

1986

Identifying behaviors of the master teacher

Thomas F. Allen
Iowa State University

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IDENTIFYING BEHAVIORS OF THE MASTER TEACHER

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Identifying behaviors of the master teacher

by

Thomas F. Allen

**A Dissertation Submitted to the
Graduate Faculty in Partial Fulfillment of the
Requirements for the Degree of
DOCTOR OF PHILOSOPHY**

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SYMBOLS FOR TABLE INTERPRETATION

Ar	- Arizona
Ak	- Arkansas
Ca	- California
Fl	- Florida
Ga	- Georgia
Ky	- Kentucky
Mo	- Missouri
NC	- North Carolina
NJ	- New Jersey
SC	- South Carolina
SD	- South Dakota
Tn	- Tennessee
Tx	- Texas
Ut	- Utah
WV	- West Virginia
Eff	- Effective Teaching
Pems	- Performance Element Modules
Tams	- Teaching Assessment Modules
Benn	- Benningfield et al.

CHAPTER 1--INTRODUCTION

Major reports have pointed to a decline in the quality of education that have triggered major reform actions (Toch, 1983). The National Commission on Excellence in Education challenged educators in the report, A Nation at Risk:

Our Nation is at risk . . . the educational foundations of our society are presently being eroded by a rising tide of mediocrity that threatens our very future as a nation and a people. . . . If an unfriendly foreign power had attempted to impose on America the mediocre performance that exists today, we might well have viewed it as an act of war. As it stands, we have allowed this to happen to ourselves (1983, p. 5).

Former U.S. Secretary Terrence Bell (1983) felt that America is at the point of being overtaken by its competitors. American students no longer compare favorably in achievement measures with students in other countries (Bell, 1983; Boyer, 1983). Concerns of the public have been addressed through a variety of reports and recommendations. Some of these reports include The Paideia Proposal, Educating Americans for the 21st Century, Meeting the Need for Quality, Action in the South, and Making the Grade (Education Commission of the States, 1983). Shanker (1983) and Bell (1983) encourage the establishment of higher teacher salaries, the expansion of the school day and year, more parental involvement, and the improvement of teachers as means to achieve excellence in education.

The variety of recommendations for changes and school improvement have prompted various actions by State legislatures. As early as June 22, 1983, governors sought to recognize teachers, promote a higher regard for teachers, and establish procedures that differentiate good teaching

from inadequate teaching (Brown, 1983). Thirty-eight states have initiated or are considering major state reforms involving career ladder and/or master teacher plans (Education Week, 1985a). Twenty-six states have already passed legislation to reward outstanding performance through incentives (Cornett and Weeks, 1985b).

Bell (1983) proclaimed the need to develop master teacher plans that include performance evaluation criteria. Shanker, at the 1985 American Federation of Teacher's Convention, proposed to identify master teachers by using board examinations similar to those used for medical specialists. Every state that has passed legislation to adopt incentive plans are developing performance appraisal criteria to identify outstanding performance. Developing those criteria could be the most difficult task that states will face as they develop incentive plans (Association of Teacher Educators, 1985).

For more than seventy-five years, researchers have sought to define teacher effectiveness without much success. Efforts have been too narrow and have failed to establish a relationship between teaching and learning (Medley, 1982). Approximately 1975, a major shift of attention in research on teaching took place (Manatt and Stow, 1984). Researchers were able to establish clear relationships between teaching behaviors and student outcomes (Brophy and Evertson, 1976). By observing classroom learning situations, researchers were able to identify instructional and learning conditions that have maximal effect on student achievement, interest, and attitudes. These findings provide cues that help to identify and formulate behaviors of the master teacher in the current

research. At least, the current research suggests that we now have "answers that are much more useful" for selecting criteria to evaluate teacher performance (Manatt and Stow, 1984). In terms of the "master teacher," this person would be expected to perform at superior levels for all established criteria for effective teaching. These persons must also be "willing to share their expertise and assist in the professional development of other teachers" (Association of Teacher Educators, 1985). Furthermore, most state reform proposals indicate that master teachers must perform additional responsibilities. This includes superior skills in subject matter and general knowledge, teaching ability, and interpersonal relations.

The difficulty, obviously, is defining what is superior performance as contrasted to "good" performance or merely "satisfactory" performance. The state of Texas used the term "clearly outstanding" for its master teacher level, but also mandated a performance level of "exceeds expectations" to be inserted between "satisfactory" and "clearly outstanding." This presents a very difficult decision for principals and other teacher evaluators to make.

Statement of the Problem

Proposals for performance-based incentive programs are a response to the criticism that has been generated through the media regarding the decline in student scores, the current and pending shortages in the supply of qualified teachers, the academic ability of forthcoming candidates entering the teaching field, and the need to upgrade teacher skills.

These measures are intended to improve the quality of teaching and the image of the educational profession, to retain good teachers, to provide recognition and incentives, and to improve instruction that will produce gains in student performance.

A number of reviews about teacher incentive plans have been published (American Association of School Administrators, 1984; Astuto and Clark, 1985; Educational Research Service, 1979, 1983; Hatry and Greiner, 1984; Jordan and Borkow, 1983; Robinson, 1983, 1984; Teacher Incentives, 1984). As the reviews all note, there is no conclusive evidence regarding the effects of these measures. In the review of Rosenholtz and Smylie (1983), these researchers found that teacher attrition is most related to teaching conditions that undermine the teacher's ability to do an effective job, not lack of money. Conditions that diminish the opportunity for professional growth, provide inadequate preparation time, create administrator-teacher conflict, and provide no support for teachers to deal effectively with student misbehavior can result in teachers leaving the profession. Job satisfaction can be created if professional alternatives are available and feasible (Rosenholtz, 1984). Opportunities for leadership and professional recognition seem to enhance the retention of outstanding teachers (Chapman and Hutcheson, 1982; Rosenholtz, 1984; Rosenholtz and Smylie, 1983).

With the added pressure from political leaders to require merit or incentive pay to be required for increased school funding, differences exist in the options that are available to create performance-based incentive programs. Merit pay plans focus on recognizing and rewarding

teachers who perform well with financial incentives. Although past experiences with merit pay have failed (ERS, 1979), there remain strong arguments supporting this incentive (AASA, 1984; Astuto and Clark, 1985; ERS, 1979, 1983; Hatry and Greiner, 1984; Jordan and Borkow, 1983):

1. The plan will publicly recognize outstanding teachers and that may boost morale by letting teachers know they are appreciated.
2. The plan in itself may increase public confidence in the schools by stimulating positive perceptions of teachers.
3. The plan may inspire teachers to work harder in order to earn additional pay and recognition.

It has been a long-standing position of the American Federation of Teachers (AFT) and the National Education Association (NEA) to oppose merit pay. Besides, existing research (AASA, 1984; Astuto and Clark, 1985; ERS, 1979, 1983; Hatry and Greiner, 1984; Jordan and Borkow, 1983; Robinson, 1983, 1984) presents opposing views to merit pay plans including:

1. There is little evidence that money, by itself, is a primary motivator of teachers. Rosenholtz (1984) emphasizes that higher salaries may attract more to the profession, but suggests that money alone will not retain better teachers.
2. There is little evidence that teachers who do not receive merit pay are motivated to do a better job as a result of a merit pay program.
3. Traditional merit pay programs sometimes cause competition

rather than cooperation among teachers.

4. The long-term value of merit pay is lessened when teachers may receive an award one year and not the next. If the same teachers receive awards annually, the incentives for other teachers are lessened.
5. Teacher evaluation procedures have caused difficulty in determining who deserves extra pay. There is not only a lack of reliability and validity in evaluation, but also insufficient data to support ratings (ERS, 1979). Most incentive plans have failed because of the inability to define superior performance (Robinson, 1984).
6. Administrative difficulties, morale problems, evaluator training, and financial problems have caused merit plans to fail.

Besides merit pay plans, master teacher plans and career ladder plans are additional incentives being considered by states. Master teacher plans involve experienced teachers who are judged as highly outstanding by their peers and administrators in specific duties. These programs recognize and reward excellent teaching performance and provide opportunities for professional growth. Teachers have released time or extended contracts with an additional stipend for performing particular tasks, such as assisting new teachers and teachers who are having difficulty, developing inservice activities, or conducting projects (Wise et al., 1984). California's new mentor teacher program, which awards salary stipends to outstanding teachers who assist new teachers, is one example. Such teachers hold permanent

certification, have substantial classroom experience, and have demonstrated exemplary teaching ability, as indicated by, among other things, effective communication skills, subject-matter knowledge, and mastery of a range of teaching strategies necessary to meet the needs of people in different contexts (Pipho, 1983).

Similar to master teacher plans are career ladder plans that provide forms of recognition with differentiated pay featuring several career steps (provisional, career teacher, master teacher). Promotions are based on performance criteria which are accompanied by large salary increases. Like master teacher plans, additional responsibilities are included in every step advancement.

Proponents of these incentives argue that master teachers could provide intensive assistance to new teachers and others who need additional help which administrators do not have time or expertise to offer (Wise et al., 1984). Manatt (1984) sees intensive assistance as "a team effort bringing to bear the skills, knowledge, and time of several supervisory personnel." There appears greater support for these kinds of incentives as compared to merit pay plans. Arguments supporting this measure include (AASA, 1984; ERS, 1979, 1983; Hatry and Greiner, 1984; Jordan and Borkow, 1983):

1. By creating a master teacher plan, this provides recognition for expert, experienced teachers while allowing them new professional growth opportunities.
2. As master teachers use released time to assist other teachers to improve, the quality of instruction will improve.

3. The use of master teachers will improve the overall evaluation system because school administrators are burdened with other duties that lessen his/her supervisory responsibilities. Added mechanisms would exist for providing help when needs are identified.
4. The financial and professional incentives are much more stable than an annual determination of a merit pay bonus.
5. Public support may increase because noteworthy teachers would be used to improve teacher evaluation and instruction.
6. Differentiated staff plans do not create staff divisiveness and are not as difficult to administer as traditional merit pay plans.

Opposing views to this kind of performance-based incentive include:

1. A master teacher plan does not recognize all excellent teachers and not all good teachers want additional responsibilities.
2. A master teacher plan may require teachers to perform in a quasi-administrative capacity unless duties are critically defined to include only teacher functions.
3. Good teachers may be removed from the classroom unless specific provisions are made that require a majority of their time to be spent teaching.

Regardless of the measures intended to improve the quality of teaching and the image of the educational profession, states must cautiously approach the many elements involved in a plan's design and implementation (ATE, 1985; Astuto and Clark, 1985; Cornett and Weeks, 1985b; Hatry and

Greiner, 1984). States must plan carefully and thoroughly to avoid problems. If each district in the state of California exercised its right to name up to five percent of that total number of teachers in their district to serve as mentor teachers (Pipho, 1983) without overcoming some of the pitfalls that result from poor planning, efforts to improve the quality of teaching in California may be in vain. One example would be to define the role of curriculum and supervisory personnel in relation to the role expected of master teachers. An array of policies must be developed in order to set job expectations (McNeely, 1984).

Although many states are actively promoting performance-based incentive plans, assertions have been made causing controversy in defining effective teaching. Because of the confusion and complexity in teaching, some researchers are unable to define or measure teacher competence (Biddle and Ellena, 1964; Johnson, 1984) and believe that no consensus exists defining competent teaching. These variations have caused some researchers to discontinue their interest in evaluating teachers (Newcombe, 1983), supporting the reasoning of Broudy (1969) that teaching can be defined any way that seems suitable. Rosenshine and Furst (1971) were puzzled that teacher preparation programs used different criteria to train teachers, especially, when they were able to select eleven variables from forty-two studies as potential criteria for effective teaching. However, the findings of Rosenshine and Furst were also challenged by Heath and Nielson (1974) who based their rebuttal on the following:

1. One-third of the eleven variables did not relate.
2. Only five of the seventy-eight citations were well-controlled from which the eleven variables were collected.
3. Of the seventy-eight citations, forty-five claimed no significant relationship between the variables and student achievement.
4. In all forty-two studies, the research procedures were flawed. In addition, subject matter and students' age were not controlled variables in any of the studies.

Assertions have also been made supporting a conception of teaching that can be used in defining effective teaching. Issler (1983) believes that a conception of teaching is necessary for teachers, evaluators, and researchers. More importantly, a conception of excellence in teaching can define those behaviors that can be used to determine the "best" teachers who might be termed "master teachers."

There exists evidence defining effective teacher behaviors that produce student gains in achievement (Berliner and Tikunoff, 1976; Brophy, 1979; Brophy and Evertson, 1976; Dunkin and Biddle, 1974; Good and Brophy, 1984; Manatt and Stow, 1984; Medley, 1979a; Peterson and Walberg, 1979; Rosenshine, 1971; Rosenshine and Furst, 1971). A number of reviews has been recognized in promoting a base for teacher effectiveness research (Dunkin and Biddle, 1974; Good et al., 1975; Medley, 1979a; Rosenshine, 1971) which serve as foundations defining behaviors of the master teacher.

This exploratory study was conducted to develop a list of behaviors to be used as a source to define the master teacher. Special emphasis

was placed on the criteria used by states which have passed legislation to adopt career ladder plans for teacher performance, competencies in Pro*file (a list of teaching competencies used in pre-service teacher education at Iowa State University), and behaviors gathered from effective teaching research. Lists of behaviors were cross-tabulated in order to find consistencies that may be used in defining the master teacher. More specifically, the following questions were posed:

1. What behaviors can be identified from the research on effective teaching to define the master teacher?
2. What related studies can be used to determine the identification of the master teacher?
3. What behaviors can be used from the Iowa State University (ISU) system "Pro*file" to determine the identification of the master teacher?
4. What behaviors listed on state teacher evaluation instruments can be used to determine the identification of the master teacher from those states that have passed legislation to adopt career ladder plans?
5. What behaviors from states providing guidelines for teacher performance can be used to determine the identification of the master teacher that have passed legislation to adopt career ladder plans?
6. Are there any differences in the behaviors generated from the review on effective teaching to those behaviors in Pro*file and those behaviors from the states that have passed legislation to

- adopt career ladder plans?
7. Are there any similarities in the behaviors generated from the review on effective teaching to those behaviors in Pro*file and those behaviors from the states that have passed legislation in defining the master teacher?
 8. Are there any similarities in the classification scheme for listing behaviors that can be found in the research from the sources used in this study to define the master teacher?
 9. Are there any differences among states that have statewide criteria that can be used to define the master teacher?
 10. Are there any states that have developed criteria to recognize the master teacher?
 11. What were the factors causing states to endorse a career ladder concept?

Purpose

In creating a profile of behaviors to define the master teacher, special attention will be placed on behaviors that appear to be the same from the three sources used in this study that include: behaviors in career ladder plans, competencies in Pro*file, and behaviors from effective teaching that are valid (behaviors that are substantiated from researchers), reliable (results are the same based on a large number of evaluators), and legally discriminating (judgments can be made to differentiate high performance from low performance). Thus, the purpose of this study is to:

1. develop a list of teacher behaviors based on a review of literature that can be used to define the master teacher.
2. identify factors that have caused states to consider adopting career ladder systems.
3. determine which criteria in career ladder plans can be used to define the master teacher.
4. review the Pro*file system and determine which behaviors expected of candidates who prepare themselves as teachers can be used to identify the master teacher.
5. determine if any other studies have been conducted to define behaviors of the master teacher.
6. determine which guidelines in states that are considering the adoption of career ladder systems can be used to define the master teacher.
7. provide information about master teacher behaviors that will assist states as they develop performance appraisal systems to recognize and reward teachers through performance-based incentive plans.

Objectives

More specifically, the following objectives were posed to accomplish the task of creating a profile of the master teacher.

1. Determine, among a variety of teaching behaviors, a list of behaviors that will be limited to the master teacher from the research on effective teaching.

2. Select states that have passed legislation adopting career ladder plans and analyze their performance appraisal criteria.
3. Review the ISU Pro*file system that prepares candidates pursuing a teaching career and select behaviors that can be used to define the master teacher.
4. Compare and contrast those teaching behaviors among the sources used in this study and identify those that are consistent among all groups.
5. Determine the distinction between the master teacher and the effective teacher.
6. Identify the causes for states to adopt career ladder plans.
7. Select criteria from the sources used in this study and determine which characteristics can be used to define the master teacher.

Basic Assumptions

This study was based upon the following assumptions:

1. The conception of exemplary teaching can be defined from the current body of research that is available on effective teaching.
2. Master teacher performance can be measured in terms of those teaching behaviors that define the outstanding teacher.
3. The criteria from performance appraisal systems in career ladder plans can be used to define outstanding performance.
4. The roles defined in performance incentive plans require master

- teachers to possess skills beyond that of the effective teacher.
5. Many competencies from Pro*file can be used to define the master teacher.
 6. Performance-based incentive plans that include a master teacher level can use the criteria from this study to recognize and reward those teachers who demonstrate the behaviors of the master teacher.

Delimitations

This exploratory study was intended to generate knowledge about the behaviors of the master teacher from three distinct sources: effective teaching research, the ISU Pro*file system, and states that have passed legislation endorsing career ladder plans. No attempt will be made to provide an in-depth analysis of merit pay, master teacher and/or career ladder plans, or teacher training programs. Although some local school districts have been recognized as innovators in designing performance incentive measures and may have criteria to define the "master teacher," local school districts were not used as a source for review.

This exploratory study was also intended to identify factors that caused states to endorse a career ladder concept. This information will be sought from resource persons who have knowledge that pertains to this development.

Definition of Terms

Behavior - the action taken by a teacher that influences student learning in a positive way.

Career ladder - a performance incentive plan which is designed to provide recognition with differentiated pay featuring several career steps with additional responsibilities.

Competency - the ability to perform at or above predetermined criterion levels.

Competencies - term used to signify behaviors listed as characteristics of effective performance for those candidates seeking to become future teachers at Iowa State University (ISU) in the teacher education system, Pro*file.

Criterion - a standard for use in making judgments concerning the quality of performance that is applied uniformly in defining outstanding characteristics.

Differentiated staff plans - additional duties that teachers perform, usually noninstructional, instead of all or a part of the classroom teaching assignment.

Effective performance - the level of performance toward which all teachers should strive as established by the school district for effective teaching.

Evaluation system - procedures developed which provide fair, objective, and consistent analysis of teaching performance.

Excellence - the ability to perform in a superior manner (higher than expected for effective teaching) on all types of performance that have been established as criteria.

Guidelines - recommendations that describe good practice and suggest procedures which should be taken into account for evaluating

teacher performance.

Master teacher - instructional leader (teacher) who performs superior at all levels that have been established as criteria for effective teaching; possessing superior knowledge of subject matter, demonstrated teaching skill, and the ability to work effectively with students and colleagues.

Master teacher plans - a performance incentive plan which recognizes and rewards excellent teaching performance by providing opportunities for professional growth with additional responsibilities.

Mentor teacher - teacher who is nominated and selected to provide assistance and guidance to beginning and/or experienced teachers but does not participate in the evaluation of teachers.

Merit pay - a performance incentive plan that focuses on recognizing and rewarding teachers who perform well with increases in salary.

Performance - the carrying out of established tasks and activities as prescribed in the job description of an employee.

Performance incentive plan - plans that attempt to recognize training, experience, superior teaching, and extra pay for extra work.

Pro*file - a conceptualized model for teacher training at Iowa State University.

Superior performance - the ability to perform at the highest level in all categories listed as teacher performance criteria and having the willingness and skill to share in the professional development of other teachers.

Teacher effectiveness - a set of knowledge, abilities, and beliefs that

the teacher possesses and brings to the teaching situation at acceptable levels of performance which influence the amount of progress students make towards some indicated educational goal.

CHAPTER 2--REVIEW OF LITERATURE

The methodology used for reviewing the literature was based on the premise that there exists a body of information concerning behaviors of teachers that can be attributed to the identification of the master teacher. This information centers on disaggregating the "best" teachers who might be termed "master teachers." This review of literature will focus on three primary sources: effective teaching research; Iowa State University teacher preparation system, Pro*file; and states that have passed legislation to adopt career ladder plans. A "portraiture" of the political factors that have caused states to adopt career ladder plans will also be presented (Lightfoot, 1983). Thus, the search concerned a review of literature to: (1) present a brief historical overview on teacher quality, (2) identify classification systems that categorize effective teaching behaviors, (3) describe effective teaching behaviors under four general headings, (4) provide an analysis of Pro*file, and (5) describe an overview of the career ladder movement.

Overview on Teacher Quality

Teacher performance has always been a concern for educators and critics of public education (Kerr, 1983; Sweeney, 1983). Before the 1970s, insufficient attempts to define effective teaching have yielded little productive information. The problem has been that researchers had not developed the appropriate means to determine how to identify effective performance.

Probably the most significant weakness of teacher effectiveness research has been its failure to observe teachers in

the process of teaching. Instead of seeking the causes of pupil growth in the interactions of teachers and pupils, investigators have been content to study the effects of variables such as curricular innovations, teacher background experiences, or programs of teacher education. Variables like these can only affect pupils if they result in substantial changes in the classroom activities of teachers and pupils. . . (Good et al., 1975, p. 13).

Even though salaries were low, teaching was a satisfying career viewed with prestige and esteem (Boyer, 1983; Tomlinson, 1981). In all practicality, teachers were viewed to have little or no relationship on student achievement. Students who performed poorly were blamed because of their abilities and lack of effort; products of intelligence and home background (Tomlinson, 1981).

Attitudes towards student achievement and teacher performance shifted by the late sixties as the demand for teacher accountability grew. Increased taxes, media coverage unveiling unacceptable samples of teacher's notes to parents, teachers failing competency tests, and cases of ineffective classroom discipline (Mitchell, 1984), influenced a change in public opinion (Boyer, 1983). Attacks on teacher education programs soon surfaced as well. Advocates seeking educational changes amidst this turmoil were disheartened as they read, "Study Finds Educational Innovations Do Not Produce Measurable Achievement" (ASCD News Exchange, 1977). These criticisms were causing serious concerns about teacher quality as attention focused on the teachers' ability to motivate and instruct students (Sizer, 1984; Boyer, 1983).

This criticism and dissatisfaction with schools dispelled the assumption that teachers had little or no impact on student achievement. Educators were challenged to seek ways of adapting the teaching process

to meet the needs of all students.

Some major influences

The seventies produced a great deal of progress in research on teaching. Some major research efforts include the work of Rosenshine and Furst (1971), Dunkin and Biddle (1974), Good et al. (1975), and Medley (1979a). Rosenshine and Furst were able to provide some characteristics that seem to be most influential in the classroom. These included traits such as clarity, variability, enthusiasm, task-orientation, and opportunities provided for students to learn material. Other characteristics included the use of student ideas, praise, structuring comments, types of questions, probing, and difficulty of instruction. Two major scholarly efforts were conducted by Dunkin and Biddle (1974) and Good et al. (1975). Both reviews provide information that identify effective qualities and characteristics that focus on the actual process of teaching in the classroom. Some of these characteristics include critical relationships of teacher-pupil interactions, task performance, and the use of materials and equipment that effect learning outcomes. Medley, after reviewing 289 studies, reinforced similar conclusions that were reached by these other leaders. Characteristics such as devoting more time to academic skills, emphasizing academic activities, maintaining orderly and supportive classroom environments, and associating low achievement with independent and small group activity were found.

These major research efforts have provided some positive and encouraging possibilities in defining behaviors for effective teaching.

Finally, educators were asking the appropriate questions to promote school effectiveness. As a result, additional research has clearly established that some teachers are more effective than others in producing student gains (Brophy and Evertson, 1976; Evertson et al., 1980; Good and Brophy, 1984; McDonald and Elias, 1976). These scholars demonstrate that all students can be taught effectively and validate many practices found to be effective in classrooms.

Ineffective teaching behaviors

In a dissertation to differentiate between effective teaching and ineffective teaching, Mitchell (1984) was able to solicit specific behaviors from legal hearings to identify the "less than effective teacher." Citations were taken from dismissal cases: incompetence (a teacher not capable of performing adequately), immorality (any offense that may jeopardize the reputation of a teacher), and insubordination (unwillingly following the rules and regulations of the organization). The following behaviors were found:

1. The teacher lacks subject matter knowledge.
2. The teacher presents disorganized lessons.
3. The teacher assumes that students master materials without any teacher monitoring.
4. The teacher focuses on tasks and activities.
5. The teacher permits students to set goals and objectives for instructional activities instead of her/him.
6. Very little evidence is kept to prove that students have

progressed.

7. The teacher is unable to build a good learning atmosphere among students, fellow employees, and administrators.
8. The teacher fails to conform to administrative directives, lacks rapport with colleagues and students, and creates an unfavorable learning environment that affects many people.
9. The teacher is insensitive, lacks creativity and imagination in teaching, and adds very little variety when lessons are presented to students.

Classification Systems that Categorize Effective Behaviors

A number of attempts to classify teaching behaviors have been developed by researchers for purposes of identifying effective performance. Dunkin and Biddle (1974) focused on teaching behaviors that produced positive student gains while seeking to identify the determinants and effects of the teacher-student relationship. In a significant study of teacher effectiveness, completed with the cooperation and sponsorship of the Educational Testing Service (1976), the teacher's knowledge and use of methods and techniques does make a difference. Combinations of teaching performance rather than any single performance account for the effectiveness of instruction. These combinations include the teacher's ability to plan effectively, manage the classroom, and teach students in the "right subject and at the right time" (Lightfoot, 1983; Spady, 1982). Influenced by the subject matter, students, climate, and course objectives, teaching becomes an act of making decisions (Levin and Long,

1981). Englert (1984) emphasized that what teachers say and do in the classroom has a critical effect on student learning which ultimately determines teacher effectiveness.

In reviewing the classification systems of some researchers (Bloom, 1982; Englert, 1984; Manatt and Stow, 1984; McGreal, 1983; Moore, 1984; Peterson et al., 1978; Squires et al., 1983), effective teaching behaviors can be primarily classified under four general headings: planning, management, climate, and instruction. Planning is a skill that allows the teacher to prepare to take action towards a goal or purpose providing substance and creating meaning in a lesson. Peterson et al. (1978) describe planning as a process of selecting objectives, diagnosing learner characteristics, and selecting appropriate instructional and management strategies. Management consists of those behaviors that produce high levels of student involvement in classroom activities and minimize student behaviors that interfere with the teacher's or other students' work and efficient use of instructional time. Climate is the collective personality of a school that is characterized by the social and professional interactions of the individuals in the school (Norton, 1984). Instruction is the "constant stream of professional decisions that affects the probability of learning: decisions that are made and implemented before, during, and after interaction with the student. Teaching involves factor-analyzing those goals into dependent and independent sequences of learning, diagnosing students to determine what each has achieved in that sequence, and employing psychological principles that contribute to the speed and effectiveness

with which each student acquires new learnings in those sequences" (Hunter, 1984).

The classification system developed by Manatt and Stow (1984) is of major significance. During their five year experience with the School Improvement Model Project, Manatt and Stow identified behaviors for the purpose of assisting school organizations in their practice of teacher evaluation and supervision. Twenty-four criteria were developed and found to be valid, reliable, and legally discriminating. These criteria were derived from a review of the literature on effective teaching and from an examination of (1) several performance evaluation instruments; (2) major teacher performance appraisal systems: the Georgia Assessment Project, the Florida Performance System, the Instrument for the Observation of Teaching Activities (IOTA), and the North Carolina Teacher Evaluation Project. Through cross-tabulation, a final list was compiled with the criteria grouped under four major categories: productive teaching techniques, organized class management, positive interpersonal relations, and professional responsibilities (see Appendix A). Other key researchers have identified similar criteria, or behaviors, to define effective instruction (Dunkin and Biddle, 1974; Good et al., 1975; Medley, 1979a; Peterson and Walberg, 1979; Rosenshine, 1971).

The fourth category, professional responsibilities, is known as "employee rules and regulations" (Manatt and Stow, 1984). Four performance criteria are listed in this category. With the roles that "master teachers" are expected to perform as state plans develop, the inclusion of these criteria is worth noting. Goodlad (1975) claims

that we must explore "the functioning of the entire system and view all variables as potentially modifiable for the benefit of student outcomes."

Goodlad views school life as an end in itself:

What I am asking for is that we suspend for a time as a matter of policy our pathological preoccupation with pupil effects. . . . What I am asking for is that we concentrate, as an alternate, on the quality of life in schools--not just for pupils but for all who live there each day (p. 113).

Employee rules and regulations are job responsibilities beyond those required for classroom performance. These expectations create a value system that places responsibility with the individual; a characteristic that was identified by Peters and Waterman (1982) in distinguished companies.

Effective Teaching Behaviors under Four General Headings

The research on teacher effectiveness continually shows consistency in its findings (Manatt and Stow, 1984; McGreal, 1983). According to McGreal, this research is currently the focus of most schools because:

1. At this point it seems to have a strong and growing research base.
2. Effectiveness studies share a strong surface validity in that most findings parallel accepted practice.
3. There is considerable common sense involved in the recommendations growing from the research.
4. The growing number of studies being done in a variety of settings have produced a consistency of findings, that, especially for certain kinds of learning, seem to cross subject areas and

grade levels.

Effective teaching is a culmination of behaviors that interplay one to the other. For purposes of illustration, these behaviors shall be classified under four major headings: planning, management, climate, and instruction.

Planning

Planning is a function of deciding what should be done in the classroom and then determining how to get there. Teachers have a library of tools or "artifacts" that McGreal (1983) defined as "everything from commercial textbooks, workbooks, and supplementary texts to learning kits, maps, audiovisual aids, films, dittoed material, study guides, question sheets, worksheets, problem sets, quizzes, and tests." These can be used to promote learning as teachers prepare written plans, arrange furniture and equipment, and select appropriate resource materials for instruction (Evertson, 1983; Rosenshine, 1981).

Planning can be viewed as an organizational skill which is the key to effective instruction (Gagne, 1977; Good and Brophy, 1984). The effective teacher has materials, supplies, and equipment ready at the start of the lesson, and is able to move through the curriculum at a faster pace (Good, 1983). Teacher effectiveness is directly proportional to the teacher's ability to present a clear schedule. The teacher's leadership and organizational abilities must be clearly established in the first few days of the school year and this requires effective planning skills (Evertson, 1983).

The effective teacher establishes goals that provide general guidelines for instruction. These guidelines are closely linked to the prescribed curriculum of the school organization, usually in the form of written plans. Written plans should describe the "whats," "hows," and "whens" (Cooley and Leinhardt, 1980; MacKenzie, 1983; Murnane, 1980). The "whats" refer to the objectives, targets, or outcomes that the teacher expects students to accomplish. The "hows" are strategies for achieving these anticipated outcomes. The "whens" refer to the development of a schedule or a timetable for implementing the strategy. Manatt and Stow (1984) refer to this process as "curriculum alignment," suggesting that daily lesson plans make this process attainable since teachers tend to carry out those plans that they construct. The daily lesson plan includes a preassessment for purposes of identifying information to provide the correct level of instruction (Griffin et al., 1981; Karweit and Slavin, 1981; Karweit, 1983), and as a means to measure what students have learned.

The method for identifying and attending to students' knowledge of past learning experiences has proven to be important in organizing instruction. Even when all students begin with the same instructional needs, variations in student learning will occur because of differing learning styles and the amount of time it may take to accomplish a particular learning task. A teacher's task is to provide students with progressively more difficult work, but none so difficult as to frustrate them or erode their confidence (Bloom, 1968; Carroll, 1963; Hunt, 1960).

Effective teachers plan to continually assess student progress

during the instructional cycle until the expected level of mastery is reached (Bloom, 1974, 1976). Without this plan for assessment, students will be pushed ahead too quickly and never master the skills and concepts they need in order to successfully undertake the next learning task. Similarly, students who learn more quickly will waste valuable time on tasks that are too easy for them.

One of the most significant outcomes of effectiveness research has been how teachers produce higher student achievement gains by involving students more actively in learning (AASA, 1982; Karweit, 1983). The effective teacher uses the right amount of material for the amount of time that is available for instruction. Manatt and Stow (1984) called this "curriculum density."

Carroll (1963) showed the link between time and achievement; different people learn at different rates. Carroll hypothesized that the degree of school learning is determined by the amount of time the student actually spends in learning relative to the time the student needs to spend. In contrast, Bloom (1968) proposed that there are prerequisite skills and knowledge that the student needs to possess before learning a new task. Bloom's thinking became known as the mastery learning principle; a strategy dividing general objectives into smaller units that lead to the mastery of major objectives. However, Fisher and Berliner added the concept of "academic learning time" (ALT) which refers to the amount of time students are actually engaged in and experience success in learning. Success is judged by the amount of new knowledge that students comprehend and retain (Fisher et al., 1978).

The nature of tasks for which students spend their time must also be taken into account. In a program at Hawaii's Kanahamaha school designed to increase student learning, students, who were actively engaged in learning, were not experiencing success. Students were not able to relate to the curriculum until tasks were developed that included Hawaiian-based stories with a story-talk-teaching strategy applied by the teacher. Once the proper planning was provided to match the needs of this population, student retention levels, success rates, and test scores all increased (Berliner, 1984).

The effectiveness research is clear in classifying planning as a skill of the effective teacher who designs instruction based on prior student learning. The objectives of the instructional plan relate directly to the objectives of the prescribed curriculum. Tasks are planned so as to lead to successful learning of new knowledge and aligned to student needs. The instructional plan demonstrates an understanding of the content and an awareness of the variety of ways in which skills can be learned. Time is well-planned to allow students opportunities for engaged activity. Berliner (1979) found that student-engaged time and academic learning time are more sensitive predictors of achievement than allocated time; the amount of time that the teacher sets aside for learning. Assessment procedures are well-developed to continually check student progress for maximal learning possibilities.

Management

Thorough preparation and organization at the beginning of the year facilitate effective management during the course of the year (Evertson

et al., 1981; Emmer et al., 1980; Stallings, 1980). The ability to organize and manage a classroom is a basic teaching skill that crosses grade levels and subject areas. Management behaviors are an indirect cause of student learning, influencing student behavior and instruction. As Brophy (1979) indicated, effective teachers are effective managers. Dunkin and Biddle (1974) stated it differently:

It seems to us that adequate management of the classroom environment also forms a necessary condition for cognitive learning; and if the teacher cannot solve problems in this sphere, we can give the rest of teaching away (p. 135).

The scholarly efforts of Kounin (1970) identified four variables that create a good learning environment which lessen the potential for classroom disruption: With-it-ness, Overlapping, Signal continuity and momentum in lessons, and Variety and challenge in seatwork. Other researchers support these initial findings.

With-it-ness refers to the continuous monitoring of student activity. This ability to monitor student behavior provides an awareness of what happens at all times in the classroom which prevents potential problems escalating into serious distractions. McGreal (1983) believes that approximately 80 percent of all classroom management problems occur during off-task times in the classroom. Brophy (1979) feels that the key to successful classroom management is preventing problems before they occur. With-it-ness detects inappropriate behavior early and accurately, since managers use time wisely and maximize student attention and task engagement (Medley, 1979a). Student attention is measurable and associated to student achievement (Cobb, 1972; Lahaderne, 1968;

Samuels and Turnane, 1974).

Overlapping is defined as having the ability to do more than one thing at the same time. An example may involve a teacher checking the independent activity of groups working on different assignments, while, at the same time, teaching reading to another group. Some specific teacher behaviors form the guidelines to classroom control:

1. Teachers gradually provide students information about classroom routines (Anderson et al., 1980; Emmer et al., 1980).

The effective teacher is much more explicit in communicating expectations.

2. Students were shown and told what kind of behaviors were expected (Evertson and Emmer, 1982). The teacher presented reasons that supported the expectations that were established.
3. All procedural rules were explained to insure the maximum use of time. Some procedural rules may include deadlines for paper assignments, time set aside for review, and timelines for receiving feedback. Opportunities are provided for students to experience success (Fisher et al., 1978; Purkey and Smith, 1983; Rutter et al., 1979).
4. Specific corrective feedback was applied to students who misbehaved.
5. The teacher redirected those either confused or inattentive back to the lesson at hand.

The effective teacher perfects the art of keeping in circulation and is available to give immediate help to students who need it (Brophy and

Evertson, 1976; Fisher et al., 1978).

The third variable by Kounin (1970) involves simple management techniques (Kerman et al., 1980). The effective teacher is able to provide signals or cues that indicate dissatisfaction with some type of behavior without losing the momentum of the teaching pace. Some of these techniques include moving near students who are not paying attention, using eye contact, directing questions at particular students, allowing students to answer questions, or writing students' names on the board. The impression that the teacher creates as a "helping person" and the appropriate feedback students receive will also minimize inappropriate behaviors. According to Good and Brophy (1984), the effective classroom manager must "have the respect and affection of the students, be consistent and, therefore credible and dependable, assure responsibility for the students' learning, value and enjoy learning and expect the students to do so too, and communicate these basic attitudes and expectations to students and model them in behavior" (pp. 182-183).

Kounin's fourth variable requires teachers to challenge students with a variety of activities that generate interest and enthusiasm. These activities or task structures, such as seatwork, recitation, or reading circles, each have rules and norms associated with them. The activities customarily used by a teacher will determine teacher behavior as well as student behavior.

Teachers who relied on recitation were less able to establish close social ties with their students than were teachers who primarily utilized small groups and individualized

projects. Recitation places teachers at the center of control. It forces them to rely on equitable, impersonal sanctions (usually short verbal desists) and on the authority of office rather than on more personalized influence mechanisms. By contrast, small groups and individualized instruction increase opportunities for teachers to covertly "bend" classroom rules to handle individual problems and facilitate teacher involvement in, rather than simply teacher direction of, the activity (Bossert, 1978, p. 46).

The effective classroom manager can also elicit other teacher behaviors. Berliner (1978) found that teachers can prevent distractions by structuring the physical environment in order to provide time to introduce rules and procedures. Arlin (1979) found that teachers who orchestrate smooth transitions between activities prevent the potential for distraction. Valuable time is not lost which prevents students becoming confused or bored.

Effective managers are willing to assume responsibility for solving problems (Brophy and Rohrkemper, 1981). As a result, these teachers use long-term, solution oriented approaches concentrating on helping students understand and cope with conflicts or problems that caused their inappropriate behaviors. Working together with students to cope and solve problems facilitates the establishment of an academic emphasis and develops positive teacher-student relationships.

The effective manager is always alert to opportunities that promote student self-discipline (Good and Brophy, 1984).

The teacher . . . is expected to elicit work from students. Students in all subjects and activities must engage in directed activities which are believed to produce learning. Their behavior, in short, should be purposeful, normatively controlled, and steady; concerns with discipline and control, in fact, largely revolve around the need to get work done by immature, changeful, and divergent persons who are confined in a small space (Lortie, 1975, p. 151).

The effectiveness research is clear in classifying management as a skill of the effective teacher who seeks to produce high levels of student involvement in a productive learning environment that prevents potential problems. The effective teacher maximizes the use of student time, promotes student attentiveness, and efficiently organizes the classroom. A continuous learning pace is maintained and the classroom atmosphere is goal-oriented (Berliner, 1984). Students are held accountable and a variety of activities generate interest and motivation which override the problems of anxiety, short attention spans, and confusion (Brophy and Evertson, 1976). Provisions are established for dealing with disruptive students as consequences for inappropriate behavior are clearly defined. Rules and procedures are consistently enforced and feedback is shared as a reminder to behaviors that are acceptable.

Climate

Climate is the culmination of staff and student attitudes, norms (expected behavior of people in the organization), values (assumptions about how things ought to be), goals (activity taken by an organization to accomplish its mission), and beliefs (assumptions about the world and how it works). Nwankwo (1979) referred to climate as "the general we-feeling, group sub-culture or interactive life of the school," Tagiuri (1968) called it the total environmental quality within an organization, and Halpin and Croft (1963) defined climate analogously: "Personality is to the individual what climate is to the organization."

March and Simon (1958) in their analysis of organizations, and Argyris (1958), in his report of interpersonal relations in a bank, are recognized as the pioneers in studying organizational climate. These researchers pointed to the influence organizational climate had on employee morale, productivity, and job satisfaction. Norton (1984) provided a list of considerations underlining the influence the school climate serves in determining what a school is and what it might become:

1. The kind of climate sets the tone for the schools' approach in meeting stated goals and resolving problems.
2. Effective communication necessitates a climate of trust, mutual respect, and clarity of function.
3. Climate serves as an important determinant of attitudes toward continuous personal growth and development.
4. Climate conditions the setting for creativity--the generation of new ideas and program improvements.

The most recurring attitude with climate and student outcomes is the level of expectation teachers and administrators hold for each other and especially for students (Halpin and Croft, 1963; Williams and Batten, 1981; Wynne, 1980). Houlihan (1983) postulated that relationships built on trust and respect will foster positive attitudes generating organizational commitment for people to perform successfully. In schools, the effective teacher is skillful in promoting positive attitudes at the classroom and building levels.

Without exception, the research portrays effective schools as those in which the staff believe that students will succeed academically.

High expectations held by staff influence student learning resulting in high achievement (Brookover et al., 1979; Brookover and Lezotte, 1979; Brookover and Schneider, 1975; New York State, 1976; Phi Delta Kappa, 1980; Weber, 1971). More and more data suggest that classroom climate is conducive to increased achievement. A good learning environment where student gains are higher and characterized by high levels of student involvement are the result of steps that are taken by the teacher. A good classroom environment is evidenced by positive motivation where students feel free to explore the potentials for learning without fear or reprisals (Johnson and Johnson, 1974, 1979). Teachers allow students opportunities to experience success (Murnane, 1980; Rosenshine, 1976; Rutter et al., 1979; Walberg, 1983). Typically, there exists a high degree of appropriate academic praise for all students. Effective teachers know when and how to apply reinforcers to promote student confidence, a condition related to high achievement (Hamacheck, 1971). By using "student ideas" (Rosenshine, 1971) or "interchangeable responses" (Aspy, 1972), the teacher summarizes what students share as responses in classrooms. This encourages students to make decisions, evaluate their own work, and explain their thinking. When students believe that their teachers understand and respond to their needs, they work and behave better (Brophy, 1981; Good and Brophy, 1984; Hudgins et al., 1983); feel more confident (Rutter et al., 1979; Wynne, 1980); and retain more information through their direct involvement with the teacher in the learning process (Brophy, 1979; Medley, 1979b; Rosenshine, 1971).

Teacher expectations have a significant impact in the classroom (MacKenzie, 1983). Expectations that are realistic and challenging induce active student involvement and visible leadership. Brophy and Evertson (1976) found that an encouraging attitude was fundamental to the success of low SES students; whereas, Bereiter et al. (1969) found that teachers of remedial classes must make a firm commitment to the belief that every student can and will learn. Teacher commitment is necessary to improve student academic performance. As a significant variable in building classroom climate, students are able to identify teachers who are committed. This recognition creates added interest and motivation (Brookover et al., 1979; Brookover and Lezotte, 1979).

Hunter (1967) found that the abilities of students to perform school assignments determine the degree to which students believe they can learn independently. Effective teachers have strong interpersonal skills that help students clarify their own attitudes, values, and opinions (Glasser, 1969; Joyce and Weil, 1972). Students who are treated with respect as individuals and able to discover their strengths and weaknesses perceive their relationship with the teacher as enjoyable and beneficial.

Positive interpersonal relationships with others is also significant in creating a climate for achievement at the building level by cooperating with other staff members (Phi Delta Kappa, 1980; Rutter et al., 1979), fulfilling organizational goals and resolving problems (Ellet et al., 1977; Phi Delta Kappa, 1980), and working towards an environment that emphasizes student achievement where the staff participate with administrators in making decisions about curriculum and discipline

(Ellet et al., 1977; Phi Delta Kappa, 1980; Rutter et al., 1979; Wynne, 1980). Positive interpersonal relations among staff effects school "coherence." Wynne (1980) defined coherence as a pervasive quality of good schools that reflects clarity, purposefulness, good communications, consensus, and consistency; a critical factor that determines the use of feedback in decision-making.

In schools where high levels of student outcomes are described, staff members accept the basic objectives of the school and their responsibilities for achieving stated goals (Brookover et al., 1979; Brookover and Lezotte, 1979; Edmonds, 1979; Phi Delta Kappa, 1980; New York State, 1976). When all the goals, objectives, and policies are established after the decision-making process is completed, each teacher, as a "team player," is responsible in carrying out such plans (Manatt, 1982). In contrast, schools with low levels of student productivity are characterized by complacency and an unwillingness to resolve problems that exist among staff members (Brookover and Lezotte, 1979).

The evidence is clear that the effective teacher takes steps in promoting positive attitudes at the classroom and building levels. The effective teacher focuses on student behavior to ensure involvement and success where all students feel free to participate; standards are clear, understood, and consistently applied. There is a high degree of academic praise, students are treated with respect as individuals, and all students are given an opportunity to learn. The teacher believes that all students can learn and demonstrates active involvement and leadership in efforts to promote self-concept and self-control. Although the

expectations in the class are high, they are realistic and challenging. Positive academic outcomes result from high levels of teacher cooperation and concern (Rutter et al., 1979) with one another as teachers resolve problems and fulfill organizational goals.

Instruction

Instruction is a process that directly influences student learning and makes the teacher accountable for pupil performance. Effective classroom instruction is the creation of situations that promote successful learning. A planned sequence of teaching stages seems to characterize quality instruction. Some models have been developed by researchers who have looked in classrooms, observed teachers, and watched students learn. These models describe techniques that are applied in classrooms consisting of teacher behaviors that identify prerequisite skills, determine instructional objectives, present new material through a variety of teaching methods, monitor student performance, allow students opportunities for practice, check student mastery, and provide enrichment and/or corrective activities (Bloom, 1976; Fisher et al., 1978; Good et al., 1983; Hunter, 1984; Rosenshine, 1983).

There is no one model for instruction that is suitable for every teaching situation. Different approaches have their own strengths and may be more appropriate than others. The effective teacher will select techniques that suit his/her needs; however, there are certain steps that seem necessary.

First, the effective teacher identifies an appropriate level of

instruction by either assessing the current level of student skills and knowledge (Fisher et al., 1978), and/or conducting a thorough analysis of the curriculum content to define the instructional objectives (Bloom, 1976). In the mastery learning model (Bloom, 1976), the teacher conducts a task analysis to decide what students already have accomplished before proceeding to the next instructional objective.

After the teacher diagnoses the students' level of development, the teacher decides on the next level of goals and activities. In addition, some standards must be established as indicators for success. These standards determine the activities that will be implemented to help students achieve the prescribed curriculum objectives.

Second, the effective teacher will encourage students to learn by providing an introduction and/or review at the beginning of the lesson which focuses attention on the task. This opening review has proven to be successful because it provides direction and relevance to learning, and ties past learned material to the present (Good and Grouws, 1979; Evertson and Emmer, 1982). Ausubel (1960) called this "advance organizers" because the teacher actually structures the presentation to create a clear understanding for the students; Bloom (1976) called it "cueing." Providing anticipatory sets can make a big difference in the degree to which students remember essential facts and concepts even though very little time is required to present clear introductions (Hunter, 1984; Luiten et al., 1980).

Third, the purpose of the lesson is made clear to students at the onset of the lesson. The effective teacher is selective in presenting

important objectives, concepts, and more stimulating because of a deeper bank of resources. They know their subject matter well and are able to select those objectives that bear most meaning in their area of expertise (Berliner, 1978, 1979; Hudgins et al., 1983; Medley, 1979b; Peterson and Walberg, 1979; Rosenshine, 1976; Rutter et al., 1979; Soar and Soar, 1979). Their field of expertise is broadened as attempts are made to keep abreast of changes and new information in the field (Manatt and Stow, 1984).

Fourth, the teacher presents new concepts and skills to students. A number of techniques can be used such as lecture, recitation, inquiry methods, videotapes, audiotapes, teacher-led discussions, and other techniques that the teacher wants to employ to convey information. During the lesson, the teacher and students interact constantly and the teacher models by displaying behaviors that create positive results. Methods for checking accuracy are also presented. The most practical and immediate way to seek understanding is through questioning which controls subject-related interaction, focuses upon learning, and stimulates learning. The effective teacher uses a high frequency of questions (Brophy and Evertson, 1976; Rosenshine, 1971). Grossier (1964) contends that the effective teacher will use questions that are specific, purposeful, brief, understandable, and stimulating. The questions are planned, logical, and sequential. There is enough time allowed for students to respond (Rowe, 1974).

Fifth, students engage in "guided practice." While students work on the assigned tasks, the teacher monitors their work closely (Medley,

1979a). McGreal (1983) stated that "no single teaching activity has more potential value than guided practice." The teacher works among the students providing support, encouragement, praise, individual assistance, or reinforcement by explaining different points and analyzing any misunderstandings that learners may have (Good et al., 1975). This requires a high level of energy and enthusiasm (Good and Brophy, 1984; Kounin, 1970). The objective is to guarantee that students master the material before the teacher progresses to higher levels of learning. Guided practice is an opportunity for the teacher to insure involvement and success (Good and Brophy, 1984). If students are not successful, corrective measures are tried.

Sixth, once the teacher believes that the students understand, they are allowed to work alone. The teacher should feel confident that students will experience success. Peterson and Walberg (1979) feel that students should be progressing through the content with an 80% success rate. Students ought to make few errors while accomplishing the assigned task. For additional practice and review, the teacher may assign similar tasks within set times during the month or school year.

Finally, the effective teacher sets up checks to review the progress that students have made. This assessment stage is the key element to successful teaching practice before the teacher begins the process of selecting another area for instruction, thereby completing the instructional cycle. This step provides information that assures the teacher whether students have attained mastery. If students have not attained mastery, alternative strategies and materials are used to reteach the

lesson.

The demonstrated behaviors of instruction--teaching--are the culmination of skills in planning, management, and climate building. Goodlad (1979) believes that successful teachers display a variety of elements in their instruction in order to assure student success and satisfaction. It is every teacher's responsibility to grasp the basic elements that comprise quality instruction, emphasizing that a variance does exist within classrooms. As is evident in the research, there are particular behaviors that contribute to quality instruction.

The effective teacher enhances the potential for students to learn through explanations, demonstrations, practice, and feedback. This process stems from the expectations that are developed by constructing the framework for learning in establishing the mental set of each lesson to arouse student interest. As the teacher identifies factors that match the instructional process to student characteristics, the potential for higher learning is enhanced (Manatt and Stow, 1984).

The effective teacher clearly states the purpose and objectives of the lesson and presents information to students in a variety of ways. The teacher models by showing students what to do before any attempt to qualify their understanding takes place. They are more involved in actively demonstrating knowledge to students. Good and Brophy (1984) found that teachers who regularly instruct their students in active ways get better results. In low SES populations, Soar (1973) and Stallings (1981) found that teachers who actively teach rather than provide independent activities generate learning gains.

Effective teachers check for understanding after they have illustrated what they expect students to learn. Various probing techniques can be applied until the teacher is satisfied that students are ready for "guided practice." Guided practice affords students the time to try activities under the close supervision of the teacher who monitors their work. The effective teacher demonstrates sensitivity in relating to students on an individual basis during this activity. Once completed, students are given additional work to demonstrate their mastery through independent work. This unsupervised activity is judged by the teacher who gives immediate feedback that either recognizes successful performance or provides remediation.

Analysis of Pro*file

Teacher training programs need to be improved (Kerr, 1983). Evertson et al. (1984) provide some sound suggestions for improvement that the College of Education at Iowa State University has already been addressing since 1981:

1. Course offerings and experiences should be provided to reflect the "real encounter" future candidates who plan to teach will experience. Experiences that enhance analytical and problem solving skills that can be applied to overcome conditions that jeopardize the teacher's effectiveness are needed.
2. Emphasis must be placed on what is known about effective teaching. There are enough studies to sufficiently validate a number of teacher behaviors that may be considered generic.

3. Closer relationships between the theoretician and practitioner whom model behaviors expected of the student entering the field are needed. More monitoring of what students are expected to learn in schools of education is recommended.
4. Greater emphasis is needed to help future teachers collect, analyze, and use information to solve problems similar to those anticipated in classroom settings.

These suggestions are components invested in the system Pro*file (Professional File) being developed at Iowa State University for improving the content and learning activities within the teacher preparation program in combination with ongoing evaluations of students. Although still in the research and development stage, several components have been implemented. Other components will be implemented this year and additional strategies and plans will be incorporated in the future.

As conceptualized, from the time a student enters the program until graduation, students will be monitored through faculty/advisor contacts, evaluations, and computer-related activities. Aiming to create student mastery in subject matter content, major educational issues, communication, teaching variety, use of instructional technology, evaluation and diagnosis, and critical self-analysis, Pro*file is viewed as a diagnostic/prescriptive approach to teacher preparation. Pro*file is being developed to facilitate the skills, knowledge, and attributes of teachers and create the need for critical self-analysis based on the belief that professional growth is a life-long process. Pro*file, as a comprehensive assessment plan, goes far beyond the reliance of end-of-program

examinations that have been adopted by a number of states for certification purposes, even though there is no evidence that scores on end-of-program tests (e.g., National Teacher Examination) predict success in teaching (Soar et al., 1983). Currently, twenty-nine of the fifty states practice this reform measure (Education Week, 1985a).

Pro*file consists of three components: an eleven-step assessment plan, the Performance Element Modules (PEMS), and the Teaching Assessment Modules (TAMS). The eleven-step plan is designed to monitor the academic progress and skill development of students throughout their program of study. PEMS is the computerized knowledge base, and TAMS, the computer-video assessment program. PEMS and TAMS supplement the regular teacher education program.

Eleven-step plan

The intent of the comprehensive assessment plan is to require students to maintain notebooks and a computer file throughout their stay in the program. Data from field experiences, philosophy of education statements, work with the PEMS and TAMS are some samples that are included in these record keeping devices. The combination of frequent faculty/advisor to student contact and the use of the computer distinguish it from other training programs. The level of monitoring is embedded in the eleven-step process:

- Step 1. Pre-admission - A student seeking admittance to the teacher education program will be expected to have a folder that includes the ACT scores, ISU placement exams in Math and English, course records and correspondence regarding course changes, teaching/learning experiences with a letter of recommendation, contacts with an advisor, and a writing

sample. Specific courses must also be taken prior to admittance to the program.

The student must meet specific criteria that include a grade point of at least 2.3, English proficiency, Math proficiency, and a satisfactory writing sample.

An early orientation program that would last about four hours for any student interested in the teacher education program would cover all specifications.

- Step 2. Initial Assessment Battery - Students are given open-ended and forced-choiced instruments to identify their strengths and needs. The five instruments identify areas that have a significant relationship with teaching. Students are encouraged to write about themselves from a personal and professional standpoint, to list experiences along with dates, to participate in an objective quiz that covers issues of education, and list some significant readings that have been of interest and may be considered classics in the field of education. Additional inquiry attempts to identify with student philosophical understandings of the school and instructional methods as well as his/her mastery of basic skills concepts will be explored.
- Step 3. Admissions Interview - The personal dimension of the system lies at this step when the committee meets with the prospective candidate to determine whether admittance to the program is granted. A serious discussion about a competent curriculum that will be both personally and professionally satisfying will be explored.
- The tasks of the committee include the review of the student's folder and Initial Assessment Battery, the clarification of student statements, an analysis of student strengths and needs, a decision to admit this candidate to the program with alternatives shared should the student be denied, and the forms to be filled in for the department and the college.
- Step 4. Competency Checklist - During the Admissions Interview, students would receive a checklist of competencies and feedback from the interview committee of possible strengths and needs. Depending upon the competency, some will be embedded in the courses that the student intends to take while others will be based in experiences. These competencies are those chosen for candidates in the program and can be supplemented by using the computer and locating those Performance Element Modules (PEMS) that the student or advisor might determine worthy. As planned, some of the PEMS may be used in the actual course as a tool describing the competency itself. The module summarizes

the competency through an introductory paragraph, a list of objectives, ISU courses which emphasize the competency, resources and resource persons, several activities, and pre- and posttests.

- Step 5. Student Program - The student will participate in regular course work and field experiences. Added documentation to the folder will include grade reports and correspondence, competencies met with notes on strengths and weaknesses, and records of experiences. Reports may be submitted by the student, advisor, and faculty members. Of critical importance are the maintenance of the grade point average and resolution of competencies identified as needs.
- Step 6. Interim Interview - Students are checked on the progress in a formal manner for the first time since admissions. Strengths and needs will be reviewed and a form will be completed. If needed, remedial action will be taken. The advisor and possible other faculty members will be involved in this interview.
- Step 7. Student Program - The student will continue to participate in regular course work and field experience with greater freedom to select electives. The same procedures apply as in step 5.
- Step 8. Student Teaching - The student will be observed by the university supervisor or supervising teacher in the demonstration of a number of competencies that have been accomplished. This activity allows the candidate an opportunity to practice in a real teaching situation the skills, knowledge, and attributes that have been gained.
- Step 9. Final Assessment Battery - Like the Initial Assessment Battery, this Battery will now include segments of the curriculum similar to the National Teacher Exam. The use of Teaching Assessment Modules (TAMS) will be observed to strengthen skills that have been chosen as effective teaching behaviors in classroom settings.
- Step 10. Exit Interview - After completion or near completion of student teaching and coursework, the student will meet with the advisor and small group of faculty to review the student's professional profile. A prognosis is provided by the committee based on the Final Assessment Battery depicting strengths and needs. The student also provides feedback to the committee regarding the effectiveness of the training program. The survey from RISE (Research Institute for Studies in Education) which seeks graduate

opinion about the teacher education program may also be reviewed.

- Step 11. Profile Summary - In addition to the personal approach the student experiences at the Exit Interview, a computer printout which summarizes performance levels and provides areas needing improvement is supplied to the student.

Performance element modules (PEMS)

PEMS are the heart of the system Pro*file; the sum of qualities, knowledge, and skills deemed essential for beginning teachers. PEMS is a computerized resource and information file that serves as a comprehensive knowledge base. Content, appropriate to each performance element, includes introductory materials, objectives, pertinent ISU courses, resources, instructional activities, resource persons, and pre- and post-tests (Warren, 1985b). One hundred performance elements were selected to be computerized into modules. This list has since been modified in hopes of eventually developing 85 modules (Kniker, 1985); by the end of August, 1986, 50 modules will be completed.

The selection of performance elements was based on a careful review of effective teaching, concerns expressed by professional organizations, competency lists developed by other teacher education programs, and input from the professional teaching staff in the College of Education at ISU (Kniker, 1981). Added concentration was spent in reviewing the competency lists developed by Manatt and Stow (1984), Denmark and Nelli (1980), and studies conducted in Georgia, South Carolina, and Florida. Special emphasis was placed on identifying generic professional skills

(Kniker, 1981).

The database, with summaries of teacher preparatory concepts, is located on the mainframe computer to guide students in identifying their strengths and areas of need. The competencies have been organized under seven categories: Pedagogical Knowledge, General Teaching Skills, Self-Concept and Decision-Making Skills, Planning Skills, Instructional Planning and Implementation, Evaluation and Diagnosis, and Management (see Appendix A).

Teaching assessment modules (TAMS)

TAMS is a series of computer-based video programs depicting a variety of classroom teaching situations of observable skills providing students opportunities to: (1) enrich their cognitive knowledge of effective teaching behaviors, and (2) recognize and critique teaching behaviors in actual instructional settings (Volker, 1984). This systematic approach to the analysis of teaching will provide input for students to develop and refine a personal, professional teaching style (Volker, 1985).

TAMS currently consist of tapes depicting eleven observable teaching behaviors that were established by the research and development staff using the following guidelines (see Appendix A):

1. The teaching behavior must be valid; that is, based on effective teaching research.
2. The behavior must be related to student achievement, used in major performance evaluation systems, and perceived as a

characteristic of effective teachers.

3. The behavior must be directly observable with the potential of easily being identified in a short videotape segment.

In the final analysis, some of the behaviors that were selected are not necessarily related to student achievement but perceived as criteria associated with effective teaching. The eleven teaching behaviors are not necessarily the most important effective teaching behaviors nor of equal importance (Warren, 1985b). Vignettes of videotape depicting actual teaching situations and most representative of the eleven teaching behaviors were selected from the Georgia Teacher Assessment Project, Duffelmeyer tapes, Manatt/ASCD tapes, and Sweeney tapes (Volker, 1984).

The TAMS are both diagnostic and prescriptive and represent twenty-nine of the total 100 performance elements. As students view the tapes and rate teacher behaviors, their judgments are recorded and compared with those of a panel of faculty members and teachers who have served as "jurors," those charged with providing an expert opinion about the teaching behaviors. Similarities and differences are provided, comparing the student's ratings to that of the jury. If the student does not match those opinions of the jury, he/she is directed through remedial loops in order to better understand the rationale behind the ratings. A computer printout is also provided to the student with an analysis of responses suggesting needed areas for improvement (Volker, 1984).

Each TAM contains an introduction, a videotape segment of a classroom situation, evaluation of selected criteria, two remedial loops for each criterion, and a summary of responses.

Overview of the Career Ladder Movement

All across the nation, efforts are being made to change the ways teachers are evaluated and rewarded. A shift from the traditional salary schedule to one that promotes excellence in performance is underway. More specifically, the publicized "career ladder" concept that provides "upward mobility in teaching in a series of steps, each requiring a greater degree of competence and responsibility" (Association of Teacher Educators, 1985) is catching hold throughout the nation as one emerging trend of the sixteen major state initiatives that states are actively pursuing for school reform (Education Week, 1985a). The career ladder, a form of stratification within the teaching profession, offers different salaries and professional status at each level. The United States Department of Education is encouraging and has funded a number of projects to test the feasibility of such plans.

Most career ladder plans will include "several career steps, predetermined criteria for advancement to a new step, evaluation procedures, the opportunity for teachers to take on new roles in the higher steps . . . and stipulations for the training and the certification required for advancement" (ATE, 1985, p. 12). Astuto and Clark (1985) predict that additional concerns will influence future developments that include: student outcomes, evaluative criteria, academic standards, teacher evaluators, merit pay tied into personnel development, planning groups, and careful planning. Some individual school districts have already been recognized as innovators: Round Valley, California; Ladue, Missouri; Charlotte-Mecklenburg, North Carolina; Toledo, Ohio; Seiling, Oklahoma;

Dallas, Texas; Houston, Texas; and Weber of Ogden, Utah.

One of the most renowned pioneering efforts has been the program at Charlotte-Mecklenburg under the guidance of school superintendent Jay Robinson and University of North Carolina professor Phil Schlechty. Resulting from four years of planning, experimentation, redesign, evaluation, and renegotiations, the Teacher Career Development program includes a career ladder of six levels. Teachers can advance from level to level by demonstrating mastery of specific generic competencies that are defined per level. As teachers advance, they must be willing to assume additional responsibilities. These additional responsibilities will vary but may include (1) helping beginning teachers; (2) participating in program evaluation or staff development; (3) and serving as researchers. These added responsibilities do not occur until a teacher reaches the fourth level of the plan, Career Level I.

Some basic underlying philosophical assumptions have influenced the development of the Charlotte-Mecklenburg career ladder plan (Schlechty et al., 1985):

1. The career ladder program involves multiple evaluators to improve the validity and reliability of the process. This results in an evaluation procedure that has integrity.
2. The employer is responsible for developing and maintaining outstanding teachers. A staff development program serves in helping teachers become better.
3. Teachers will commit themselves to the teaching profession, upgrade their skills, and remain with the school system as a

result of built-in rewards and incentives.

4. A broad-based committee representing people affiliated with higher education, the business community, the board of education, the PTA, local teacher organizations, other teachers, and school administrators are needed to construct the plan for greater ownership and acceptance.

The Commission on Master Teachers (ATE, 1985) identified fourteen possible assumptions that may form the foundation of a career ladder:

1. A career ladder contributes to the improvement of the teaching/learning process.
2. Rewarding outstanding teachers improves schools and teacher morale.
3. Identifying levels of competence in teaching enables a school to make the most effective use of its staff.
4. A career ladder results in better use of teacher talents and abilities.
5. Broader opportunities within teaching make careers in education more attractive to bright college students.
6. A career ladder provides the time and structure for the most competent teachers to engage in curriculum development.
7. A career ladder provides incentives throughout a teaching career.
8. A career ladder unifies and strengthens the structure and the organization of a school.
9. Promotion within the ranks of teaching results in a stronger

commitment on the part of teachers and greater retention of competent teachers.

10. Differing responsibilities and corresponding salary categories in teaching provide both challenges and incentives for teachers.
11. Differentiating teaching roles enable teachers to better understand various levels and types of professional expertise.
12. A career ladder encourages a better pattern of initial teacher preparation, improves the induction into teaching, and gives focus to on-the-job staff development.
13. A career ladder sharpens the role of teacher education institutions in initial preparation and continuing professional development.
14. The evaluation of teaching required to operate a career ladder plan improves certification and licensing systems and tenure arrangements for teachers.

There is very little evidence in the United States to determine what effect career ladders will have. However, this same notion has proven to be successful in Great Britain during the past forty years (Murphy, 1985) that may be helpful to American schools:

1. Teachers with proven ability can be placed in leadership positions. These teachers can be models and mentors to younger teachers and can promote better teaching in general. They can be a significant force in developing good, workable curriculum that will enhance student learning.
2. The career ladder can be an effective leadership development

device. Not only will there be a significant cadre of teachers in leadership positions in each school, but principals and assistant principals will be better prepared for their roles through experiences they will have received moving up the career ladder before becoming administrators.

3. Because leadership functions are more widely shared in the school, more teachers have a stake in school performance. More people are directly involved in school improvement activities.
4. There is opportunity and incentive for teachers to grow to develop new skills, and to accept new challenges. Although the career ladder is not a cure-all for teacher burnout, it certainly can reduce it.
5. To the extent that the career ladder can make teaching a more challenging and rewarding occupation, it can become a powerful incentive to attract and retain qualified people in the profession.

The career ladder movement is growing in popularity because these plans (1) allow people to gain responsibility, status, and pay through outstanding performance and growth; (2) provide an alternative to merit pay which has been opposed by teacher organizations; and (3) reflect merit by identifying and rewarding competent teachers (Murphy, 1985). The concept has become an important policy issue for teachers. In two separate surveys, teachers responded favorably to the career ladder concept: 81.6% "agreed" or "tended to agree" with recommendations from national and state committees that endorse career ladders for teachers

(Educational Research Service, 1984); 84% thought it was a good idea in the 1984 Metropolitan Life Insurance survey (Nathan, 1985).

States passing legislation regarding career ladder plans

After completion of the 1985 legislative session, six additional states (Alabama, Arkansas, Georgia, Indiana, Missouri, and Washington) passed legislation to develop statewide career ladder programs or provide funding for local pilots (Cornett and Weeks, 1985b) bringing the total number of states that have passed legislation to endorse career ladder plans to twenty-six. The other twenty states include: Arizona, California, Colorado, Delaware, Florida, Idaho, Kentucky, Maine, Maryland, Mississippi, New Jersey, North Carolina, South Carolina, South Dakota, Tennessee, Texas, Utah, Virginia, West Virginia, and Wisconsin. California is included in this listing because the mentor teacher program is intended to be a "stepping stone" to a career ladder plan (Bond, 1985).

Five states have developed or are developing statewide teacher performance criteria (Alabama, Florida, North Carolina, Tennessee, and Texas); eleven states have guidelines for teacher performance (Arizona, Arkansas, California, Georgia, Kentucky, Missouri, New Jersey, South Carolina, South Dakota, Utah, and West Virginia); four states are in the process of developing criteria (Maine, Mississippi, Washington, and Wisconsin). Five states allow local school districts to determine criteria (Colorado, Idaho, Indiana, Maryland, and Virginia). In Delaware, no decision has yet been made (Lehrer, 1985). This decision to

establish criteria to evaluate teaching performance is the most difficult for states to consider as they develop career ladder plans (ATE, 1985; Astuto and Clark, 1985; Cornett and Weeks, 1985b; Parker, 1985).

Parker insists that criteria and standards should vary:

The criteria and standards of evaluation should be differentiated by career level in career ladder or master teacher programs. The criteria and standards should be coordinated with the purpose(s) of evaluation. Common sense dictates that the criteria should include meaningful teaching behaviors . . . requisite for each criterion (1985, p. 11).

Currently, state plans vary from large-scale implementation to programs that are developed locally. These differences result from decisions that are made regarding state or local control, teacher and administrator eligibility, performance criteria, incentives and delivery systems (Astuto and Clark, 1985; Cornett and Weeks, 1985b). If not for the emergence of the first two state plans in Tennessee and Florida, critical issues such as (1) teachers volunteering to participate in the career ladder plan; (2) base salaries being lowered in low-paying states; (3) pay incentives; and (4) teachers evaluating other teachers in a multifaceted process would require more time to resolve these complex issues. Other states have learned from the struggles that were experienced in Tennessee and Florida; two states currently revising their original plans (Cornett and Weeks, 1985a).

Parker (1985) believes that career ladder plans could be one avenue for achieving "excellence" in education. To date, there is no uniform career ladder plan, nor will "a single career ladder model be appropriate for all situations" (ATE, 1985). Some of the differences

that already exist in state plans can be shown in these following examples (Cornett and Weeks, 1985b).

1. Teacher eligibility is determined at the state level in both Tennessee and Florida. Texas and North Carolina have developed statewide instruments, but allow local districts to implement the process. On the other hand, Utah and California give considerable local autonomy for the development of the program and the selection of candidates.
2. Tennessee has become the first state to include school administrators in the career ladder plan; other states are considering this option. California, New Jersey, and Florida have called for plans to become part of locally negotiated contracts, while Arkansas and Wisconsin relied upon teacher approval before those states applied for funding.
3. Florida, Tennessee, and Texas implemented statewide programs soon after they received legislative approval. The majority of other states are moving cautiously by implementing pilot projects in local school districts. Some states are allowing school districts to volunteer; perhaps a concern because of potential constraints stemming from opposing groups and finance. Both the Master Teacher Plan and the District Quality Incentives Plan in Florida have been challenged by two large teacher associations.
4. Some states are using competency tests as prerequisites for entry on career ladders. Other states have included student

achievement measures as one criterion for evaluating the effectiveness of teachers. Although the states of Florida, Tennessee, North Carolina, and Texas are using or planning to use statewide criteria for evaluating performance, most states are leaning towards a less centralized notion.

5. In all statewide plans, experience is required for advancement. Virginia, Tennessee, Texas, and North Carolina require between two and five years before a teacher can advance to the next level, while the states of Arizona, Colorado, and Idaho have left that decision up to local districts (Cornett, 1984).

Factors causing states to endorse a career ladder plan

The interest in the career ladder movement can now be traced to national and state commission reports and the reform proposals which grow out of them. Depending upon the state, a number of factors have influenced the endorsement of career ladder plans. These factors range from activities planned before the emergence of the national reports, in particular, those associated with the Southern Regional Education Board (SREB); the personal and charismatic leadership of Governor Lamar Alexander of Tennessee; and the national reports that sparked the reform movement aimed at improving teacher salaries, making teaching more attractive, and retaining good teachers by providing opportunities for professional growth.

As a result of the criticism in education that was presented before 1983, some states were taking action to improve an unfavorable public

opinion, in particular, those in the Southern states who were perceived to be behind other states (Hunt, 1985). The SREB, formed in the late 1940s for purposes of developing an organization for higher education, now finds itself involved in a working relationship between K-12 schools and colleges (Cornett, 1985b). Currently, fourteen states participate (Alabama, Arkansas, Florida, Georgia, Kentucky, Louisiana, Maryland, Mississippi, North Carolina, South Carolina, Tennessee, Texas, Virginia, and West Virginia). The state of Oklahoma plans to join the consortium by January, 1986. All but two states (Louisiana and Oklahoma have pending legislation) have passed legislation endorsing a career ladder plan. This organization actively seeks ways in a collaborative effort to provide information that will assist legislatures and state boards of education in making decisions affecting education.

As early as June, 1981, an educational reform package was put together by Governor Graham of Florida, a lifetime advocate of education. This package listed twenty-five recommendations for school reform. Former Governor Winter of Mississippi was able to propose the first statewide reform package in 1982 (Cornett, 1985a; Peterson, 1985). Although there was "small talk" about the career ladder concept taking place, it was not until after Governor Lamar Alexander of Tennessee proposed the "Better Schools Program" did the emergence of the first statewide career ladder plan evolve. The efforts and endeavors of the Charlotte-Mecklenburg model provided support for movement in Tennessee (Cobb, 1985), and Alexander took steps to promote the concept (Cobb, 1985; Cornett, 1985b; Education Week, 1985b; Hunt, 1985). As a result,

Alexander has been recognized as a courageous political leader and many states have sought consultation from Tennessee.

As noted in the October 30, 1985, edition of Education Week, a number of potential factors have been listed to causing Alexander's endorsement of the concept which include (1) his political ambitions and sense of selecting issues that may influence his career; (2) his personal goals and ambitions (Cobb, 1985); (3) the criticism that he received during his first term for lowered per pupil expenditures for spending in education; (4) his parents' background as "schoolteachers"; (5) his sensitivity to the taxpayer wanting accountable; a general theme among governors in the South (Cornett, 1985a); (6) the completion of his two primary goals of restoring public confidence in state government and attracting new industry in the state; and (7) a personal belief that education is an important value:

I got into better schools because I found it was a way to get better jobs. The first two years, I set out to recruit industry. Then I realized that was not the answer. Most jobs are grown, not recruited (p. 16).

Cornett and Weeks (1985a) reported a number of issues states are examining as a result of national reports. According to Nathan (1985), consultant to the National Governor's Association, three factors have influenced governors to endorse the career ladder concept that include (1) the president's support of Alexander's idea; (2) the Metropolitan Life Insurance survey; (3) Al Shanker's vocal support of the career ladder concept.

Seventeen states have initiated actions endorsing the career ladder

concept through their state legislatures; five have involved multi-groups (California, Missouri, North Carolina, South Carolina, and Utah); and four through State Departments of Education (Alabama, Washington, West Virginia, and Wisconsin). Through personal telephone interviews, state "portraits" have been identified (see Appendix B):

Alabama. Out of national and state concerns, the state superintendent initiated a plan that included a broad range of issues and eventually gained support from the legislature. The legislature was opposed to across-the-board raises and wanted to develop a means to document quality performance if teachers received increases in pay.

Arizona. The school reform movement was primarily concerned with attracting and maintaining teachers resulting from national reports. The senator of the Education Committee provided the leadership; she was familiar with the pioneering efforts of Tennessee. The Governor, who was interested in merit pay, was not the primary innovator.

Arkansas. The Governor proposed a package and the legislature, having no interest in merit pay, passed legislation near the end of the session. The state of Tennessee was influential and Governor Alexander provided information when he established a Clearinghouse. The teachers are not supportive of merit pay; the school boards and administrators are.

California. The state was working on a staff development plan long before the mentor teacher program was approved involving the Governor, Speaker of the House, and State Superintendent. The movement exploded after Gary Sykes, former staff member of the National Institute of

Education, highlighted two major concepts in a presentation: (1) the notions of screens, a method of judging teacher competence; and (2) the concept of magnets, ways needed to attract good people. Reviews of the Houston and Charlotte-Mecklenburg plans were soon conducted and advice from major educational leaders from state universities and organizations were consulted. In the Houston plan, \$2,000 was offered as an incentive for outstanding performers which the committee thought was too low. As a result, the committee recommended the current \$4,000 offering as an incentive in the mentor teacher plan.

The Republicans were very supportive of the merit pay concept and viewed the plan as the best they could provide; the Democrats opposed the merit pay concept and viewed the plan as a career ladder with extra duties included. Overall, both sides claimed victory because they wanted to do something in the area of merit pay. In order to please other constituencies, the internal details of a mentor teacher plan were left open as negotiable items; however, district participation was not.

Colorado. School reform actions primarily stemmed from issues listed in the national reports, in particular, those listed in Nation At Risk. The initiative originated from the Republicans who control the majority of the legislature.

Delaware. In his bid for election, the Governor's priority in his campaign was based on national reports coming from the Education Commission of the States. Although the Governor is very supportive of a career ladder plan, the Senate (primarily Democratic) and the House (primarily Republican) have taken a less than active role selling the

concept. Opposition also exists in the educational community as well.

Although cautionary steps have been taken because of the struggles observed in Florida and Tennessee, the Governor has placed money in the budget for a career ladder plan. If this money is not used, it will be delegated for a management academy and evaluation development project.

Florida. Governor Graham has always been an advocate of education and active member of SREB. A strong message was coming forth from business and industry for desired changes in the educational system. Concerned with economic development, a push with legislative support for the development of a merit pay program was developed and implemented. The program has been opposed by large teacher organizations and is currently in litigation.

Georgia. Initiatives to develop a career ladder plan primarily resulted from national concerns and participation in the SREB.

Idaho. The foundation for the movement came from national reports and concerns. The career ladder plan was a compromise between the legislature, interested in developing a performance compensation plan, and the educational community, that was opposed. Now that the plan has been passed, the educational community has become more supportive and the legislature is "backing off" because of the amount of money it will take to fund the plan! Because this is an election year, raising taxes can be politically damaging.

Indiana. Three members have been added to the State Department of Education staff specifically for career ladder and professional development activities. Much attention has been focused on other state actions,

in particular Tennessee. A statewide poll was released soon after the Governor was elected that indicated people were not willing to pay more money for education until improvements were made. The educational community is supportive of the plan, but concerned about the evaluation process.

Kentucky. The movement resulted from the affiliation with SREB, in particular the leadership of Governor Alexander and his work in Tennessee.

Maine. The Governor responded to the national reports and focused his attention to helping only beginning teachers. This caused some uproar among experienced teachers. The plan now includes provisions for professional growth development.

Mississippi. Former Governor Bill Winter has always been an active advocate of education. The 1980-81 report from SREB provided guidelines which led to the first Educational Reform Act in 1982 under his leadership.

After a teacher strike took place in 1984, the legislature, in particular the House of Representatives, pushed for a plan that would be based on performance. As a result of the strike, the State Department of Education is charged with the responsibility of developing an effective performance appraisal system.

Missouri. The movement resulted from national activities and issues expressed in Nation At Risk.

New Jersey. Reform activities began back in July, 1982. Tom Cain, a former teacher, made education an issue in his campaign for Governor,

seeking to replace the Commissioner of Education if elected. He won and later accepted the resignation of the Commissioner. Although the career ladder plan has been approved, the teacher union vigorously opposes it and only one school district has volunteered to pilot the project.

North Carolina. The activities in neighboring states (Tennessee) and the Charlotte-Mecklenburg plan has been most influential in the development of the plan. Because of Charlotte-Mecklenburg's success, they are the only district in the state exempt from the state plan.

The pay system in the state was considered to be out of date; teachers who served eight years were dependent on legislative actions for pay increases. As a result, special interest groups applied pressure to influence the legislature to act. The legislature did and each group had to "give a little" which has resulted in mixed reaction to the plan.

South Carolina. The movement resulted from the affiliation with SREB. Southern states tended to be further behind in education with a history of poverty. A good education system could stimulate the economy; states had to become more innovative.

South Dakota. Initiatives resulted from national trends. Criteria have been developed but remain "on hold" because of conflict that exists with the Family Options law which allows parents to attend districts of their choosing. The career ladder concept is not a top priority in the school reform package.

Tennessee. The idea for a statewide career ladder plan originated from Governor Lamar Alexander and was supported by the work in Charlotte-Mecklenburg. Alexander, a Republican, was strongly opposed by the

teacher organizations.

Texas. The movement resulted from the affiliation with SREB. The career path had to become comparable for teachers, a predominant value that was reported in many national reports. The public wanted to pay higher salaries for teachers who performed well.

Under the old system, raising the starting teacher salary to \$21,000 would bankrupt the State. The career ladder concept solved the dilemma.

Utah. Initiatives resulted from national reports. The innovative plans of Ladue and Charlotte-Mecklenburg were reviewed and people were consulted. Since the state is primarily NEA controlled, teachers were allowed to select ratings for evaluation to determine the criteria for performance bonuses.

Virginia. Initiatives resulted from national activities and national reports. The Governor, a long-time advocate to education, had been trying to push for quality and improvement for some time.

Washington. The movement resulted from activities of other states. There has been some reluctance to do anything because of financial constraints.

West Virginia. Initiatives resulted from national reports and interest in focusing on good teachers. Initially, the task force opposed the idea of the career ladder concept because they did not want to take good teachers out of classroom. The legislature has now provided some funding for a career ladder plan.

Wisconsin. Generally, the state has been very progressive in

education and began looking at school reform before the national reports surfaced. There was general interest to provide incentives for teachers. Because of the experiences of other states, cautionary steps have been taken.

Related Research

In reviewing the literature, one study had been found that directed attention to the behaviors of master teachers (Benningfield et al., 1984). Two studies were found classifying behaviors of the master teacher (Bloom, 1982; Moore, 1984).

In the first study (Benningfield et al., 1984), a review is provided and based on a proposal for selecting master/mentor teachers for utilizing them in demonstration schools. Forty-five descriptors for identifying the master/mentor teacher were listed in the report. These characteristics were developed among university and school system educators from a year-long discussion intended to describe behaviors of a master teacher. Emphasis for earning the status of master teacher resulted from high levels of teaching skills and teacher effectiveness. Higher skills in the cognitive and affective domains tended to be beyond those required of competent teachers.

Similar to identifying descriptors of master teachers, Bloom (1982) and Moore (1984) classified behaviors. Bloom (1982) established four specific areas from his study of outstanding Olympic swimmers and concert pianists: (1) demonstrated knowledge of subject matter and general knowledge; (2) demonstrated teaching skill; (3) demonstrated ability to

gain student respect and nurture them along in the subject matter;
(4) demonstrated ability to produce results.

Based on the limitations of Bloom's study, Moore (1984) incorporated Bloom's findings and established three specific areas: (1) knowledge of the subject matter and general knowledge; (2) teaching skill; (3) ability to work with students and colleagues. Moore rejected the inclusion of "demonstrable results" until master teacher plans have been implemented and refined.

Regardless, all three studies emphasize the need to establish assessment procedures that are based on a consensus of behaviors to define the master teacher.

Summary

The review of literature concentrated on identifying behaviors of teachers that can be attributed to the identification of the master teacher. Three primary sources were investigated: (1) effective teaching research; (2) behaviors selected from the "conceptualized" teacher preparation system at ISU called "Pro*file"; and (3) states that have passed legislation to adopt career ladder plans. The underlying factors causing states to endorse a career ladder concept were identified.

The research on effective teaching provided vital evidence that certain teaching behaviors are significantly related to effective teaching. These behaviors can be classified under four general headings: planning, management, instruction, and climate. Effective teaching is a culmination of these behaviors that have produced positive student

gains.

One hundred performance elements were created from a careful review about effective teaching, competency lists from other teacher training institutions, concerns expressed by professional organizations, and input received from the professional teaching staff in the College of Education at ISU. Candidates who master these behaviors will perform effectively. Although supplementary to the regular teacher education program, students can reinforce their skills through a computerized resource and information file (PEMS) and/or computer-based video programs (TAMS).

States that have passed legislation to adopt career ladder plans are seeking ways to develop performance appraisal systems. Five states are interested in statewide criteria and eleven states are providing guidelines for teacher performance. Five other states are in the process of developing criteria. Seventeen states have initiated actions endorsing the career ladder concept through their state legislatures; five involved multi-groups; and four went through State Departments of Education.

CHAPTER 3--METHODOLOGY

Introduction

The major purpose of this study was to identify behaviors that could be used to identify the master teacher. Based on the premise that there exists a body of information that depicts effective teaching, this study centers on disaggregating the "best" teachers who might be termed "master teachers." Initially, attempts to gather teacher behaviors from a review of literature about the "master teacher" included such descriptors as master teacher, effective teaching, and school climate from the ERIC system. Further inquiries included a review of some dissertation abstracts, the ISU Pro*file, and surveys of states that have passed legislation to adopt career ladder plans. With very little information available defining the "master teacher" concept, attempts were chosen to include a number of sources that have valid and reliable powers. In order to develop a "portraiture" of the political factors that have caused states to adopt career ladder plans, telephone interviews were conducted.

The first source for review included research about the master teacher, effective teacher, and school climate. Attempts were made to identify teaching behaviors that produce student learning gains. Special attention was given to the work of Dunkin and Biddle (1974), Good et al. (1975), Good and Brophy (1984), Manatt and Stow (1984), Medley (1979b), and Rosenshine and Furst (1971). Additional time was spent to locate any new research that was listed under the descriptor, master teacher.

With the current criticism directed at teacher preparation programs, this researcher also chose to look at those behaviors from the "conceptualized" model in the ISU teacher education program termed Pro*file. Given that the Pro*file behaviors were derived from effective teaching research, other reviews from teacher training programs, suggestions from professional organizations, and the professional staff from the College of Education, it is assumed that students who master these behaviors will perform effectively.

A third source for review was a survey of those states that have passed legislation to adopt career ladder plans. Particular emphasis was placed on statewide performance appraisal instruments or suggested guidelines that could be used to identify criteria to determine outstanding performance of the "master teacher." Additional research was conducted to identify factors causing states to endorse career ladder plans.

More specifically, the following questions were used to accomplish the primary purpose of creating a profile of the master teacher:

1. What behaviors can be identified from the research on effective teaching to define the master teacher?
2. What related studies can be used to determine the identification of the master teacher?
3. What behaviors can be used from the ISU system "Pro*file" to determine the identification of the master teacher?
4. What behaviors listed on state teacher instruments can be used to determine the identification of the master teacher from those states that have passed legislation to adopt career ladder

- plans?
5. What behaviors from states providing guidelines for teacher performance can be used to determine the identification of the master teacher that have passed legislation to adopt career ladder plans?
 6. Are there any differences in the behaviors generated from the review on effective teaching to those behaviors in Pro*file and those behaviors from the states that have passed legislation to adopt career ladder plans?
 7. Are there any similarities in the behaviors generated from the review on effective teaching to those behaviors in Pro*file and those behaviors from the states that have passed legislation in defining the master teacher?
 8. Are there any similarities in the classification scheme for listing behaviors that can be found in the research from the sources used in this study to define the master teacher?
 9. Are there any differences among states that have statewide criteria that can be used to define the master teacher?
 10. Are there any states that have developed criteria to recognize the master teacher?
 11. What were the factors causing states to endorse career ladder plans?

Identification of Resource People and Information

In order to complete this study, attempts were made to contact resource people who could supply information about the career ladder

movement and the Pro*file project.

First and foremost, a list of contact persons were needed in order to identify what actions were being taken in the states. A list was received from Dr. James Mitchell, Deputy Superintendent from the Iowa Department of Public Instruction, identifying persons who may be involved in the dissemination of information regarding the career ladder movement in the states. These contact persons were called CEIS (Coordinators of Evaluation and Information Systems) officers, staff personnel in State Departments of Education. A letter was sent to them requesting information about statewide teacher evaluation instruments used in career ladder systems. A second letter was sent a month later to denoted officials (some in the State Department of Education and others in the Governor's office) listed as contact persons having information (see Appendix C) about career ladder plans (Education Week, 1985a). Follow-up telephone calls were made and additional letters were sent to referral contact sources.

Telephone interviews were held with those contact persons who were listed as additional reference persons in the Clearinghouse newsletter and were different from the persons already contacted (Cornett and Weeks, 1985b). A number of additional inquiries were made to the following sources: American Association of Colleges for Teacher Education (AACTE), American Association of School Administrators (AASA), Association for Supervision and Curriculum Development (ASCD), Association for Teacher Educators (ATE), U.S. Department of Education, Education Commission of the States (ECS), Educational Research Service (ERS), National Center for

Educational Information (NCEI), National Education Association (NEA), and the Southern Regional Education Board (SREB).

Second, ways were sought to gather information about Pro*file. A review of the minutes, readings of unpublished documents by Kniker and Warren, and discussions held with Steering Committee members and staff were conducted. The Coordinator was interviewed over the telephone. In addition, the TAMS and PEMS were reviewed and a meeting was held with researcher Volker.

Procedure for Analysis

The procedure for analysis is similar to that used by Manatt and Stow (1984) and the research teams for Pro*file. Instead of using a jury, this researcher used cross-tabulation of behaviors that appear to be consistent in the sources and also sought criteria which specifically identified the master teacher. The more likely a behavior showed up as criteria on all source lists, the more likely that criterion was used to define characteristics of the master teacher. Likewise, special consideration was given to states that identified criteria beyond that for effective performance. Some characteristics were also included because they were simply "sensible." Finally, the classification scheme of Manatt and Stow (1984) was used as a guideline in comparing the variety of behaviors since their system was based on effective teaching research. With the roles expected of master teachers as state career ladder plans develop, the employee rules and regulations defined in the system of Manatt and Stow (1984) provide potential guidelines for job

responsibilities beyond those required for classroom performance for master teachers.

No attempt was made to involve an "expert jury" because of the wide differences that exist in the opinion of jurors. Researchers have often turned to an expert jury to establish the "social validity" of a performance system. While this tends to "share" the responsibility (and perhaps, blame), jurors are no guarantee of success. For example, in a study to identify outstanding biology teachers, Dieter (1972) found a significant variance in the behaviors rated by a jury.

CHAPTER 4--ANALYSIS AND RESEARCH FINDINGS

Following a description of behaviors from effective teaching research, states that seek statewide performance criteria, states that suggest guidelines for teacher performance, Pro*file, and the related study conducted by Benningfield et al. (1984), a summary of all sources will be presented. Factors causing states to endorse a career ladder concept will then be identified. Tables listing behaviors and attributes will also be presented. Attributes were included because some criteria other than behaviors were listed in some sources for this study. Each table will follow the sequence listed in Table 1.

Effective Teaching Research

A comprehensive review of effective teaching research was conducted by Manatt and Stow (1984). Taken from the CATE/S (Computer Assisted Teacher Evaluation/Supervision) menu, twenty-four behaviors are listed, twenty-one substantiated by research on effective teaching. Table 2 presents the list of behaviors. Descriptors have been used by Manatt and Stow (1984) to define each behavior that has been validated by most sources used in this study. (This list is available in Clinical Manual for Teacher Performance Evaluation, copyright 1984, Iowa State Research Foundation, Inc. (ISURF), 315 Beardshear Hall, Ames, Iowa 50011):

1. The teacher demonstrates effective planning skills.
 - a. selects appropriate long-range goals.
 - b. writes instructional objectives that are related to long-range goals.

Table 1. Characteristics used in this study^a

Criteria	Behaviors/attributes
1.	Demonstrates effective planning skills
2.	Implements the lesson plan
3.	Motivates students
4.	Communicates effectively with students
5.	Provides students with specific evaluative feedback
6.	Prepares appropriate evaluative feedback
7.	Displays a thorough knowledge of curriculum and subject matter
8.	Selects learning content congruent with the prescribed curriculum
9.	Provides opportunities for individual differences
10.	Ensures student time on task
11.	Sets high expectations for student achievement
12.	Plans for and makes effective use of time, materials, and resources
13.	Demonstrates evidence of personal organization
14.	Sets high expectations for student behavior
15.	Organizes students for effective instruction
16.	Demonstrates effective interpersonal relationships with others
17.	Demonstrates awareness of the needs of students
18.	Promotes positive self-concept
19.	Demonstrates sensitivity in relating to students
20.	Promotes self-discipline and responsibility
21.	Demonstrates employee responsibilities
22.	Demonstrates a willingness to keep curriculum and instructional practices current
23.	Supports school regulations and policies
24.	Assumes responsibilities outside the classroom as they relate to school
25.	Demonstrates a broad base of knowledge in the history of mankind's social, physical, and psychological environments
26.	Participates in professional growth activities
27.	Takes a leadership role in improving education
28.	Develops a philosophy of education
29.	Knows historic and contemporary goals

^aBehaviors and attributes were compiled from the sources that were used in this study.

Table 1. (Continued)

Criteria	Behavior/attributes
30.	Knows the major professional journals
31.	Knows about the impact of social class in educational setting
32.	Knows the contribution of racial and ethnic groups
33.	Knows the options and alternatives within and outside of public school system
34.	Knows the major influences of community/nation on school curriculum
35.	Knows the historical development of the American public school system
36.	Knows the legal rights of teachers
37.	Knows legislation regarding school policies
38.	Knows the organizational structure of school districts and ways to effect change
39.	Knows the responsibility of local/state and federal levels regarding education
40.	Knows the trends and issues within the teaching profession
41.	Knows the characteristics of major teaching organizations
42.	Knows the job conditions that affect satisfaction level
43.	Knows "help" sources to prevent or alleviate teacher burnout
44.	Knows trends in teacher supply and demand
45.	Knows job interview techniques
46.	Evaluates another teacher's performance
47.	Displays knowledge of learning theories, educational psychology, and children
48.	Involved in action and applied research in the classroom and school
49.	Willing to travel
50.	Demonstrates a professional, personal, and psychological security with self
51.	Secures a masters degree, additional credit, or the equivalent
52.	Demonstrates a history of high student achievement in classes taught
53.	Demonstrates a willingness to expand effort and energy beyond the typical school day
54.	Commitment to the classroom
55.	Commitment to education
56.	Commitment to children
57.	Ability to handle complex situations
58.	Highly creative
59.	Independent thinker
60.	Process-oriented
61.	Bright

Table 1. (Continued)

Criteria	Behaviors/attributes
62.	Ability to be original
63.	Ability to develop support systems for teachers and others
64.	Ability to bring out the best in others
65.	Has earned the respect of peers, parents, and the total school community
66.	Contributes significantly to the quality of life in schools
67.	Substantial years of experience in public schools
68.	Service on career level prior to that of master teacher status
69.	Demonstrated teaching ability (exemplary) as shown in ratings or evaluations
70.	Maintains superior attendance

Table 2. Summary from effective teaching^a

Behaviors (CATES)/attributes	Eff.
1. Demonstrates effective planning skills	x
2. Implements the lesson plan	x
3. Motivates students	x
4. Communicates effectively with students	x
5. Provides students with specific evaluative feedback	x
6. Prepares appropriate evaluative feedback	x
7. Displays a thorough knowledge of curriculum and subject matter	x
8. Selects learning content congruent with the prescribed curriculum	x
9. Provides opportunities for individual differences	x
10. Ensures student time on task	x
11. Sets high expectations for student achievement	x
12. Plans for and makes effective use of time, materials, and resources	x
13. Demonstrates evidence of personal organization	x
14. Sets high expectations for student behavior	x
15. Organizes students for effective instruction	x
16. Demonstrates effective interpersonal relationships with others	x
17. Demonstrates awareness of the needs of students	x
18. Promotes positive self-concept	x
19. Demonstrates sensitivity in relating to students	x
20. Promotes self-discipline and responsibility	x
21. Demonstrates employee responsibilities	
22. Demonstrates a willingness to keep curriculum and instructional practices current	x
23. Supports school regulations and policies	
24. Assumes responsibilities outside the classroom as they relate to school	

^aLists of criteria are listed in Clinical Manual for Teacher Performance Evaluation, copyright 1984, Iowa State Research Foundation, Inc. (ISURF), 315 Beardshear Hall, Ames, Iowa 50011. A variety of measuring instruments can be obtained from SIM, E005 Quadrangle, Iowa State University, Ames, Iowa 50011.

- c. selects objectives at the correct level of difficulty to assure successful learning experiences for each student.
 - d. includes teaching methods and procedures relevant to the objective.
 - e. includes relevant student activities.
 - f. utilizes both formative and summative evaluation procedures.
 - g. plans appropriate time allotment.
 - h. selects a variety of teaching methods and procedures along with a variety of student activities to use.
2. The teacher implements the lesson plan.
- a. reviews and previews.
 - b. provides the structure for learning.
 - c. states instructional objectives.
 - d. provides input related to objectives.
 - e. models activities congruent with topic being taught and provides guided practice to reinforce concepts.
 - f. utilizes summary techniques.
 - g. provides independent practice activities.
 - h. indicates positive directions for moving from one activity to the next.
 - i. checks for understanding.
3. The teacher motivates students.
- a. communicates challenging scholastic expectations to students.

- b. responds positively to students.
 - c. stimulates students by choosing proper materials and techniques.
 - d. gives feedback to students.
 - e. uses methods to stimulate creative expression.
 - f. stimulates creative thinking.
 - g. promotes active participation during the lessons.
4. The teacher communicates effectively with students.
- a. speaks clearly.
 - b. puts ideas across logically.
 - c. uses a variety of verbal and nonverbal techniques.
 - d. praises, elicits, and responds to student questions before proceeding.
 - e. gives clear, explicit directions.
 - f. utilizes probing techniques.
 - g. provides structuring comments which clarify the tasks and help the lesson proceed smoothly.
5. The teacher provides students with specific evaluative feedback.
- a. gives written comments, as well as points or scores.
 - b. returns test results as quickly as possible.
 - c. makes opportunities for one-to-one conferences.
 - d. administers district-constructed, criterion-reference tests, and/or standardized tests.
 - e. interprets test results to students and parents.

6. The teacher prepares appropriate evaluation activities.
 - a. makes methods of evaluation clear and purposeful.
 - b. uses pre- and posttests.
 - c. monitors student progress through a series of formative and summative evaluation techniques.
 - d. prepares tests which reflect course content.
7. The teacher displays a thorough knowledge of curriculum and subject matter.
 - a. designates the purpose of the topic or activity.
 - b. relates specific topics or activities to content area.
 - c. explains topics or activities in context.
 - d. uses appropriate examples and illustrations.
 - e. teaches accurate and up-to-date information.
 - f. identifies the subset of skills that are essential for accomplishing the instructional objective(s) of the lesson.
8. The teacher selects learning content congruent with the prescribed curriculum.
 - a. develops lesson plans which reflect the school organization's prescribed curriculum.
 - b. seeks and uses the advice of education specialists in content areas.
 - c. prepares course outline(s) which reflects the prescribed curriculum.
 - d. coordinates learning content with instructional objectives(s).

9. The teacher provides opportunities for individual differences.
 - a. uses knowledge of individual students to design educational experiences.
 - b. paces learning according to students' mastery of content.
 - c. provides extra help and enrichment activities.
 - d. presents subject matter which is appropriate for abilities and interests of the students.
 - e. provides multimodal instruction to accommodate a variety of learning styles.
 - f. uses school and community resources to gain knowledge and understanding of students.
 - g. implements Individualized Educational Programs (IEPs) as required.
10. The teacher ensures student time on task.
 - a. schedules learning time according to policy for the subject area(s).
 - b. begins class work promptly.
 - c. reinforces students who are spending time on task.
 - d. minimizes management time.
 - e. minimizes transition time.
11. The teacher sets high expectations for student achievement.
 - a. establishes expectations for students based on a level of skills acquisition appropriate to their ability level.
 - b. uses concrete, firsthand information about students.
 - c. requires students to meet the prerequisites for promotion.

- d. promotes personal goal setting.
12. The teacher plans for and makes effective use of time, materials, and resources.
- a. uses supplementary materials effectively.
 - b. blends materials and resources smoothly into a lesson.
 - c. creates materials to use.
 - d. identifies available resources to use.
13. The teacher demonstrates evidence of personal organization.
- a. maintains classroom organization for efficient distribution of learning materials.
 - b. incorporates into daily planning content from previous levels for reinforcement and anticipates content from future grade levels to ensure continuity and sequence.
 - c. shows evidence of adequate lesson preparation and organization of work with objectives clearly in mind.
 - d. makes materials readily available to the students.
 - e. provides adequate plans and procedures for substitute teachers.
14. The teacher sets high standards for student behavior.
- a. manages discipline problems in accordance with administrative regulations, school board policies, and legal requirements.
 - b. establishes and clearly communicates parameters for student classroom behavior.
 - c. promotes self-discipline.

- d. manages disruptive behavior constructively.
 - e. demonstrates fairness and consistency in the handling of student problems.
15. The teacher organizes students for effective instruction.
- a. uses grouping to encourage peer group interaction.
 - b. makes use of the physical school environment to support current learning activities.
 - c. makes certain that procedures avoid or reduce WAIT TIME for each student.
 - d. groups students according to their instructional needs.
 - e. varies size of groups according to instructional objective.
 - f. creates a set of guidelines for students to follow when doing small group work.
 - g. provides orientation for new students.
16. The teacher demonstrates effective interpersonal relationships with others.
- a. makes use of support services as needed.
 - b. shares ideas, materials, and methods with other teachers.
 - c. informs administrators and/or appropriate personnel of school related matters.
 - d. enhances community involvement with the school.
 - e. cooperates with parents in the best interests of the student.
 - f. supports and participates in parent-teacher activities.
 - g. works well with other teachers and the administration.

- h. provides a climate which opens up communications between the teacher and the parent.
 - i. has positive relationships with students individually and in groups.
17. The teacher demonstrates awareness of the needs of students.
- a. shows awareness of needs and ability to deal with exceptional students.
 - b. shows sensitivity to physical development of students.
 - c. is aware of special health needs of students.
 - d. recognizes and deals with substance abuse by students.
18. The teacher promotes positive self-concept.
- a. provides opportunities for all students to achieve recognition for constructive behavior.
 - b. provides opportunity for each student to meet success regularly.
 - c. promotes student self-control.
 - d. promotes positive self-image in students.
19. The teacher demonstrates sensitivity in relating to students.
- a. is readily available to all students.
 - b. acknowledges the rights of others to hold differing views or values.
 - c. gives criticism which is constructive; praise which is appropriate.
 - d. makes an effort to know each student as an individual.
 - e. uses discretion in handling confidential information and

difficult situations.

- f. is a willing listener.
 - g. communicates with students sympathetically, accurately, and with understanding.
20. The teacher promotes self-discipline and responsibility.
- a. helps students develop efficient learning skills and work habits.
 - b. creates a climate in which students display initiative and assume a personal responsibility for learning.
21. The teacher demonstrates employee responsibilities.
- a. responds appropriately to parental concerns.
 - b. is punctual.
 - c. provides accurate data to the school, area, and district as requested for management purposes.
 - d. completes duties accurately and promptly.
22. The teacher demonstrates a willingness to keep curriculum and instructional practices current.
- a. participates in curriculum review, revision, and/or developmental activities.
 - b. adapts new teaching practices as they are validated by research and as they properly apply to the adopted model of school learning for the school organization.
 - c. aligns carefully the functional classroom curriculum taught with the school organization's curriculum guide and the state course of study.

23. The teacher supports school regulations and policies.
 - a. adheres to authorized policies.
 - b. selects appropriate channels for resolving concerns/problems.
 - c. participates in the development and review of school policies and regulations.
 - d. strives to stay informed regarding policies and regulations applicable to his/her position.
24. The teacher assumes responsibilities outside the classroom as they relate to school.
 - a. assumes necessary noninstructional responsibilities.
 - b. exercises reasonable responsibility for student management throughout the entire building.

States Seeking Statewide Performance Criteria

Five states are seeking to determine statewide performance criteria. Four states have identified behaviors in their performance appraisal instruments. Alabama is only beginning and has no information that is available at this time. With the exception of Florida and Tennessee, the other two states are piloting or developing statewide performance criteria. Texas, for example, has recently developed its first draft on October 19, 1985. Even though Tennessee has a list of behaviors, a new indicator, "Improving Student Performance," has been included for field testing during the school year 1985-86. This new indicator will not be included in any teacher's final evaluation results during this

school year. However, the state is concerned with ways to measure high student achievement in classes taught by teachers as well as ways to measure the changes in students' attitudes toward learning.

Table 3 presents a list of behaviors that have been taken from statewide performance appraisal instruments. Using the CATE/S menu as a guide to classify behaviors, all four states list the first twenty behaviors in their instruments. Three states (North Carolina, Tennessee, and Texas) include behaviors twenty-one, twenty-three, and twenty-four. Two states (North Carolina and Tennessee) also include behavior twenty-two. Beyond the CATE/S list, these same two states list two additional behaviors in their instruments: (1) the teacher participates in professional growth activities and (2) the teacher takes a leadership role in improving education. Some possible descriptors of these behaviors include:

1. The teacher participates in professional growth activities.
 - a. takes formal coursework related to teaching assignment/ advancement.
 - b. obtains graduate degree(s) related to teaching assignment/ advancement.
 - c. participates in "non-required" staff development activities.
 - d. demonstrates commitment by participation in activities (professional organizations, workshops, conferences).
2. The teacher takes a leadership role in improving education.
 - a. conducts workshops/training sessions.
 - b. holds a leadership position in school/school system.

Table 3. States seeking statewide performance criteria

Behaviors/attributes	Fl.	N.C.	Tenn.	Tex.
1. Demonstrates effective planning skills	x	x	x	x
2. Implements the lesson plan	x	x	x	x
3. Motivates students	x	x	x	x
4. Communicates effectively with students	x	x	x	x
5. Provides students with specific evaluative feedback	x	x	x	x
6. Prepares appropriate evaluative feedback	x	x	x	x
7. Displays a thorough knowledge of curriculum and subject matter	x	x	x	x
8. Selects learning content congruent with the prescribed curriculum	x	x	x	x
9. Provides opportunities for individual differences	x	x	x	x
10. Ensures student time on task	x	x	x	x
11. Sets high expectations for student achievement	x	x	x	x
12. Plans for and makes effective use of time, materials, and resources	x	x	x	x
13. Demonstrates evidence of personal organization	x	x	x	x
14. Sets high expectations for student behavior	x	x	x	x
15. Organizes students for effective instruction	x	x	x	x
16. Demonstrates effective interpersonal relationships with others	x	x	x	x
17. Demonstrates awareness of the needs of students	x	x	x	x
18. Promotes positive self-concept	x	x	x	x
19. Demonstrates sensitivity in relating to students	x	x	x	x
20. Promotes self-discipline and responsibility	x	x	x	x
21. Demonstrates employee responsibilities		x	x	x
22. Demonstrates a willingness to keep curriculum and instructional practices current		x	x	
23. Supports school regulations and policies		x	x	x
24. Assumes responsibilities outside the classroom as they relate to school		x	x	x
26. Participates in professional growth activities		x	x	
27. Takes a leadership role in improving education		x	x	
52. Demonstrates a history of high achievement in classes taught			x	
70. Maintains superior attendance			x	

- c. receives special honor(s).
- d. holds leadership position in educational organizations.
- e. takes an active role in resolving school problems.
- f. initiates activities and projects in the school.

Two other behaviors are added by Tennessee that involve a demonstration of high achievement in classes taught and a record of superior attendance.

Of all the statewide appraisal instruments, North Carolina defines the superior teacher as one who continuously seeks to expand the scope of criteria and constantly undertakes additional responsibilities.

In addition to statewide performance appraisal instruments, descriptors were found in state reform acts, legislative rules, and/or educational reports that provide state expectations of master teachers. The descriptors, as shown in Table 4, identify four states seeking statewide performance criteria as well as eleven additional states that provide guidelines for teacher performance. The most predominant descriptors expected of master teachers include: (1) substantial years of experience in public schools; (2) service on career level prior to that of master teacher status; (3) demonstrated teaching ability (exemplary) as shown in ratings or evaluations; (4) documented superior student performance; (5) demonstrated leadership activities; (6) professional growth indicators; and (7) demonstrated expertise shown by a master teacher examination.

A number of roles have also been suggested by states. Table 5 presents a number of possibilities. The most significant appear to include

Table 4. Descriptors found in state reform acts, rules, or educational reports^a

Descriptors	Az	Ar	Ca	Fl	Ga	Ky	Mo	NC	NJ	SC	SD	Tn	Tx	Ut	WV
1. Substantial years of experience in public schools (67)	x	x	x	x		x	x	x		x		x	x	x	x
2. Service on career level prior to that of master teacher status (68)	x	x		x	x	x	x	x	x	x	x	x	x	x	x
3. Demonstrated teaching ability (exemplary) as shown in ratings or evaluations (69)	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x
4. Hold a master's degree, additional academic credit, or equivalent (51)				x		x		x			x	x	x		
5. Superior attendance (70)								x		x					x
6. Documented superior student performance (52)	x		x	x	x	x				x				x	x
7. Demonstrated leadership activities (Steering Committee chairperson, textbook selections member, curriculum chair, department chair, grade-level chair, etc.) (27)			x	x		x	x	x	x	x			x	x	x
8. Professional growth indicators (26)	x					x	x	x				x		x	x
9. Respected by peers and parents (65)			x					x	x		x			x	x
10. Willing to accept extended contracts (24)						x		x				x			
11. Demonstrated expertise shown by a master teacher examination (7)	x	x	x	x	x	x			x				x		x

^aThe parentheses () after each descriptor represent the related behavior/attribute where this characteristic is listed in Table 1.

Table 5. Descriptors of roles found in state reform acts, rules, or educational reports^a

Roles	Az	Ar	Ca	Fl	Ga	Ky	Mo	NC	NJ	SC	SD	Tn	Tx	Ut	WV
1. Assists student and beginning teachers (63)			x	x			x	x	x	x	x	x		x	x
2. Participates in curriculum development (22)			x	x		x	x	x	x	x	x	x		x	
3. Helps established teachers improve teaching skills (63)			x				x	x	x		x	x		x	
4. Trains and supervises volunteers, aides, etc. (63)					x	x	x	x	x	x				x	
5. Undertakes educational assignments directed at establishing positive relationships with the community, businesses, parents (16)						x	x			x				x	x
6. Undertakes individual projects; works with special students (17)						x	x			x		x			
7. Conducts educational research (48)							x		x	x					
8. Designs classroom instructional materials for district use (62)						x	x		x	x					
9. Publishes (62)										x					x

^aThe parentheses () after each role represent the related behavior/attribute where this characteristic is listed in Table 1.

the following: assisting student and beginning teachers, participating in curriculum development, helping established teachers improve teaching skills, and training and supervising volunteers, aides, etc.

States that Suggest Guidelines for Teacher Performance

Eleven states provide guidelines for teacher performance. The majority of suggestions are supported by teacher effectiveness research. Table 6 presents a list of behaviors that have been taken from suggestions provided by the states. Of those, Arizona, Arkansas, and South Dakota primarily focus on guidelines for teacher certification. California provides suggestions for recognition of mentor teachers, Missouri lists specific behaviors to define exemplary performance, and New Jersey lists specific criteria for recognition of master teachers (see Appendix D). Besides teaching behaviors, Arizona, California, and New Jersey have included some attributes (see Table 6).

All of the eleven states provide suggestions to include behaviors one to twenty (see Table 6) as potential criteria for evaluating teacher performance. Six states include behavior twenty-one; five, behaviors twenty-two, twenty-three, and twenty-six; and four, behaviors twenty-four and twenty-seven. Arizona adds an additional behavior and three attributes primarily for the purpose of teacher certification requirements. The teacher should: (1) know the historical development of the American public school system; (2) know the legal rights of teachers; (3) know the responsibility of local/state and federal levels regarding education; and (4) display knowledge of learning theories, educational

Table 6. States having guidelines for teacher performance^a

Behaviors/attributes	Az	Ar	Ca	Ga	Ky	NJ	Mo	SC	SD	Ut	WV
1. Demonstrates effective planning skills	x	x	x	x	x	x	x	x	x	x	x
2. Implements the lesson plan	x	x	x	x	x	x	x	x	x	x	x
3. Motivates students	x	x	x	x	x	x	x	x	x	x	x
4. Communicates effectively with students	x	x	x	x	x	x	x	x	x	x	x
5. Provides students with specific evaluative feedback	x	x	x	x	x	x	x	x	x	x	x
6. Prepares appropriate evaluative feedback	x	x	x	x	x	x	x	x	x	x	x
7. Displays a thorough knowledge of curriculum and subject matter	x	x	x	x	x	x	x	x	x	x	x
8. Selects learning content congruent with the prescribed curriculum	x	x	x	x	x	x	x	x	x	x	x
9. Provides opportunities for individual differences	x	x	x	x	x	x	x	x	x	x	x
10. Ensures student time on task	x	x	x	x	x	x	x	x	x	x	x
11. Sets high expectations for student achievement	x	x	x	x	x	x	x	x	x	x	x
12. Plans for and makes effective use of time, materials, and resources	x	x	x	x	x	x	x	x	x	x	x
13. Demonstrates evidence of personal organization	x	x	x	x	x	x	x	x	x	x	x
14. Sets high expectations for student behavior	x	x	x	x	x	x	x	x	x	x	x
15. Organizes students for effective instruction	x	x	x	x	x	x	x	x	x	x	x
16. Demonstrates effective interpersonal relationships with others	x	x	x	x	x	x	x	x	x	x	x
17. Demonstrates awareness of the needs of students	x	x	x	x	x	x	x	x	x	x	x
18. Promotes positive self-concept	x	x	x	x	x	x	x	x	x	x	x
19. Demonstrates sensitivity in relating to students	x	x	x	x	x	x	x	x	x	x	x
20. Promotes self-discipline and responsibility	x	x	x	x	x	x	x	x	x	x	x
21. Demonstrates employee responsibilities	x				x	x	x			x	x

^aThe state of South Carolina has mandated statewide criteria for beginning teachers only. For teachers with one year experience, the state allows local districts to develop criteria which include ten recommended items.

Table 6. (Continued)

Behaviors/attributes	Az	Ar	Ca	Ga	Ky	NJ	Mo	SC	SD	Ut	WV
22. Demonstrates a willingness to keep curriculum and instructional practices current	x			x		x	x			x	
23. Supports school regulations/policies					x	x	x			x	x
24. Assumes responsibilities outside the classroom as they relate to school	x				x	x	x				
25. Demonstrates a broad base of knowledge in the history of mankind's social, physical, and psychological environments	x			x							
26. Participates in professional growth activities	x				x		x			x	x
27. Takes a leadership role in improving education			x			x	x			x	
35. Knows the historical development of the American public school system	x										
36. Knows the legal rights of teachers	x										
39. Knows the responsibility of local/state and federal levels regarding education	x										
47. Displays knowledge of learning theories, educational psychology, and children	x										
54. Commitment to the classroom			x			x					
55. Commitment to education						x					
57. Ability to handle complex situations						x					
64. Ability to bring out the best in others						x					
65. Has earned the respect of peers, parents, and the total school community			x			x					
66. Contributes significantly to the quality of life in schools						x					

psychology, and children.

California suggests that mentor teachers must display commitment to the classroom and earn the respect of their peers and colleagues. New Jersey not only suggests these two attributes, but also adds the following in recognizing master teachers: (1) commitment to education; (2) ability to handle complex situations; (3) ability to bring out the best in others; and (4) being able to contribute significantly to the quality of life in schools.

Tables 4 and 5 identify descriptors and roles that were found in state reform acts, legislative rules, and/or educational reports that provide additional expectations of master teachers from states that suggest guidelines for teacher performance.

Pro*file

The system Pro*file is a dynamic concept that is only partially completed. The eleven-step process is only a conceptualized notion; PEMS is partially completed and modifications have been made since the original list was developed; more videotapes may be added to the TAMS collection. The performance elements (PEMS) are reviews that supplement the formal teacher education program that are deemed essential for effective teaching. TAMS provide opportunities for students to improve their teaching skills by observing and assessing vignettes of classroom teaching. These vignettes depict behaviors that are observable.

PEMS

Originally, one hundred performance elements were selected as potential criteria influencing effective teaching. A number of these elements are similar to behaviors and attributes that have been described in CATE/S and/or the criteria being used or suggested by the states.

Table 7 provides a summary of those performance elements that are related.

In addition, there are a number of performance elements that have been selected. Table 8 provides a list of performance elements beyond those identified in Table 7. The student:

- a. develops a philosophy of education.
- b. knows historic and contemporary goals.
- c. knows major professional journals.
- d. knows about the impact of social class in educational setting.
- e. knows the contribution of racial and ethnic groups.
- f. knows the options and alternatives within and outside of public school system.
- g. knows the major influences of community/nation on school curriculum.
- h. knows legislation regarding school policies.
- i. knows the organizational structure of school districts and ways to effect change.
- j. knows the trends and issues within the teaching profession.
- k. knows the characteristics of major teaching organizations.
- l. knows the job conditions that affect satisfaction level.

Table 7. Cross-reference of Pro*file to classification scheme^a

Criteria number	PEMS	TAMS
1.	G-4, K-2, L-3, M-2	
2.	K-5, T-4	Organization
3.	A-3, B-3, F-3, G-1, G-2, I-2, J-2, P-1, S-3, T-3	Motivation/Involvement
4.	F-1, M-1	Explanations/Communication
5.	Z-1	
6.	W-1, W-2, Y-1, Y-2, Y-3, Z-2	
7.	A-1, K-1, O-3	Knowledge
8.	L-2	
9.	B-1, B-2, G-3, L-1, L-4, P-4, T-1, U-3, V-1, W-3	
10.	S-5, T-2	Efficiency
11.	H-2, O-2, S-1, S-2, X-1	
12.	P-2	Resources
13.	K-3, O-1, BB-2	Setting
14.	U-2, AA-1, AA-2, BB-1, CC-1, CC-2, CC-3, CC-4	
15.	P-3, S-4	
16.	K-4, Z-3	
17.	F-2, M-3, U-1	
18.	H-3	Sensitivity
19.	H-1, I-5, J-1, J-3, J-4	Sensitivity
20.	S-6, X-2	
22.	I-1	
23.	I-3	
26.	I-4	
27.	C-3, D-3, D-4	
35.	B-5	
36.	C-1	
39.	C-4	
50.		Poise

^aSee Appendix B for a listing of the descriptions for the classification scheme used by the research team for PEMS.

Table 8. Summary from Pro*file

Behaviors/attributes	PEMS	TAMS
1. Demonstrates effective planning skills	x	
2. Implements the lesson plan	x	x
3. Motivates students	x	x
4. Communicates effectively with students	x	x
5. Provides students with specific evaluative feedback	x	
6. Prepares appropriate evaluative feedback	x	
7. Displays a thorough knowledge of curriculum and subject matter	x	x
8. Selects learning content congruent with the prescribed curriculum		
9. Provides opportunities for individual differences	x	
10. Ensures student time on task	x	x
11. Sets high expectations for student achievement	x	
12. Plans for and makes effective use of time, materials, and resources	x	x
13. Demonstrates evidence of personal organization	x	x
14. Sets high expectations for student behavior	x	
15. Organizes students for effective instruction	x	
16. Demonstrates effective interpersonal relationships with others	x	
17. Demonstrates awareness of the needs of students	x	
18. Promotes positive self-concept	x	x
19. Demonstrates sensitivity in relating to students	x	x
20. Promotes self-discipline and responsibility	x	
21. Demonstrates employee responsibilities	x	
22. Demonstrates a willingness to keep curriculum and instructional practices current	x	
23. Supports school regulations and policies	x	
26. Participates in professional growth activities	x	
27. Takes a leadership role in improving education	x	
28. Develops a philosophy of education	x	
29. Knows historic and contemporary goals	x	
30. Knows major professional journals	x	
31. Knows about the impact of social class in educational setting	x	
32. Knows the contribution of racial and ethnic groups	x	
33. Knows options and alternatives within and outside the public school system	x	

Table 8. (Continued)

Behaviors/attributes	PEMS	TAMS
34. Knows the major influences of community/nation on school curriculum	x	
35. Knows the historical development of the American public school system	x	
36. Knows the legal rights of teachers	x	
37. Knows legislation regarding school policies	x	
38. Knows the organizational structure of school districts and ways to effect change	x	
39. Knows the responsibility of local/state and federal levels regarding education	x	
40. Knows the trends and issues within the teaching profession	x	
41. Knows the characteristics of major teaching organizations	x	
42. Knows the job conditions that affect satisfaction level	x	
43. Knows "help" sources to prevent or alleviate teacher burnout	x	
44. Knows the trends in teacher supply and demand	x	
45. Knows job interview techniques	x	
46. Evaluates another teacher's performance	x	
50. Demonstrates a professional, personal, and psychological security with self		x

- m. knows "help" sources to prevent or alleviate teacher burnout.
- n. knows trends in teacher supply and demand.
- o. knows job interview techniques.
- p. evaluates another teacher's performance.

TAMS

Currently, there are descriptions of eleven observable teaching behaviors. Ten behaviors were found to be related to other criteria. These behaviors include Organization, Motivation, Involvement, Explanations, Communications, Knowledge, Efficiency, Resources, Setting, and Sensitivity. Of the ten, Sensitivity was found to be related to two different behaviors. Table 7 provides a summary of TAMS to PEMS and other criteria. Table 8 also provides a list of TAMS.

The eleventh observable behavior is Poise. Volker defines Poise as "stage presence, charisma, or charm" (1985, p. 23).

Benningfield et al. Study

The only related study that attempts to define behaviors of the master teacher was conducted by Benningfield et al. (1984). This year-long dialogue included attributes. Table 9 provides a list of characteristics that were attributed to defining the master teacher for purposes of serving in demonstration schools. Behaviors one through twenty, twenty-two, twenty-six, twenty-seven, forty-eight, fifty, fifty-two, sixty-three, and sixty-four were listed. Likewise, the following attributes included forty-seven, fifty-one, fifty-four, fifty-five, and fifty-seven. A number of additional characteristics were listed. The

Table 9. Summary of Benningfield et al. study

Behaviors/attributes	Benn.
1. Demonstrates effective planning skills	x
2. Implements the lesson plan	x
3. Motivates students	x
4. Communicates effectively with students	x
5. Provides students with specific evaluative feedback	x
6. Prepares appropriate evaluative feedback	x
7. Displays a thorough knowledge of curriculum and subject matter	x
8. Selects learning content congruent with the prescribed curriculum	x
9. Provides opportunities for individual differences	x
10. Ensures student time on task	x
11. Sets high expectations for student achievement	x
12. Plans for and makes effective use of time, materials, and resources	x
13. Demonstrates evidence of personal organization	x
14. Sets high expectations for student behavior	x
15. Organizes students for effective instruction	x
16. Demonstrates effective interpersonal relationships with others	x
17. Demonstrates awareness of the needs of students	x
18. Promotes positive self-concept	x
19. Demonstrates sensitivity in relating to students	x
20. Promotes self-discipline and responsibility	x
22. Demonstrates a willingness to keep curriculum and instructional practices current	x
26. Participates in professional growth activities	x
27. Takes a leadership role in improving education	x
34. Knows the major influence of community/nation on school curriculum	x
47. Displays knowledge of learning theories, educational psychology, and children	x
48. Involved in action and applied research in the classroom and school	x
49. Willing to travel	x
50. Demonstrates a professional, personal, and psychological security with self	x
51. Secures a master's degree, additional credit	x
52. Demonstrates a history of high student achievement in classes taught	x
53. Demonstrates a willingness to expand effort and energy beyond the typical school day	x
54. Commitment to classroom	x

Table 9. (Continued)

Behaviors/attributes	Benn.
55. Commitment to education	x
56. Commitment to children	x
57. Ability to handle complex situations	x
58. Highly creative	x
59. Independent thinker	x
60. Process-oriented	x
61. Bright	x
62. Ability to be original	x
63. Ability to develop support systems for teachers	x
64. Ability to bring out the best in others	x

master teacher must be:

- a. willing to travel.
- b. willing to spend effort and energy beyond the typical school day.
- c. committed to education.
- d. highly creative.
- e. an independent thinker.
- f. process-oriented.
- g. bright.

Summary of All Sources

A number of behaviors and attributes were found among the sources that were used for this study. The most significant behaviors and attributes include the following:

1. demonstrates effective planning skills.
2. implements the lesson plan.
3. motivates students.
4. communicates effectively with students.
5. provides students with specific evaluative feedback.
6. prepares appropriate evaluative feedback.
7. displays a thorough knowledge of curriculum and subject matter.
8. selects learning content congruent with the prescribed curriculum.
9. provides opportunities for individual differences.
10. ensures student time on task.

11. sets high expectations for student achievement.
12. plans for and makes effective use of time, materials, and resources.
13. demonstrates evidence of personal organization.
14. sets high expectations for student behavior.
15. organizes students for effective instruction.
16. demonstrates effective interpersonal relationships with others.
17. demonstrates awareness of the needs of students.
18. promotes positive self-concept.
19. demonstrates sensitivity in relating to students.
21. demonstrates employee responsibilities.
22. demonstrates a willingness to keep curriculum and instructional practices current.
23. supports school regulations and policies.
24. assumes responsibilities outside the classroom as they relate to school.
26. participates in professional growth activities.
27. takes a leadership role in improving education.
51. secures a master degree.
52. demonstrates a history of high student achievement in classes taught.
62. ability to be original.
63. ability to develop support systems for teachers and others.
65. has earned the respect of peers, parents, and the total school community.

67. substantial years of experience in public schools.
68. service on career level prior to that of master teacher status.
69. demonstrated teaching ability (exemplary) as shown in ratings or evaluations.

Table 10 provides a summary report of the behaviors and attributes that were listed from the sources used in this study.

Factors Causing States to Endorse a Career Ladder Concept

Three factors were identified causing states to endorse a career ladder concept. These factors were: action taken prior to the national reports, the influence of Governor Lamar Alexander, and reactions to the national reports. Table 11 provides a list of the twenty-six states that have passed legislation endorsing a career ladder concept. Of the twenty-six states, nine states reported reform actions prior to the national reports, four states gave direct credit to Governor Alexander's leadership ability, and eleven states reacted to the national reports. California and Georgia were contemplating school reform before the national reports and became more actively involved after the national reports surfaced. Arizona credited Alexander and reacted to the national reports.

Table 10. Summary of all sources

Behaviors/attitudes	Az	Ar	Ca	Fl	Ga	Ky	Mo	NC	NJ	SC	SD	Tn	Tx	Ut	WV	Eff	PEMS	TAMS	Benn
1. Demonstrates effective planning skills	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x		x
2. Implements the lesson plan	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x
3. Motivates students	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x
4. Communicates effectively with students	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x
5. Provides students with specific evaluative feedback	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x		x
6. Prepares appropriate evaluative feedback	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x		x
7. Displays a thorough knowledge of curriculum and subject matter	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x
8. Selects learning content congruent with the prescribed curriculum	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x		x
9. Provides opportunities for individual differences	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x		x
10. Ensures student time on task	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x
11. Sets high expectations for student achievement	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x		x
12. Plans for and makes effective use of time, materials, and resources	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x
13. Demonstrates evidence of personal organization	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x
14. Sets high expectations for student behavior	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x		x
15. Organizes students for effective instruction	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x		x
16. Demonstrates effective interpersonal relationships with others	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x		x

Table 10. (Continued)

Behaviors/attributes	Az	Ar	Ca	Fl	Ga	Ky	Mo	NC	NJ	SC	SD	Tn	Tx	Ut	WV	Eff	PEMS	TAMS	Benn
17. Demonstrates awareness of the needs of students	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x		x
18. Promotes positive self-concept	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x
19. Demonstrates sensitivity in relating to students	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x
20. Promotes self-discipline and responsibility	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x		x
21. Demonstrates employee responsibilities	x					x	x	x	x			x	x	x	x		x		
22. Demonstrates a willingness to keep curriculum and instructional practices current	x		x	x	x	x	x	x	x	x	x			x		x	x		x
23. Supports school regulations and policies						x	x	x	x			x	x	x	x				
24. Assumes responsibilities outside the classroom as they relate to school	x					x	x	x	x			x	x						
25. Demonstrates a broad base of knowledge in the history of mankind's social, physical, and psychological environments	x				x														
26. Participates in professional growth activities	x					x	x	x				x		x	x		x		x
27. Takes a leadership role in improving education			x	x		x	x	x	x	x		x	x	x	x		x		x
28. Develops a philosophy of education																	x		
29. Knows historic and contemporary goals																	x		
30. Knows major professional journals																	x		
31. Knows about the impact of social class in educational setting																	x		

Table 10. (Continued)

Behaviors/attributes	Az	Ar	Ca	Fl	Ga	Ky	Mo	NC	NJ	SC	SD	Tn	Tx	Ut	WV	Eff	PEMS	TAMS	Benn
32. Knows the contribution of racial and ethnic groups																	x		
33. Knows options and alternatives within and outside of public school system																	x		
34. Knows the major influences of community/nation on school curriculum																	x		x
35. Knows the historical development of the American public school system																	x		
36. Knows the legal rights of teachers																	x		
37. Knows legislation regarding school policies																	x		
38. Knows the organizational structure of school districts and ways to effect change																	x		
39. Knows the responsibility of local/state and federal levels regarding education																	x		
40. Knows the trends and issues within the teaching profession																	x		
41. Knows the characteristics of major teaching organizations																	x		
42. Knows the job conditions that affect satisfaction level																	x		
43. Knows "help" sources to prevent or alleviate teacher burnout																	x		
44. Knows trends in teacher supply and demand																	x		
45. Knows job interview techniques																	x		

Table 10. (Continued)

Behaviors/attributes	Az	Ar	Ca	Fl	Ga	Ky	Mo	NC	NJ	SC	SD	Tn	Tx	Ut	WV	Eff	PEMS	TAMS	Benn
46. Evaluates another teacher's performance																	x		
47. Displays knowledge of learning theories, educational psychology, and children	x																		x
48. Involved in action and applied research in the classroom and school							x		x	x									x
49. Willing to travel																			x
50. Demonstrates a professional, personal, and psychological security with self																		x	x
51. Secures a master's degree, additional credit				x		x		x			x	x	x						x
52. Demonstrates a history of high student achievement in classes taught	x		x	x	x	x				x		x		x	x				x
53. Demonstrates a willingness to expand effort and energy beyond the typical school day																			x
54. Commitment to the classroom									x										x
55. Commitment to education									x										x
56. Commitment to children																			x
57. Ability to handle complex situations										x									x
58. Highly creative																			x
59. Independent thinker																			x
60. Process-oriented																			x
61. Bright																			x
62. Ability to be original			x	x		x	x	x	x	x	x	x	x		x	x			x
63. Ability to develop support systems for teachers and others										x									x

Table 10. (Continued)

Behaviors/attributes	Az	Ar	Ca	Fl	Ga	Ky	Mo	NC	NJ	SC	SD	Tn	Tx	Ut	WV	Eff	PEMS	TAMS	Benn
65. Has earned the respect of peers, parents and the total school community		x		x				x	x		x			x	x				
66. Contributes significantly to the quality of life in schools									x										
67. Substantial years of experience in public schools	x	x	x	x		x	x	x		x		x	x	x	x				
68. Service on career level prior to that of master teacher status	x	x		x	x	x	x	x	x	x	x	x	x	x	x	x			
69. Demonstrated teaching ability (exemplary) as shown in ratings or evaluations	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x			
70. Maintains superior attendance								x		x		x							

Table 11. Factors causing states to endorse a career ladder concept

States passing legislation	Prior to national reports	Alexander	Reaction to national reports
Alabama			x
Arizona		x	x
Arkansas		x	
California	x		x
Colorado			x
Delaware			x
Florida	x		
Georgia	x		x
Idaho			x
Indiana		x	
Kentucky	x	x	
Maine			x
Maryland	x		
Mississippi	x		
Missouri			x
North Carolina		x	
New Jersey	x		
South Carolina	x		
South Dakota			x
Tennessee	x		
Texas	x		
Utah			x
Virginia			x
Washington			x
West Virginia			x
Wisconsin	x		

CHAPTER 5--SUMMARY, FINDINGS, RECOMMENDATIONS AND CONCLUSIONS

Summary

The basic problem for this study was to create a profile of the master teacher based upon behaviors gathered from effective teaching research, criteria used by states that have passed legislation to adopt career ladder plans for teacher performance, and competencies used in the Iowa State University teacher education program, Pro*file. In addition, secondary goals were to identify: (1) any related studies that can be used to determine the identification of the master teacher; and (2) factors causing states to endorse a career ladder concept. To complete this task, letters were sent to CEIS officers and other denoted contact persons requesting information about teacher performance appraisal instruments and factors causing states to endorse career ladder plans. Follow-up letters and telephone interviews were also employed to gather information. The letters and telephone interviews resulted in the following findings:

Question 1: What behaviors can be identified from the research on effective teaching to define the master teacher?

Using Table 2, behaviors one through twenty and twenty-two have been found to be substantiated by research on effective teaching. These behaviors are:

1. demonstrates effective planning skills.
2. implements the lesson plan.
3. motivates students.

4. communicates effectively with students.
5. provides students with specific evaluative feedback.
6. prepares appropriate evaluative feedback.
7. displays a thorough knowledge of curriculum and subject matter.
8. selects learning content congruent with the prescribed curriculum.
9. provides opportunities for individual differences.
10. ensures student time on task.
11. sets high expectations for student achievement.
12. plans for and makes effective use of time, materials, and resources.
13. demonstrates evidence of personal organization.
14. sets high expectations for student behavior.
15. organizes students for effective instruction.
16. demonstrates effective interpersonal relationships with others.
17. demonstrates awareness of the needs of students.
18. promotes positive self-concept.
19. demonstrates sensitivity in relating to students.
20. promotes self-discipline and responsibility.
22. demonstrates a willingness to keep curriculum and instructional practices current.

Question 2: What related studies can be used to determine the identification of the master teacher?

Only one related study was found to identify behaviors of the master teacher by Benningfield et al. in 1984. This study involved an

intellectual analysis by university professors and school system educators. The following descriptors appear significant to determine the identification of the master teacher from Table 9:

1. demonstrates effective planning skills.
2. implements the lesson plan.
3. motivates students.
4. communicates effectively with students.
5. provides students with specific evaluative feedback.
6. prepares appropriate evaluative feedback.
7. displays a thorough knowledge of curriculum and subject matter.
8. selects learning content congruent with the prescribed curriculum.
9. provides opportunities for individual differences.
10. ensures student time on task.
11. sets high expectations for student achievement.
12. plans for and makes effective use of time, materials, and resources.
13. demonstrates evidence of personal organization.
14. sets high expectations for student behavior.
15. organizes students for effective instruction.
16. demonstrates effective interpersonal relationships with others.
17. demonstrates awareness of the needs of students.
18. promotes self-concept.
19. demonstrates sensitivity in relating to students.
20. promotes self-discipline and responsibility.

22. demonstrates a willingness to keep curriculum and instructional practices current.
26. participates in professional growth activities.
27. takes a leadership role in improving education.
51. secures a master's degree, additional credit, or equivalent.
52. demonstrates a history of high student achievement in classes taught.
53. demonstrates a willingness to expand effort and energy beyond the typical school day.
54. commitment to classroom.
55. commitment to education.
56. commitment to children.
57. ability to handle complex situations.
58. highly creative.
59. independent thinker.
60. process-oriented.
61. bright.
62. ability to be original.
63. ability to develop support systems for teachers.
64. ability to bring out the best in others.

Question 3: What behaviors can be used from the Iowa State University (ISU) system "Pro*file" to determine the identification of the master teacher?

Taken from Table 8, the following behaviors can be used to determine the identification of the master teacher: one through twenty-two,

twenty-six, and twenty-seven. This represents eighty-one PEMS and ten TAMS as depicted in Table 7:

PEMS:

1. demonstrates effective planning skills.
2. implements the lesson plan.
3. motivates students.
4. communicates effectively with students.
5. provides students with specific evaluative feedback.
6. prepares appropriate and evaluative feedback.
7. displays a thorough knowledge of curriculum and subject matter.
8. selects learning content congruent with the prescribed curriculum.
9. provides opportunities for individual differences.
10. ensures student time on task.
11. sets high expectations for student achievement.
12. plans for and makes effective use of time, materials, and resources.
13. demonstrates evidence of personal organization.
14. sets high expectations for student behavior.
15. organizes students for effective instruction.
16. demonstrates effective interpersonal relationships with others.
17. demonstrates awareness of the needs of students.
18. promotes positive self-concept.
19. demonstrates sensitivity in relating to students.
20. promotes self-discipline and responsibility.

- 21. demonstrates employee responsibilities.
- 22. demonstrates a willingness to keep curriculum and instructional practices current.
- 26. participates in professional growth activities.
- 27. takes a leadership role in improving education.

TAMS:

- 2. implements the lesson plan.
- 3. motivates students.
- 4. communicates effectively with students.
- 7. displays a thorough knowledge of curriculum and subject matter.
- 10. ensures student time on task.
- 12. plans for and makes effective use of time, materials, and resources.
- 13. demonstrates evidence of personal organization.
- 18. promotes positive self-concept.
- 19. demonstrates sensitivity in relating to students.

Question 4: What behaviors listed on state teacher evaluation instruments can be used to determine the identification of the master teacher from those states that have passed legislation to adopt career ladder plans?

All of the behaviors and two attributes, as shown in Table 3, can be used to determine the identification of the master teacher:

- 1. demonstrates effective planning skills.
- 2. implements the lesson plan.
- 3. motivates students.

4. communicates effectively with students.
5. provides students with specific evaluative feedback.
6. prepares appropriate evaluative feedback.
7. displays a thorough knowledge of curriculum and subject matter.
8. selects learning content congruent with the prescribed curriculum.
9. provides opportunities for individual differences.
10. ensures student time on task.
11. sets high expectations for student achievement.
12. plans for and makes effective use of time, materials, and resources.
13. demonstrates evidence of personal organization.
14. sets high expectations for student behavior.
15. organizes students for effective instruction.
16. demonstrates effective interpersonal relationships with others.
17. demonstrates awareness of the needs of students.
18. promotes positive self-concept.
19. demonstrates sensitivity in relating to students.
20. promotes self-discipline and responsibility.
21. demonstrates employee responsibilities.
22. demonstrates a willingness to keep curriculum and instructional practices current.
23. supports school regulations and policies.
24. assumes responsibilities outside the classroom as they relate to school.

26. participates in professional growth activities.
27. takes a leadership role in improving education.
52. demonstrates a history of high achievement in classes taught.
70. maintains superior attendance.

Question 5: What behaviors from states providing guidelines for teacher performance can be used to determine the identification of the master teacher that have passed legislation to adopt career ladder plans?

The majority of behaviors in Table 6 can be used to determine the identification of master teachers. These behaviors include one through twenty-four, and items twenty-six and twenty-seven:

1. demonstrates effective planning skills.
2. implements the lesson plan.
3. motivates students.
4. communicates effectively with students.
5. provides students with specific evaluative feedback.
6. prepares appropriate evaluative feedback.
7. displays a thorough knowledge of curriculum and subject matter.
8. selects learning content congruent with the prescribed curriculum.
9. provides opportunities for individual differences.
10. ensures student time on task.
11. sets high expectations for student achievement.
12. plans for and makes effective use of time, materials, and resources.

13. demonstrates evidence of personal organization.
14. sets high expectations for student behavior.
15. organizes students for effective instruction.
16. demonstrates effective interpersonal relationships with others.
17. demonstrates awareness of the needs of students.
18. promotes positive self-concept.
19. demonstrates sensitivity in relating to students.
20. promotes self-discipline and responsibility.
21. demonstrates employee responsibilities.
22. demonstrates a willingness to keep curriculum and instructional practices current.
23. supports school regulations and policies.
24. assumes responsibilities outside the classroom as they relate to school.
26. participates in professional growth activities.
27. takes a leadership role in improving education.

The attributes listed by the states of California and New Jersey may very well be included to determine the identity of the master teacher. The following attributes are: commitment to the classroom; commitment to education; ability to handle complex situations; ability to bring out the best in others; has earned the respect of peers, parents, and the total school community; and contributes significantly to the quality of life in schools.

Question 6: Are there any differences in the behaviors generated from the review on effective teaching to those behaviors in

Pro*file and those behaviors from the states that have passed legislation to adopt career ladder plans?

Table 10 presents an overview of all the sources used for this study. Some of the characteristics in Pro*file and information gathered from state reform acts, rules, or educational reports are attributes (see Tables 4 and 5).

These behaviors from other states and Pro*file go beyond the list suggested by research on effective teaching. These include the following criteria: twenty-one, and many from twenty-three through seventy:

21. demonstrates employee responsibilities.
23. supports school regulations and policies.
24. assumes responsibilities outside the classroom as they relate to school.
25. demonstrates a broad base of knowledge in the history of mankind's social, physical, and psychological environments.
26. participates in professional growth activities.
27. takes a leadership role in improving education.
28. develops a philosophy of education.
29. knows the historic and contemporary goals.
30. knows major professional journals.
31. knows about the impact of social class in educational setting.
32. knows the contribution of racial and ethnic groups.
33. knows the options and alternatives within and outside of public school system.

34. knows the major influences of community/nation on school curriculum.
35. knows the historical development of the American public school system.
36. knows the legal rights of teachers.
37. knows legislation regarding school policies.
38. knows the organizational structure of school district and ways to effect change.
39. knows the responsibility of local/state and federal levels regarding education.
40. knows the trends and issues within the teaching profession.
41. knows the characteristics of major teaching organizations.
42. knows the job conditions that affect satisfaction level.
43. knows "help" sources to prevent or alleviate teacher burnout.
44. knows trends in teacher supply and demand.
45. knows job interview techniques.
46. evaluates another teacher's performance.
47. displays knowledge of learning theories, educational psychology, and children.
48. involved in action and applied research in the classroom and school.
49. willing to travel.
50. demonstrates a professional, personal, and psychological security with self.
51. secures a master's degree, additional credit.

- 52. demonstrates a history of high student achievement in classes taught.
- 54. commitment to the classroom.
- 55. commitment to education.
- 57. ability to handle complex situations.
- 62. ability to be original.
- 63. ability to develop support systems for teachers and others.
- 64. ability to bring out the best in others.
- 65. has earned the respect of peers, parents, and the total school community.
- 66. contributes significantly to the quality of life in schools.
- 67. substantial years of experience in public schools.
- 68. service on career level prior to that of master teacher status.
- 69. demonstrated teaching ability (exemplary) as shown in ratings or evaluations.
- 70. maintains superior attendance.

These differences can only be considered speculative since (1) Pro*file is open ended; (2) some of the criteria from the states have not been well-defined; and (3) some of the attributes may very well be general descriptors that result from exemplary performance of teaching behaviors.

Question 7: Are there any similarities in the behaviors generated from the review on effective teaching to those behaviors in Pro*file and those behaviors from the states that have passed legislation defining the master teacher?

Table 10 reveals a number of similarities in behaviors generated from a review on effective teaching to those behaviors listed in Pro*file and the states that have passed legislation. These behaviors include one through twenty and twenty-two:

1. demonstrates effective planning skills.
2. implements the lesson plan.
3. motivates students.
4. communicates effectively with students.
5. provides students with specific evaluative feedback.
6. prepares appropriate evaluative feedback.
7. displays a thorough knowledge of curriculum and subject matter.
8. selects learning content congruent with the prescribed curriculum.
9. provides opportunities for individual differences.
10. ensures student time on task.
11. sets high expectations for student achievement.
12. plans for and makes effective use of time, materials, and resources.
13. demonstrates evidence of personal organization.
14. sets high expectations for student behavior.
15. organizes students for effective instruction.
16. demonstrates effective interpersonal relationships with others.
17. demonstrates awareness of the needs of students.
18. promotes positive self-concept.
19. demonstrates sensitivity in relating to students.

20. promotes self-discipline and responsibility.
22. demonstrates a willingness to keep curriculum and instructional practices current.

Question 8: Are there any similarities in the classification scheme for listing behaviors that can be found in the research from the sources used in this study to define the master teacher?

The classification scheme developed by Manatt and Stow (1984) and substantiated by research on effective teaching was applied as a guide to compare and contrast the characteristics that were gathered from all of the sources. Table 12 contains the results of this investigation in the form of recommended behaviors and Table 13 lists the attributes.

Question 9: Are there any differences among states that have state-wide criteria that can be used to define the master teacher?

In Table 3, Tennessee is the only state to list criterion 52 (demonstrates a history of high achievement in classes taught) and 70 (maintains superior attendance) in the performance appraisal instrument that can be used to define the master teacher. However, Florida has required documented student performance and North Carolina, superior attendance (see Table 4).

Question 10: Are there any states that have developed criteria to recognize the master teacher?

There are three states that have provided criteria beyond those for effective performance. In the state of Missouri, behaviors have been identified to describe exemplary performance. California has provided criteria for nominating mentor teachers and New Jersey has provided

Table 12. Twenty-six behaviors defining the master teacher^a

Behavior
1. Demonstrates effective planning skills
2. Implements the lesson plan
3. Motivates students
4. Communicates effectively with students
5. Provides students with specific evaluative feedback
6. Prepares appropriate evaluative feedback
7. Displays a thorough knowledge of curriculum and subject matter
8. Selects learning content congruent with the prescribed curriculum
9. Provides opportunities for individual differences
10. Ensures student time on task
11. Sets high expectations for student achievement
12. Plans for and makes effective use of time, materials, and resources
13. Demonstrates evidence of personal organization
14. Sets high expectations for student behavior
15. Organizes students for effective instruction
16. Demonstrates effective interpersonal relationships with others
17. Demonstrates awareness of the needs of students
18. Promotes self-discipline and responsibility
19. Demonstrates sensitivity in relating to students
20. Promotes self-discipline and responsibility
21. Demonstrates employee responsibilities
22. Demonstrates a willingness to keep curriculum and instructional practices current
23. Supports school regulations and policies
24. Assumes responsibilities outside the classroom as they relate to school
25. Participates in professional growth activities
26. Takes a leadership role in improving education

^aBehaviors are teacher traits that can be measured.

Table 13. Twenty attributes defining the master teacher^a

Attributes	
1.	Secures a master's degree, additional credit, or the equivalent
2.	Demonstrates a history of high student achievement in classes taught
3.	Demonstrates a willingness to expand effort and energy beyond the typical school day
4.	Commitment to the classroom
5.	Commitment to education
6.	Commitment to children
7.	Ability to handle complex situations
8.	Highly creative
9.	Independent thinker
10.	Process-oriented
11.	Bright
12.	Ability to be original
13.	Ability to develop support systems for teachers and others
14.	Ability to bring out the best in others
15.	Has earned the respect of peers, parents, and the total school community
16.	Contributes significantly to the quality of life in schools
17.	Substantial years of experience in public schools
18.	Service on career level prior to that of master teacher status
19.	Demonstrated teaching ability (exemplary) as shown in ratings or evaluations
20.	Maintains superior attendance

^aAttributes are teacher traits that are difficult to measure. However, we need more philosophical, as well as behaviors, that center on teaching performance.

criteria for recognizing master teachers (see Appendix D).

Additional criteria can be found in state reform acts, rules, or educational reports (see Tables 4 and 5).

Question 11: What were the factors causing states to endorse a career ladder concept?

Three factors were identified causing states to endorse a career ladder concept. These factors were: action taken prior to the national reports, the influence of Governor Lamar Alexander, and reactions to the national reports.

Conclusions

As a result of the findings, the following conclusions were reached concerning behaviors of the master teacher:

1. Master teachers display evidence of superior preparation for classroom instruction in their selection of long-range goals, instructional objectives, and methods which are relevant to the objectives. Resulting from sound evaluation procedures, relevant student activities are planned in accordance with appropriate amounts of time.
2. The master teacher displays exceptional teaching strategies to meet individual needs by providing reviews and previews, anticipatory sets, modeling, guided practice, lesson summary techniques, independent practice activities, and sequencing from one activity to the next. Attempts to bring the best out in students by continually checking their work reflects the commitment the teacher has to children.

3. The master teacher motivates students to achieve beyond previous performance levels through the selection of stimulating materials and techniques. Challenging expectations are communicated, questions and discussions are encouraged, and activities which stimulate creative expression and thinking are presented.
4. The master teacher is extremely skillful in using a variety of verbal and nonverbal communications. Ideas are presented logically, directions are clear and concise, and vocabulary is appropriate. Probing techniques, structuring comments, verbal and nonverbal techniques, and oral and written communications are applied effectively. Summaries are provided to enrich the understanding of the lesson activity. At times, the master teacher must be creative in order to handle a complex situation that is caused by a variety of individual student needs.
5. The master teacher is able to provide specific evaluative feedback with reinforcement and encouragement. The use of appropriate evaluation activities facilitates student progress such as: pre- and posttests, criterion-reference tests, district-constructed and/or standardized tests, and one-to-one conferences. Test results are returned quickly, written comments are given, and group and individual feedback is provided. These efforts reflect a commitment to the classroom and to the students.
6. The master teacher demonstrates superior knowledge of the curriculum and subject matter as indicated by the teacher's level of competence in a specialized area, information that is

accurate and up-to-date, and the appropriateness of the content to the specific topics or activities. Appropriate examples and illustrations are used to meet the abilities and interests of the students. Additional training may be needed to acquire this level of expertise. (Many states have listed a master's degree, additional credit, or the equivalent as a prerequisite to becoming a master teacher.)

7. The master teacher selects learning content congruent with the prescribed curriculum but goes beyond the requirement of instructional objectives. Learning objectives are communicated to students and prepared in a clear, logical and sequential manner with a variety of additional information added that enriches the concepts. This behavior reflects the teacher's willingness to expand effort and energy beyond the typical school day, his/her commitment to the classroom, education, and children, and the ability to be original. The master teacher displays the ability to create and to maintain an enthusiasm and love for learning.
8. The master teacher provides maximum instructional opportunities for individual learning styles by designing learning activities that meet the mastery levels of students, utilizing resources that identify the abilities and interests of students, providing extra help and enrichment activities, and employing a variety of strategies that facilitate different student learning styles. The teacher has the ability to bring out the best

in students by pacing learning as students achieve success.

9. The master teacher is extremely skillful in maintaining students on the learning task. Activities are begun promptly, students are actively engaged during the amount of time scheduled for the activity, and unnecessary delays are avoided. The teacher is able to minimize the time between transitions as well.
10. The master teacher sets high expectations for students and is able to demonstrate a history of high student achievement as a result. Expectations are established for students that are appropriate to their ability level and based on accurate assessments of student mastery levels. Students are expected to possess prerequisite skills before promotion takes place and personal goal setting is practiced.
11. The master teacher assesses and adjusts the setting to provide for a variety of learning styles by using supplementary materials and resources effectively and creating materials to use for instructional purposes. The classroom is well-organized to insure that materials and information can be easily distributed. Evidence of skillful lesson preparation with objectives based on previous levels of learning reflects an orderly approach conducive to student learning.
12. The master teacher plans and implements strategies to encourage student self-discipline by establishing parameters for student classroom behavior, promoting self-discipline, reinforcing

appropriate behavior, managing disruptive behavior constructively, and grouping students in the most efficient way to support learning objectives. Student behavior is managed in a constructive manner to avoid or reduce WAIT TIME and techniques are employed to eliminate the causes of undesirable behavior. The teacher is highly creative and has the ability to handle complex situations that may arise from students exhibiting undesirable behaviors.

13. The master teacher promotes a good working relationship with others by providing active leadership. The teacher promotes good relationships with students, staff, parents, and the community. Opportunities are provided for students to achieve recognition and meet success regularly. A willingness to provide extra effort promotes student self-control and positive self-image. Special attention is given to students who require additional assistance exemplifying a sensitivity in relating to students who are different.

The master teacher works cooperatively with colleagues and actively shares ideas, materials and methods with other teachers. Support staff are utilized as needed while a "team spirit" exists among school administrators in efforts to accomplish organizational tasks.

The master teacher actively promotes parent and patron involvement in the school by initiating communications when appropriate. The teacher supports and participates in parent-teacher

activities and cooperates with parents in the best interest of the students which enhances a climate for communications between the teacher and the parent.

The master teacher earns the respect of peers, parents, and the total community by contributing significantly to the quality of life in schools through an active leadership role in promoting positive relationships.

14. The master teacher is self-motivated and assumes employee responsibilities willingly. Duties are completed promptly and accurately, accurate information is provided to management when it is requested, and regulations are carried out in accordance with established job descriptions.
15. The master teacher provides leadership and takes a leadership role in curriculum and instructional development by demonstrating the ability to interact, share, assist and serve other staff members. The teacher participates in curriculum review, adapts new teaching practices in the school organization, and helps others incorporate the functional classroom curriculum with the school organization's curriculum guide and the state course of study. The master teacher has the ability to develop support systems for teachers and others.
16. The master teacher provides leadership in the development and improvement of school and district regulations and policies by keeping informed of policies and regulations that effect his/her position, by participating in the development and review of

school policies and regulations, and assisting in resolving concerns and problems. The master teacher contributes significantly to the quality of life in schools, has the ability to develop support systems for teachers and others, and serves as a role model for others. The teacher maintains superior attendance, adheres to authorized policies, is process-oriented, bright, and an independent thinker.

17. The master teacher is self-motivated and assumes extra responsibilities willingly by assuming necessary noninstructional responsibilities and exercising responsibility for student management throughout the entire building. The teacher demonstrates a willingness to expand effort and energy beyond the typical school day and demonstrates a commitment to the pursuit of excellence in activities outside of the classroom.
18. The master teacher initiates professional growth activities and encourages other staff members to participate. The teacher serves as a role model by taking advantage of opportunities to learn from others as well as keeping abreast of developments related to teaching. The master teacher is bright, committed to education, and has the ability to bring out the best in others.

States have listed additional characteristics that master teachers must possess besides securing a master's degree, additional credits, or the equivalent that include: (1) substantial years of experience in public schools; (2) service on career levels prior to the master teacher

rank; (3) demonstrated teaching ability as shown in ratings or evaluations; and (4) subject matter knowledge as measured by paper and pencil tests.

The factors causing states to endorse a career ladder concept in school reform stem from an unfavorable public opinion before 1983, the influence of Governor Lamar Alexander of Tennessee, and reaction to the national reports that sparked interest at improving teacher salaries, making teaching more attractive, and retaining good teachers by providing opportunities for professional growth. After the completion of the 1985 legislative sessions, the total number of states mandating legislation in favor of career ladder development totaled twenty-six. Seventeen states have initiated actions through state legislatures; five states have involved a variety of groups; and four states were led through their State Department of Education.

Discussion

States are actively seeking ways to reward teachers for outstanding performance. Many states are developing career ladder plans that provide opportunities for teachers to gain prestige and recognition to the rank of master teacher. If properly planned, career ladder plans have the potential to encourage and reward good teaching, and to retain the most successful among teachers. Edelfelt (1985) stated three conditions that are necessary for the success of these plans: (1) sufficient funding; (2) the public's willingness to allow enough time for states to make revisions and changes; and (3) teachers who are willing to

participate both individually and collectively.

Career ladder plans allow teachers to receive increased pay, praise, and promotion while assuming different responsibilities. These new responsibilities enable teachers to participate more actively in "planning and organizing, curriculum, preservice and inservice teacher education, the evaluation of teachers at early stages of the career ladders, instructional materials, textbook selection, research projects, and other efforts that shape the direction of the school program and teaching as a profession" (ATE, 1985, p. 16). These differentiated responsibilities appear to be gaining acceptance among teachers (Cornett and Weeks, 1985a), even though it is too early to measure the overall effect these plans will have in improving the quality of teaching and the image of the educational profession.

The most significant problem facing states as they develop career ladder programs is the evaluation of teaching performance. Teacher evaluation procedures have caused difficulty in determining who deserves extra pay. Some teachers fear that administrators cannot or will not evaluate fairly; and there is evidence to prove that there is a lack of reliability and validity in evaluation and insufficient data to support some ratings (ERS, 1979). As a result, most incentive plans have failed because of the inability to define superior performance (Robinson, 1984).

The Commission on Master Teachers recommends that the evaluation of teaching should reflect criteria from both research on effective teaching and expert opinion. Limited research has been conducted that

presents certain characteristics of master teachers. The results of this study offer descriptors of master teachers as a major step that can be used by states to recognize outstanding performance. Based on behaviors found in effective teaching research, criteria used by states that have passed legislation endorsing career ladder plans, and competencies invested in the system Pro*file, an identity emerges.

It appears that master teachers are brighter and more dedicated than the average. They are better organized and more efficient classroom managers, and better prepared and more thorough in the way they teach. Student achievement gains results from efficient daily planning, thorough preparation, and high expectations that challenge students to achieve until they reach their potential. They possess superior knowledge of subject matter and superior skills in teaching, having the ability to cause learning to occur. They are clearly recognized among their colleagues as leaders who are willing and able to share their expertise as well as assist other teachers in professional development.

The number of attributes that were used to recognize the master teacher is very difficult to measure, and some states are using criteria such as years of experience, advanced degrees, professional growth indicators, and leadership activities as descriptors for master teachers (see Table 4). Dieter (1972) found no significant relationship in the following traits for defining outstanding biology teachers: (1) teacher participation in school and community activities; (2) the academic background of teachers; and (3) the professional experiences and

accomplishments of teachers. Based on a survey consisting of 111 items, a study group of 220 selection committee members of Outstanding Biology Teacher Award programs rated only twenty-one of the items as significant. These items included seven intrinsic personal factors, eight items related to teacher-student relationships, and six items that would be considered skills and proficiencies of science teachers:

- A. Items related to the teacher's intrinsic personal traits
 - 1. interest and enthusiasm for biology.
 - 2. resourcefulness.
 - 3. adequacy of self-concept.
 - 4. emotional poise and self-confidence.
 - 5. creative.
 - 6. ingenuous.
 - 7. interest in self-improvement.
- B. Items related to teacher-student interrelationships
 - 1. encourages self-motivation in students.
 - 2. inspires self-confidence in students.
 - 3. involves students in learning activities.
 - 4. is perceived favorably by students and parents.
 - 5. facilitates worthwhile student interaction.
 - 6. is perceptive of individual student needs.
 - 7. makes provisions for differing student interests and needs.
 - 8. makes efforts to encourage student development of hypotheses and theories.
- C. Items related to concerns for skills and proficiencies as a

science teacher

1. checks for student understanding of essential concepts.
2. checks for student understanding of essential science processes.
3. uses a variety of materials and methods.
4. facilitates activities and accomplishments of students.
5. designs laboratory experiences characterized by thought-provoking problems.
6. develops a classroom climate that is conducive to learning.

The items listed under Categories B and C are reinforced in some of the behaviors that are recommended to define the master teacher in Table 12, with the exception of "is perceived favorably by students and parents." This item, along with some other intrinsic traits such as interest and enthusiasm for biology, resourcefulness, ingenuity, creativity, and interest in self-improvement, can be supported by some of the attributes that are listed in Table 13. The items not included as recommendations are: (1) adequacy of self-concept; and (2) emotional poise and self-confidence. Although Volker (1985) and Benningfield et al. (1984) add these attributes, the research on effective teaching and the states that have passed legislation to endorse career ladder plans do not. The decision not to include these attributes resulted from insufficient support in this study as well as a lack of evidence showing that these attributes affect student learning. This same concern exists for the attributes that are listed in Table 13, even though most of them are either listed by the states or they simply make "sense."

Besides these attributes, a number of competencies in the system ISU Pro*file were not included for the same reasons. These are:

28. develops a philosophy of education.
29. knows historic and contemporary goals.
30. knows the major professional journals.
31. knows about the impact of social class in educational setting.
32. knows the contributions of racial and ethnic groups.
33. knows the options and alternatives within and outside the public school system.
34. knows the major influences of community/nation on school curriculum.
35. knows the historical development of the American public school system.
36. knows the legal rights of teachers.
37. knows legislation regarding school policies.
38. knows the organizational structure of school districts and ways to effect change.
39. knows the responsibility of local/state and federal levels regarding education.
40. knows the trends and issues within the teaching profession.
41. knows the characteristics of major teaching organizations.
42. knows the job conditions that affect satisfaction level.
43. knows "help" sources to prevent or alleviate teacher burnout.
44. knows the trends in teacher supply and demand.

45. knows job interview techniques.
46. evaluates another teacher's performance.
50. demonstrates a professional, personal, and psychological security with self.

The enhanced list of behaviors as shown in Table 12 can be used to define the master teacher. With the exception of criteria twenty-six and twenty-seven, the remaining criteria have been substantiated by research on effective teaching and most of the states as performance appraisal criteria. These criteria have proven to be valid, reliable, and legally discriminating (Manatt and Stow, 1984) in defining effective teaching. According to Moore (1984), master teachers are those persons who perform exceptionally well on all evaluation criteria. They also have the willingness and skills to assist other teachers in professional growth by taking a leadership role in improving education. Although Alexander stated that 15% of the teachers in Tennessee can be classified as master teachers, and California has listed 5% as mentor teachers, this investigator believes that a more realistic figure may be 2%, a qualifying total to represent the absolute "best" in the field.

Limitations

1. Only those states that passed legislation endorsing career ladder plans were used in this study.
2. The majority of states have only proposed or suggested criteria for performance appraisal. Some of these suggestions are planned for beginning teachers only.

3. The recommended items to define the master teacher have not been tested.
4. "Superior" performance was very difficult to define. Only the state of Missouri provided descriptions of outstanding performance in their evaluation instrument.
5. Teachers and teacher evaluators were not surveyed to determine which behaviors can be used to identify master teacher characteristics.
6. The criteria were not analyzed to determine if some were more important than others.

Recommendations for Practice

For states concerned in developing career ladder plans, it is recommended that:

1. Principals and teacher evaluators should receive training in identifying master teacher behaviors.
2. Efforts should be made in order to develop a common understanding of the evaluation goals and processes that involve both school administrators, teacher evaluators, and teachers.
3. Teachers should be involved in the planning, implementation, evaluation, and revision of career ladder plans.
4. Evaluation practices need to be consistent.
5. Standards of performance should be the basis for rewards and teachers should be recognized for exemplary performance.
6. Funding must be made available to ensure success of the program

once a career ladder plan is implemented.

7. Goals of a career ladder plan must be well-formulated and well-understood and should be reflected in appropriate school board policy.
8. The evaluation system should contain criteria that are valid and reliable with specific guidelines identifying the master teacher.
9. Job descriptions defining the roles and responsibilities need to be developed to differentiate the master teacher from other teachers.
10. A strong commitment must be displayed to develop a staff development program at each local district level.

Recommendations for Further Study

This study is one of the first of what should be many studies concerning behaviors of master teachers. Future research should consider the following:

1. Determine the differences in student gain scores from teachers who are identified as outstanding.
2. Analyze the behaviors of master teachers to other teachers to determine any significant differences in performance.
3. Determine if there is any significant difference in the perceptions of principals who vary in their level of experience and training as teacher evaluators.
4. Survey students and peers to determine if their perceptions of

master teachers vary.

5. Use the recommended criteria from this study and determine which were more important than others in defining outstanding performance as perceived by students, parents, peers, and principals.
6. Survey those states that have passed legislation endorsing career ladder plans to determine if master teachers are satisfied in their new roles and responsibilities.
7. Use the recommended items in this study and determine the differences between master teachers and merely effective teachers through classroom observations.
8. Conduct a survey among local school districts to determine if there is no significant difference in defining "superior" performance.
9. Conduct a follow-up study to determine any significant differences in states that have proposed or suggested performance appraisal criteria in defining the master teacher.
10. Conduct a survey to determine if teachers and teacher evaluators vary in their perceptions of master teacher characteristics.
11. Survey school districts that have career ladder plans to determine any differences that enhance the satisfaction levels for teachers.
12. Conduct a study to determine if there are any significant differences among teachers who vary across disciplines.

13. Conduct a survey to determine if there is no significant difference to determine outstanding performance among elementary teachers and secondary teachers.

As a means to provide recognition to teachers, rewarding those who perform exceptionally well is gaining acceptance throughout the nation. A restructuring of the teaching profession is taking place as teachers perform many different roles.

As states develop career ladder plans, criteria must be selected to identify the master teacher. School administrators and teacher evaluators will need training to be fair and consistent in evaluation once these criteria are selected. The "success of the plans will depend on a continued sharing of information and the willingness of districts and states to modify programs as they are implemented" (Cornett and Weeks, 1985a, p. 9).

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APPENDIX A--LISTS OF CRITERIA

Manatt and Stow 1984Teacher Performance Evaluation CriteriaPerformance Area 1. Productive Teaching Techniques

1. The teacher demonstrates effective planning skills.
2. The teacher implements the lesson plan.
3. The teacher motivates students.
4. The teacher communicates effectively with students.
5. The teacher provides students with specific evaluative feedback.
6. The teacher prepares appropriate evaluation activities.
7. The teacher displays a thorough knowledge of curriculum and subject matter.
8. The teacher selects learning content congruent with the prescribed curriculum.
9. The teacher provides opportunities for individual differences.
10. The teacher ensures student time on task.
11. The teacher sets high expectations for student achievement.

Performance Area 2. Organized, Structured Class Management

12. The teacher plans for and makes effective use of time, materials, and resources.
13. The teacher demonstrates evidence of personal organization.
14. The teacher sets high standards for student behavior.
15. The teacher organizes students for effective instruction.

Performance Area 3. Positive Interpersonal Relations

16. The teacher demonstrates effective interpersonal relationships with others.
17. The teacher demonstrates awareness of the needs of students.
18. The teacher promotes positive self-concept.
19. The teacher demonstrates sensitivity in relating to students.
20. The teacher promotes self-discipline and responsibility.

Performance Area 4. Professional Responsibilities

21. The teacher demonstrates employee responsibilities.
22. The teacher demonstrates a willingness to keep curriculum and instructional practices current.
23. The teacher supports school regulations and policies.
24. The teacher assumes responsibilities outside the classroom as they relate to school.

Master List of Performance Elements

I. Knowledge of Education

A. Learning Specific Subject Matter

- A-1 using knowledge from diverse subject areas
- *A-2 developing a philosophy of education
- A-3 understanding theories of human growth and principles of learning
- A-4 knowing current research on effective teaching
- *A-5 knowing historic and contemporary educational goals
- A-6 being aware of major professional journals

B. Knowing About the School as a Social/Historical Institution

- B-1 knowing about the determination and impact of social class in educational settings
- B-2 knowing the contributions of racial and ethnic groups
- B-3 knowing strategies for aiding children of the poor
- *B-4 knowing options and alternatives within and outside of public school systems
- B-5 knowing the major influences of community/nation on school curriculum
- B-6 knowing the historical development of the American public school system

C. Knowing About the School as a Legal, Political Institution

- *C-1 knowing the legal rights of teachers
- C-2 knowing legislation regarding school policies
- C-3 knowing the organizational structure of school districts and ways to effect change
- C-4 knowing the responsibility of local/state/federal levels regarding education
- C-5 knowing the trends and procedures in school funding
- C-6 knowing the current major criticisms of public school systems

D. Knowing About the Teaching Profession

- *D-1 knowing trends and issues within teaching profession
- D-2 knowing the characteristics of major teaching organizations
- *D-3 knowing the job conditions that affect satisfaction level

*Presently on system.

- *D-4 knowing "help" sources to prevent or alleviate teacher burnout
- D-5 knowing trends in teacher supply and demand
- D-6 knowing job interview techniques

II. General Teaching Skills

E. Working with Other Professionals and Adults

- E-1 working with faculty, staff, and resource persons
- E-2 working with parents
- *E-3 working with members of diverse racial/ethnic/social groups

F. Working with Students

- F-1 using informal counseling
- *F-2 communicating with students of different abilities/backgrounds
- *F-3 using a variety of interactional styles

G. Working in a Variety of Educational Situations

- G-1 using computer assisted instruction
- *G-2 using educational simulations
- G-3 integrating resources from groups outside of school
- *G-4 preparing curriculum materials

III. Self-Concept and Goals in Education

H. Working on Self-Development

- H-1 demonstrating warmth, empathy, patience, etc.
- H-2 developing personal values
- H-3 developing self-concept
- H-4 working under pressure

I. Involving Yourself in the Teaching Profession

- I-1 expanding your area of expertise
- I-2 being enthusiastic about teaching
- I-3 practicing professional ethics
- I-4 involving yourself in professional organizations
- I-5 using constructive criticism effectively

J. Building an Effective Learning Environment

- J-1 being flexible in thought/action/style
- *J-2 fostering creative and critical thinking

- J-3 avoiding sexist behavior
- J-4 using a multicultural perspective

IV. Planning Skills

K. Planning Lessons and Units

- *K-1 selecting and generating instructional objectives
- *K-2 planning to achieve objectives
- K-3 organizing for a substitute teacher
- K-4 working effectively with paraprofessionals
- K-5 identifying the focus of a lesson through questioning

L. Developing Curriculum Content for Individuals and Groups

- L-1 planning for diverse individuals
- L-2 identifying multicultural/sexist elements
- L-3 planning a sequence of related lessons
- L-4 coordinating with prior and future work

M. Planning Activities Based on Educational Diagnosis

- *M-1 involving students in the learning process
- *M-2 developing questions for a lesson
- *M-3 providing enrichment activities

N. Planning for the Efficient Organization of Time, Space, Materials and Equipment

O. Using Resource Materials in Planning

- O-1 models for organization of instruction
- O-2 using instruments and guides in planning
- O-3 using new directions/trends to develop and select appropriate student activities
- O-4 adapting commercial materials
- O-5 developing files for future use

V. Implementing Instructional Plans

P. Applying Theories of Learning to the Classroom

- P-1 using mastery learning/alternative assignments/contracts, etc.
- P-2 using a variety of materials, techniques and learning activities
- P-3 working with individuals, small and large groups
- P-4 developing proficiency in a variety of teaching methods
- P-4 applying theories of learning to the classroom

Q. Presenting Subject Matter

R. Modeling Basic Skills

S. Helping Students Develop Learning/Thinking Skills

- S-1 teaching learning skills and work habits
- S-2 teaching problem solving skills
- S-3 providing for appropriate creative experiences
- *S-4 helping students work individually or in groups
- S-5 promoting on-task behavior
- S-6 encouraging skills in leading and following

T. Maintaining Student Interest/Motivation

- T-1 pacing instruction to student needs
- T-2 reinforcing learner involvement
- T-3 using questioning effectively
- T-4 providing for lesson evaluation/summary

U. Dealing with Unplanned Aspects of Instruction

- U-1 adjusting to the unexpected
- U-2 detecting unplanned results of instruction
- U-3 modifying instruction due to learner response

VI. Evaluation and Diagnosis

V. Analyzing Teaching Effectiveness

- V-1 use of observation and analysis to modify teacher behavior
- V-2 evaluating another teacher's performance

W. Incorporating Student Evaluation Techniques

- W-1 using a variety of evaluation/assessment techniques
- W-2 developing an evaluation system
- *W-3 diagnosing and prescribing for individual needs

X. Encouraging Student Involvement in Evaluation

- X-1 involving students in development and application of standards
- X-2 helping students to utilize self-evaluation

*Y. Designing and Implementing Evaluation Instruments

- Y-1 learning to appraise students through evaluation instruments

Y-2 using evaluation instruments with students who are culturally different

Y-3 preparing teacher-made tests

Z. Interpreting and Reporting Data from Evaluation Procedures

Z-1 reporting student achievement

Z-2 using formal and informal ways for students to demonstrate achievement

Z-3 conferring with colleagues on student achievement

VII. Management

***AA. Understanding the Theory and Application of Management Techniques**

AA-1 using appropriate management models

AA-2 applying management models to student needs (discipline)

BB. Generating Positive Classroom Attitude

BB-1 maintaining an effective classroom atmosphere

BB-2 adjusting physical setting to student needs

CC. Utilizing Disciplinary Techniques

CC-1 maintaining order and developing self-discipline

CC-2 using a variety of techniques to minimize disruptive behavior

CC-3 intervening in conflict situations

CC-4 designing programs for behavior change

TAMS--Eleven Observable Teaching Behaviors

Physical Characteristics

1. Setting
2. Resources

Knowledge

3. Knowledge

Teacher Characteristics

4. Poise
5. Sensitivity

Methods and Techniques

6. Efficiency
7. Communication
8. Involvement
9. Explanations
10. Organization
11. Motivation

APPENDIX B--CONTACT PERSONS

<u>State or Group Affiliation</u>	<u>Person Contacted</u>	<u>Interview Date(s)</u>
Alabama	Allen Cleveland	10-23-85
Arizona	Judy Richardson	10-22-85
Arkansas	Don Ernst	10-23-85
California	Linda Bond	10-30-85
	Rick Simpson	10-02-85
	Laura Wagner	10-02-85
Colorado	Robin Johnston	10-21-85
Delaware	Paula Lehrer	10-22-85
Florida	Myrtle Bailey	10-22-85
	Garfield Wilson	10-23-85
Georgia	Joy Berry	10-23-85
Idaho	Terry Donicht	10-22-85
Indiana	Nancy DeLorean	10-23-85
Kentucky	Rita Lindsey	10-23-85
Maine	Gloria LaChance	10-23-85
Maryland	Sheila Tolliver	10-24-85
Mississippi	Andrew Mullins	10-22-85
	Bill Winter	10-29-85
Missouri	Annette Morgan	10-24-85
New Jersey	Rich Mills	10-22-85
North Carolina	Don Dieter	10-23-85
South Carolina	Terry Peterson	10-23-85
South Dakota	Donna Fjelstad	10-30-85
Tennessee	Steve Cobb	10-25-85
	Carol Furtwengler	10-23-85
	Keel Hunt	10-04-85
Texas	Robbin Collins	10-15-85
Utah	Michael Garbett	10-22-85
Virginia	E. B. Howerton	10-23-85
	Sarah Irby	10-24-85
Washington	Judy Hartmann	10-23-85
West Virginia	Robert Gabrys	10-29-85
Wisconsin	Kathryn Gilbert	10-28-85
Education Commission of the States	Chris Piph	10-17-85
National Governors Association	Joe Nathan	10-23-85
Southern Educational Regional Board	Lynn Cornett	9-27-85 10-29-85

APPENDIX C--LETTERS REQUESTING INFORMATION

IOWA STATE
UNIVERSITY

Telephone 515-294-4143

August 6, 1985

Dear CEIS Officer,

I am seeking your assistance as part of a research project designed to gather data from state mandated teacher evaluation instruments, which will be helpful in defining behaviors of the Master Teacher.

Your candid reply will be beneficial in providing vital information to be used in creating a profile of the Master or Outstanding Teacher. These so-called "Master Teachers" are those who typically perform better than their colleagues through planning, instruction, classroom management, and climate building.

In sending your state teacher evaluation instrument, a list of Master Teacher behaviors will be developed.

Thank you for your cooperation in this research effort.

Respectfully,

Tom Allen

I am seeking your assistance for information relating to career-ladder programs. In the October 17, 1984 "Education Week" newsletter, your name is listed as a contact person. The purpose of this request relates to my dissertation topic of identifying teacher behaviors for defining the "master teacher." I intend to use those states that have adopted career-ladder systems and those states in the process of implementing or planning to implement career-ladder systems in the future. More specifically, I need the state teacher performance instruments that are in use or may be in use to help determine "outstanding performance."

Besides developing performance appraisal instruments, there have been factors causing states to move in this direction. Whatever the reasons (political, economic, or otherwise), some states have become more active than others. Would you have any information (newsprints, dialogues with committees, legislative action) that would reveal the factors causing states to develop or plan career-ladder systems?

I appreciate your time and concern. On August 6, 1985, I wrote a letter requesting information about state-mandated teacher evaluation systems to each CEIS (Coordinator of Evaluation and Information Systems) officer. As of this date, I have received 25 responses. Many of the responses have come from persons other than CEIS officers. For this reason, I have focused my attention to you and hope that you could provide the necessary information that I need.

If your State policy requires you to bill me for this material, please feel free to do so.

Sincerely,

Tom Allen

I am seeking your assistance for information relating to the development of the career-ladder concept. Your name has been recommended to me by the listed contact person for your state concerning career-ladder programs. The purpose of this request relates to my dissertation topic of identifying teacher behaviors for defining the "master teacher." I intend to use those states that have adopted career-ladder systems and those states in the process of implementing or planning to implement career-ladder systems in the future.

I am gathering performance appraisal instruments as well as seeking factors that have initiated states to move in this direction. Whatever the causes were to stimulate state dialogue, I am hopeful that you may be able to provide some needed information for this study. Since states vary in the approaches that have been taken to provide "excellence" in education, the initial planning stages become important in this study. Would you have any information (newsprints, dialogues with committees, legislative action) that would reveal the factors causing your state to adopt or consider adopting a career-ladder system?

I appreciate your time and concern. Because I have sent requests dating back to August 6 requesting information from other denoted contact persons, your assistance is vital. For this reason, I have focused my attention to you and hope that this background information could be provided.

Sincerely,

Tom Allen

APPENDIX D--STATES WITH CRITERIA BEYOND THAT OF EFFECTIVE TEACHING

STATE OF MISSOURIBehaviors of Exemplary Performance

The teacher:

1. displays evidence of superior preparation for classroom instruction.
2. develops exceptional teaching strategies to meet individual needs.
3. provides maximum instructional opportunities for individual learning styles.
4. goes beyond the requirement of instructional objectives.
5. demonstrates superior knowledge of subject matter.
6. seeks out and/or develops a variety of creative materials appropriate to the instructional objectives.
7. is extremely skillful in maintaining students on the learning task.
8. motivates students to achieve beyond previous performance levels.
9. is extremely skillful in using a variety of verbal and nonverbal communications.
10. gives feedback with reinforcement and encouragement.
11. assesses and adjusts the setting to provide for a variety of learning styles.
12. plans and implements strategies for pupil self-discipline.
13. willingly provides extra efforts to meet the needs of students.
14. provides leadership to promote a good working relationship with educational staff.
15. provides active leadership to promote a good working relationship with parents/patrons.
16. initiates professional growth activities; encourages staff to participate in professional growth activities.
17. provides leadership in the development/improvement of school and district regulations and policies.
18. is self-motivated; assumes extra responsibilities willingly.

STATE OF CALIFORNIACriteria for Mentor Teacher Nomination

The teacher shall:

1. be a credentialed classroom teacher with permanent status (permanent status means tenure in those districts which grant tenure or three years experience in districts which do not grant tenure).
2. have substantial recent experience in classroom instruction.
3. have demonstrated exemplary teaching ability, as indicated by, among other things, effective communication skills, subject matter knowledge, and a mastery of a range of teaching strategies necessary to meet the needs of pupils in different contexts.
4. demonstrate knowledge and commitment to subject matter.
 - a. have subject matter expertise.
 - b. have the ability to convey enthusiasm for the subject to students.
5. demonstrate belief in student ability to succeed.
 - a. show commitment to setting high expectations for student.
 - b. show competence to teach at various student ability levels.
 - c. display use of appropriate grading standards, including resistance to the practice of giving inflated grades.
 - d. be willing to give special attention to students requiring help.
 - e. be successful in fostering excellent student performance.
6. give evidence of professional stature.
 - a. display leadership, e.g., in organizing projects on his/her own initiative.
 - b. be recognized by those in the same profession.
 - c. be respected by his/her colleagues.

STATE OF NEW JERSEYCriteria for Recognition of Master Teachers

The teacher shall:

1. possess knowledge of subject matter coupled with the necessary communication skills.
 - a. utilize various teaching techniques and strategies to facilitate the students' mastery of subject matter appropriate to their grade levels and subject areas.
 - b. demonstrate superior in-depth knowledge of subject matter that goes beyond the subjects or grades they are assigned to teach during a given year.
 - c. utilize effectively a variety of communication strategies when appropriate in order to impart the subject matter to the students.
2. display the ability to create and to maintain an enthusiasm and love for learning.
 - a. utilize creativity and imagination to motivate students through his/her own enthusiasm and love of learning.
 - b. act as a role model both as a teacher and a learner.
3. encourage and promote a feeling of self-worth in students.
 - a. provide an environment where self-worth of students can be realized.
 - b. demonstrate patience in dealing with students.
 - c. maintain positive, fair and consistent approaches in dealing with students.
 - d. maintain sensitivity to the needs of his/her students.
 - e. demonstrate a caring attitude to all students.
4. possess high expectations for his/her own performance.
 - a. meet new challenges with the highest professional optimism for what can be accomplished.
 - b. actively contribute to the development of solutions to problems.
 - c. demonstrate a willingness to take on complex and/or difficult situations.
 - d. set challenging objectives and effectively pursue their accomplishment.
 - e. demonstrate a commitment to the pursuit of excellence.
5. display high expectations for children and motivation of students to perform at their highest level.
 - a. accept only the highest level of work from each student based upon the student's grade and/or subject area.
 - b. utilize effectively meaningful profiles of student progress and

deficiencies to enlist the cooperation of parents to clarify what students need to do to achieve success.

- c. set individual standards for student performance and work with individual students to help them to reach those standards.
 - d. articulate clearly and explain effectively to students the requirements to achieve success in the classroom or subject area.
6. demonstrate the ability to interact, share, assist and serve as a model for the profession.
 7. have earned the respect of peers, parents and the total school community.
 8. contribute significantly to the quality of life in the school.