to signal both a way of knowing about teaching and what teachers and communities come to know when they build knowledge collaboratively. In his volume of essays on interpretive anthropology, Geertz talks about the difficulties involved in representing emic or insider knowledge and meaning perspectives. He suggests that ultimately anthropologists cannot really represent local knowledge, or what native inhabitants see, but only what they see through, that is, their interpretive perspectives on their own experiences.

What we are suggesting here is that representing teachers' local knowledge is similarly complicated. Using the phrase local knowledge, however, foregrounds the processes (not the products) of knowledge construction as

they are expressed in and integrated with daily life in schools and classrooms and emphasizes the link of knower to that which is known and the context in which it is known. In this sense, constructing local knowledge is understood to be a process of building, interrogating, elaborating, and critiquing conceptual frameworks that link action and problem posing to the immediate context as well as to larger social, cultural, and political issues. Implicit in this process is a set of questions that function as lenses for seeing and making sense of practice broadly construed: Who am I as a teacher? What am I assuming about this child, this group, this community? What sense are my students making of what is going on in the classroom? How do the frameworks and research of others inform my own understandings? What are the underlying assumptions of these materials, texts, tests, curriculum frameworks, and school reporting documents? What am I trying to make happen here and why? How do my efforts as an individual teacher connect to the efforts of the community and to larger agendas for school and social change? When inquiry communities attempt to present and represent local knowledge of practice, their efforts invoke complex and provocative questions of ethics, access, and research methods that merit careful attention.

Learning Across the Life Span: Beyond the Expert-Novice Distinction

The knowledge-*for*-practice and the knowledge-*in*-practice conceptions of teacher learning pivot on a notion of expertise in teaching and the role of expertise in the improvement of practice. This notion reflects a methodological approach that is prominent in cognitive psychology and often used to study differences between expert and novice performances in a variety of areas. From the perspective of the knowledge-*for*-practice conception of teacher learning, the expert teacher is one with knowledge of the formal knowledge base generated or codified by university-based researchers. The expert teacher is expected constantly to update her or his knowledge of the knowledge base and adeptly follow the demonstrations and models of others. From the perspective of knowledge-*in*-practice, on the other hand, the expert teacher is defined as one who is able to articulate and make explicit the knowledge implicit in wise action and also to articulate this knowledge for novices or less accomplished teachers. Novice teachers, on the other hand, are expected to learn effective practices by imitating the strategies of their more competent colleagues. In each case, teacher learning is seen as a process of moving away from the status of novice to that of expert.

Implicit in the construct of *inquiry as stance* is a different conception of teacher learning across the professional life span than that implied by the expert-novice distinction. Learning from teaching through inquiry across the

professional life span assumes that beginning and experienced teachers need to engage in similar intellectual work. Working together in communities, both new and more experienced teachers pose problems, identify discrepancies between theories and practices, challenge common routines, draw on the work of others for generative frameworks, and attempt to make visible much of that which is taken for granted about teaching and learning. From an inquiry stance, teachers search for significant questions as much as they engage in problem solving. They count on other teachers for alternative viewpoints on their work. In a very real sense, the usual connotation of "expertise" is inconsistent with the image of the teacher as lifelong learner and inquirer. Expertise implies certainty and state-of-the-art practice. Lifelong learning, on the other hand, implies tentativeness and practice that is sensitive to particular and local histories, cultures, and communities. The expert-novice distinction serves to maintain the individual in-the-head model of teacher learning that highlights individual differences among teachers. An across-the-life-span perspective on teacher learning is more relational – making salient the role of communities and intellectual projects of groups of teachers over time.

The Ends Question: Teacher Learning for What?

Inquiry as stance depends on the idea that knowing more and teaching better are inextricably linked to larger questions about the ends of teacher learning: What are or should be its purposes and consequences? Who makes decisions about these purposes and consequences? In what ways do particular initiatives for teacher learning challenge and/or sustain the status quo? What are the consequences of teachers' learning for students' learning? What part does teacher learning play in school reform? How is teacher learning connected to larger social, political, and intellectual movements? The most significant questions about the purposes and consequences of teacher learning are connected to teacher agency and ownership.

When wholesale participation in teacher learning initiatives is mandated at the school or school system level, or when teacher learning is scripted in certain ways, it becomes a substitute for grass-roots change efforts. In these instances, teacher learning becomes "simply" professional development – the production of a time- and place-bounded project or individual personal growth. When this happens, teacher learning functions as an end in itself. To the extent that teacher learning initiatives fit comfortably with a district's stated commitment to teacher leadership, site-based management, or curricular revision, for example, they can be regarded as at least compatible with, if not central to, ongoing efforts to improve schools. To the extent that teacher learning initiatives fit comfortably with a university or school district's institutional agenda for reflective practice, increased professionalism, and teacher accountability,

they can be regarded as compatible with ongoing efforts toward professional development. But sometimes – if they work from an inquiry stance – teachers begin to challenge and then alter or dismantle fundamental practices such as tracking, teacher assignment, promotion and retention policies, testing and assessment, textbook selection, school-community-family relationships, administrator roles, personnel decisions, and school safety, not to mention raising questions about what counts as teaching and learning in classrooms. Sometimes teachers begin to reinvent their own job descriptions. They critique and seek to alter cultures of collegiality; ways that school or program structures promote or undermine collaboration; ratios of teacher autonomy to teacher responsibility; norms of teacher evaluation; relationships among student teachers, teachers, and their university colleagues; and the ways power is exercised in teacher-to-teacher, mentor-to-teacher, and school-university partnerships.

What this suggests to us is that there are starkly different kinds of teacher learning initiatives that feature what is referred to as inquiry – some that are readily integrated into the existing social and institutional arrangements of schools and school systems and others that are not. From the perspective of *inquiry as stance,* teacher learning is associated more with uncertainty than certainty, more with posing problems and dilemmas than with solving them, and also with the recognition that inquiry both stems from and generates questions. In many situations, "questioning" and "challenging the system" are rather difficult to explain as the consequences of inquiry-based teacher learning initiatives, and yet these may be precisely the kinds of consequences that are connected to more democratic schooling and to the formation of a more just society.

Inquiry as Agency: The Culture of Community

When teachers work in inquiry communities, they enter with others into "a common search" for meaning in their work lives (Westerhoff, 1987). The cultures of inquiry communities have several salient dimensions. Among them, time is one of the most critical. When groups of teachers come together as researchers, they need sufficient chunks of time in which to work and sufficient longevity as a group over time. When the pace of a community's work is unhurried and when members of the group make a commitment to work through complicated issues over time, ideas have a chance to incubate and develop, trust builds in the group, and participants feel comfortable raising sensitive issues and risking self-revelation. Over time, communities that support inquiry develop their own histories and in a certain sense their own culture – a common discourse, shared experiences that function as touchstones, and a set of procedures that provide structure and form for continued experience.

Another important dimension of the formation and maintenance of inquiry communities is the nature of the discourse – particular ways of describing, discussing, and debating teaching. In communities where inquiry is stance, groups of teachers and student teachers engage in joint construction of knowledge through conversation and other forms of collaborative analysis and interpretation. Through talk and writing, they make their tacit knowledge more visible, call into question assumptions about common practices, and generate data that make possible the consideration of alternatives. Part of the culture of inquiry communities is that rich descriptive talk and writing help make visible and accessible the day-to-day events, norms, and practices of teaching and learning and the ways different teachers, students, administrators, and families understand them. In this way, participants conjointly uncover relationships between concrete cases and more general issues and constructs. In addition, texts themselves play a critical role in forming and maintaining communities with an inquiry stance. Inquiry communities use a wide range of texts, not all of which are published or disseminated but are essential to teachers' individual and collective gathering, recording, and analyzing of data. These include reports and accounts of teacher researchers, action researchers, and other practitioners as well as selections from the extensive theoretical and research literatures in the many fields related to teaching, learning, and schooling.

The notion of *inquiry as stance* is intended to problematize the roles teachers play in designing and implementing initiatives for their own learning. When groups of teachers and others come together to learn, there are issues related to negotiating the agenda, sharing power and decision making, representing the work of the group, and dealing with the inevitable tensions of individual and collective purposes and viewpoints. These issues are seldom self-evident but always present. How and whether they are surfaced and dealt with indelibly shape the group and either circumscribe or open up its possibilities for productive work over time.

From an inquiry stance, teacher leadership and group membership look very different from what they look like when teachers are "trained" in workshops or staff development projects. Taking an inquiry stance on leadership means that teachers challenge the purposes and underlying assumptions of educational change efforts rather than simply helping to specify or carry out the most effective methods for predetermined ends. From the perspective of *inquiry as stance,* there is an activist aspect to teacher leadership that is closely linked to the expanded notion of practice we described in the third conception of teacher learning, knowledge-*of*-practice. From this perspective, inquiry communities exist to make consequential changes in the lives of teachers and, as important, in the lives of students and in the social and intellectual climate of schools and schooling.

It is our hope that the framework for understanding teacher learning presented in this chapter will support a different discourse about what it means

when variously positioned reformers and policymakers advocate that teachers today need to know more to teach better. As we hope we have made clear, there are contrasting interpretations of what this relatively "simple" idea means. Beyond providing a sense of the range and variation of interpretations, however, a conceptual framework that interrogates underlying images of knowledge, practice, and their complex interrelationships exposes a number of provocative issues about the whole topic of teacher learning and the role of communities. These issues are at once subtle, in that very different meanings are often embedded beneath the surface of similar language and structures, and also striking, in that the differences are enormously significant for how teachers understand and position themselves in various initiatives for school improvement as well as how universities and other educational institutions position teachers and teacher learning in relation to change. The idea of *inquiry as stance* is intended to emphasize that teacher learning for the next century needs to be understood not primarily as individual professional accomplishment but as a long-term collective project with a democratic agenda.

Notes

1. A 3-year study of the relationships of inquiry to teachers' professional knowledge and practice across the professional teaching life span was supported by a Spencer Foundation grant to Marilyn Cochran-Smith and Susan L. Lytle. The study involved case studies of individual teacher researchers as well as teacher researcher groups, all of whom worked within the context of local and larger inquiry communities.
2. See Cochran-Smith and Lytle (1998) for a lengthy discussion of these issues and a critique of the arguments offered by Fenstermacher and Huberman.
3. This is also true of some teacher learning initiatives animated by the second conception that have become more or less subsumed by the third as the emphasis has shifted from the pedagogy of individual teachers to larger and more collaborative consideration of pedagogical and political contexts (P. Grimmett, personal communication, September 1998).
4. We refer here only to the latest wave of interest in teacher research in the United States, which was marked roughly a decade ago by a number of key publications and events, rather than to the long history of the roots and relatives of teacher research in the United States and across the world.
5. This concept is more fully described in our forthcoming book from Teachers College Press, *Inquiry as Stance.*

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