

ED 375 233

UD 030 136

TITLE An Exploratory Study of a Chapter 1 Schoolwide Project and Current Instructional Practice. Spring Garden Elementary School, School District of Philadelphia.

INSTITUTION Research for Better Schools, Inc., Philadelphia, Pa.

SPONS AGENCY Office of Educational Research and Improvement (ED), Washington, DC.; Philadelphia School District, Pa.

PUB DATE 30 Jun 90

NOTE 75p.; For related documents, see ED 342 874 and UD 030 135 and UD 030 137.

PUB TYPE Reports - Evaluative/Feasibility (142)

EDRS PRICE MF01/PC03 Plus Postage.

DESCRIPTORS Case Studies; Classroom Observation Techniques; *Compensatory Education; *Curriculum Evaluation; Educational Improvement; *Educationally Disadvantaged; Elementary Education; Elementary Schools; Elementary School Students; Federal Programs; High Risk Students; *Instructional Effectiveness; Interviews; Parent Participation; School Districts; Staff Development; Student Characteristics; Teaching Methods; Teamwork; *Urban Schools

IDENTIFIERS *Education Consolidation Improvement Act Chapter 1; Exploratory Studies; Hawkins Stafford Act 1988; *Philadelphia School District PA

ABSTRACT

In December 1989, the School District of Philadelphia (Pennsylvania) and Research for Better Schools, Inc., with the support of the Pennsylvania State Department of Education, initiated a collaborative 2-year study of the district's Chapter 1 schoolwide projects. This report presents findings from the study of Spring Garden Elementary School (grades K through 5), one of the schoolwide projects initiated in 1988. Section I describes what it means to be involved in a schoolwide project, on the basis of interviews with principal and staff and observations. Section II presents an overview of current instructional practice on the basis of visits to eight classrooms and interviews with eight teachers over a 2-day observation period. Section III explores the instruction received by three Spring Garden students over a given school day. Section IV describes the reflections of evaluators about the process, comments on staff's and parents' energy and interest in improvement, and highlights some challenges for the future. Eleven tables present study data, and an appendix contains the daily schedules of the three students. (SLD)

 * Reproductions supplied by EDRS are the best that can be made *
 * from the original document. *

ED 375 233

AN EXPLORATORY STUDY OF A CHAPTER 1 SCHOOLWIDE PROJECT AND CURRENT INSTRUCTIONAL PRACTICE

Spring Garden Elementary School
School District of Philadelphia

U.S. DEPARTMENT OF EDUCATION
Office of Educational Research and Improvement
EDUCATIONAL RESOURCES INFORMATION
CENTER (ERIC)

This document has been reproduced as
received from the person or organization
originating it.

Minor changes have been made to improve
reproduction quality.

Points of view or opinions stated in this docu-
ment do not necessarily represent official
OEI position or policy.

PERMISSION TO REPRODUCE THIS
MATERIAL HAS BEEN GRANTED BY

P. J. Venetian
Research for Better Schools

TO THE EDUCATIONAL RESOURCES
INFORMATION CENTER (ERIC)

by

Research for Better Schools, Inc.

UD030136

AN EXPLORATORY STUDY OF A CHAPTER 1 SCHOOLWIDE PROJECT
AND CURRENT INSTRUCTIONAL PRACTICE

Spring Garden Elementary School
School District of Philadelphia

Research for Better Schools, Inc.
444 North Third Street
Philadelphia, PA 19123

June 30, 1990

RBS is funded by the U.S. Department of Education to be the Mid-Atlantic Regional Educational Laboratory, serving, Pennsylvania, Maryland, Delaware, New Jersey, and the District of Columbia. As one of nine federally-supported regional educational laboratories, RBS's mission for the past 23 years has been to collaborate with state, intermediate, and local educational agencies to improve district, school, and classroom practice. RBS is a non-profit corporation, governed by a Board of Directors made up of educational and community leaders from its region.

The work upon which this publication is based was funded by the School District of Philadelphia; using resources provided by the Pennsylvania Department of Education, and by the Office of Educational Research and Improvement (OERI), U.S. Department of Education. The opinions expressed in this publication do not necessarily reflect the position or policy of the School District of Philadelphia, PDE, and the OERI, and no official endorsement by those agencies should be inferred.

ACKNOWLEDGMENTS

This study was a collaborative effort. First, we would like to acknowledge the assistance provided by the leadership and staff of the School District of Philadelphia in planning the study, providing RBS staff an overview of the design of the Chapter 1 schoolwide project, selecting the schools for the study, and introducing RBS staff to the principals and staff of those schools.

Second, we would like to acknowledge the cooperation of the staff of Spring Garden Elementary School, who welcomed us into their meetings and into their classes, who took time from their busy schedules to talk to us about their plans, their successes, and the challenges that are still before them. In particular, we would especially like to thank the principal, Michael Kolakowski; Patti Kemp, the program support teacher; other key staff who described the schoolwide project; the eight teachers who let us visit their classes and interview them about their instructional program; and the three teachers in whose classes we shadowed students.

Third, we would like to thank the team of Barbara Smith, Christina (DE) School District, Brenda Townsend, Pennsylvania State University, and Louise Wachter, Consultant. They helped collect the information on which the "snapshot" of instructional practice in the school is based. We would also like to thank Fran Beyer and Ron Houston of RBS, who shadowed students for a day.

Finally, we would like to thank Joan Buttram for her careful review of our report, and Patricia Matthews and Lisa Jefferson for their assistance in summarizing data collected and in moving the report through its multiple iterations.

Gail Meister, Richard McCann,
Susan Austin, Edward Patrick

TABLE OF CONTENTS

	<u>Page</u>
ACKNOWLEDGMENTS.....	iii
INTRODUCTION.....	1
SECTION I: SPRING GARDEN ELEMENTARY SCHOOL AS A SCHOOLWIDE PROJECT..	3
Components of a Schoolwide Project and Study Methods.....	3
The School, Its Staff, Students, and Community.....	4
History.....	6
Mission and Goals.....	8
Organization of the School and the Staff.....	9
Current Strategies and Activities for Achieving Its Goals.....	11
Summary: Effects of Being a Schoolwide Project.....	14
SECTION II: CURRENT INSTRUCTIONAL PRACTICE AT SPRING GARDEN -- A SNAPSHOT.....	17
Classes Visited.....	17
Framework of Research-Based Factors and Study Methods.....	20
The Framework.....	20
Methods Used.....	21
The Status of the Student-Related Factors.....	22
Student Engagement.....	22
Appropriateness of Skills Studied.....	24
Students' Daily Success.....	25
The Status of Classroom-Related Factors.....	25
Classroom Management.....	25
Instructional Planning.....	27
Instructional Approaches Used.....	28
Teacher Expectations.....	30
Parent/Family Involvement.....	33

TABLE OF CONTENTS

	<u>Page</u>
The Status of School/District-Related Factors.....	34
Staff Development.....	35
Cooperative Teacher Planning.....	35
Teacher Supervision.....	36
 SECTION III: CURRENT INSTRUCTIONAL PRACTICE FROM THE PERSPECTIVE OF A DAY IN THE LIFE OF THREE SPRING GARDEN STUDENTS.....	 37
Guiding Questions and Study Methods.....	37
Structure of the Three Students' Days.....	39
Overview of Each Student's Day.....	39
Allocation of Time.....	40
Instructional Format.....	42
Instructional Grouping.....	43
Types of Instructors.....	44
Instructional Tasks During the Core Subjects.....	45
Tasks Introducing New Content.....	45
Tasks Requiring Higher Order Thinking Processes.....	45
Student Response to Tasks.....	48
Clarity of Task.....	48
Task Engagement of Students.....	49
Student/Teacher Interactions During the Core Subjects.....	49
Types of Student/Teacher Interactions.....	49
Affect of Interactions.....	52
Group Context.....	52
 SECTION IV: SOME CONCLUDING THOUGHTS.....	 53
 APPENDIX.....	 55

LIST OF TABLES

	<u>Page</u>
Table 1: Lessons Seen by Team During Classroom Visits.....	18
Table 2: Distribution of Student Behaviors Seen During Eight Lessons (Ranked by Level of Engagement).....	23
Table 3: Distribution of Teacher Behaviors Seen During Eight Lessons (Ranked by Amount of Instructional Behavior Observed).....	26
Table 4: Pattern of Instructional Behaviors Seen During Eight Lessons.....	29
Table 5: Distribution of Time.....	41
Table 6: Distribution of Time Among the Core Subjects.....	41
Table 7: Distribution of Time of Core Subjects by Instructional Format.....	43
Table 8: Distribution of Time of Core Subjects By Instructional Grouping.....	44
Table 9: Distribution of Time of Core Subjects by Instructor.....	44
Table 10: Characteristics of Instructional Tasks Experienced by Each Student.....	46
Table 11: Individual Student/Teacher Interaction During Core Subjects.....	50

LIST OF FIGURES

	<u>Page</u>
Figure 1: Framework of Research-Based Factors.....	20

INTRODUCTION

In December 1989, the School District of Philadelphia and Research for Better Schools, with the support of the Pennsylvania Department of Education, agreed to initiate a collaborative two-year study of the district's Chapter 1 schoolwide projects. As the first phase of the study, it was agreed that RBS would undertake an in-depth study of four schoolwide projects, in order to delve into the complexities of individual school practice. This report presents the findings of RBS's study of Spring Garden Elementary School, one of the schoolwide projects initiated in 1988.

This report's primary purpose is to provide Spring Garden's staff with a description of current practice in their school, a description that may help them further focus the improvement activities that are under way. The report will also inform an analysis of the commonalities and differences across the four schools participating in this study.

The report is written in a style and format to support the efforts of Spring Garden's staff to improve their performance as a school. The report is primarily descriptive; it reflects as accurately as possible what RBS staff, along with those who helped them, heard and saw. The report keeps before the reader the methods used to collect the information in order to discourage over-generalizing the findings. The findings are presented in reference to specific topics or questions. At the end of each set of findings, discussion questions are provided to help the reader process the information; and suggest a focus for further study. In general, the report encourages the reader to consider these general questions:

- To what extent are the descriptions of practice at Spring Garden accurate and generalizable?
- To what extent do the descriptions suggest practices in need of further study and/or action?

The report is organized into four sections, reflecting the principal purposes of the study.

- Section I, Spring Garden Elementary School as a Schoolwide Project, describes what it means to be a schoolwide project, as could be gleaned from interviews of Spring Garden's principals and staff and from RBS staff's observations of a number of staff meetings.
- Section II, Instructional Practice at Spring Garden Elementary School -- A Snapshot, presents an overview of current instructional practice at Spring Garden, as seen during the course of a two-day visit by a team, composed of Chapter 1 educators.
- Section III, Instructional Practice from the Perspective of a Day in the Life of Three Spring Garden Students, describes the instruction that three Spring Garden students experienced on April 6, as recorded by the three RBS staff who shadowed those students for that day.

- Section IV, Some Concluding Thoughts, shares some RBS staff reflections on information presented in this report.

SECTION I

SPRING GARDEN ELEMENTARY SCHOOL AS A SCHOOLWIDE PROJECT

The first task of the study was to collect information from school staff on what it has meant to be a participant in a Chapter 1 schoolwide project. That information was also used to suggest how the school was implementing major components of the district's schoolwide design.

This section presents a summary of what RBS staff saw and heard about Spring Garden Elementary School as a schoolwide project. This summary is organized into seven parts. The first describes the components of a schoolwide project, as described by School District of Philadelphia's Central Office staff, and the study methods. The second is a brief description of the school, its staff, students, and community. The third describes the history of the school's involvement with the Chapter 1 schoolwide project. The fourth describes the current mission and goals of the school. The fifth provides an overview of the current organization of the school, with emphasis on the new staff groups and roles that have developed as a result of Spring Garden's schoolwide project. The sixth part discusses the strategies and activities that Spring Garden has undertaken to improve its performance. The last part of this section reports staff perceptions of what it means to be a schoolwide project.

Components of A Schoolwide Project and Study Methods

Philadelphia's central office staff helped RBS staff understand the major components of the schoolwide design and to differentiate those components from other district initiatives that were affecting the schools. Specifically, central office staff identified the following components:

- the emphasis on improving student attendance and student achievement, and in support of these outcomes, increasing parent involvement
- the creation of new groups (e.g., the pupil support committee) and new staff roles (e.g., program support teacher, instructional support teacher) responsible for developing and updating plans for improving performance, budgeting Chapter 1 and other resources to support the implementation of those plans, and leading the effort to implement specific changes in practice
- the requirement that the schools use a systematic, data-based planning/problem solving process to develop and update their improvement plans
- the requirement that schools select an instructional model, undertake staff development activities supportive of model implementation, and actually implement practices consistent with that model

- the expectation that teachers will keep detailed student progress records to identify students with specific needs
- the establishment of a pupil support committee to help staff address more effectively the special needs of particular students.

The central office staff emphasized that there were other district initiatives affecting the schools that should not be viewed as part of the school-wide project -- for example, the city's standardized curriculum, testing program, promotion policy, and computerized report cards.

To collect information about Spring Garden's approach to the schoolwide project, RBS conducted a series of open-ended interviews with Spring Garden's principal, program support teacher, school/community liaison, and various teachers. The interviews began with general questions to elicit informants' professional history and to obtain their perspective on Spring Garden as a schoolwide project. As follow-up to these interviews, RBS staff observed meetings of selected Spring Garden teams, faculty meetings, and the planning meetings of the entire staff.

The School, Its Staff, Students, and Community

Most of the brick design work on Spring Garden's facade can be seen as one approaches by car because an empty square block, a parking lot, is all that occupies the space opposite it. The building rises like an art deco cathedral from the potholes and broken glass that cover the surface of the parking lot and street. The simile is especially apt: the principal has claimed that school should be a cross between a church and an amusement park.

However, the Richard Allen Homes, low-rise public housing, and not an amusement park, crouch just beyond the parking lot. About 75 percent of the school's children come from the project. Others come from the crumbling row houses and apartments in the area bounded by Brown, Broad, 10th Street, and Spring Garden, the school's attendance boundaries. Still others come from the Salvation Army shelter for the homeless within the school's catchment area.

Alternating between empty storefronts half a block away up 12th Street, still viable stores like Mom's and Slim's did a brisk business during the study period. By day, the neighborhood appeared busy and friendly: students on an outing greeted neighbors and pointed out relatives' homes. By night, however, residents reported that gunfire was not unusual. Despite the poverty, the violence, and the somewhat rundown condition of the neighborhood, "positives" lay hidden, according to the the school/community liaison, who has lived here all her life.

Those positives included a neighborhood feeling in the school's community and a fair amount of continuity within the school. Several teachers spoke about "getting established" at Spring Garden, how the students and their families have gotten to know them and their ways of doing things as they have served the brothers, sisters, nieces, nephews, and children of former students over time. This continuity has contributed to staff's characterization of Spring Garden as a family-oriented school.

The school offered grades K through 5 to 450 students during the 1990 study period. Fully 98 percent of the students were African-American while the remaining two percent were Hispanic. Ninety percent of students' families received welfare; about 80 percent were headed by single mothers. An estimated 10 percent of children arrived at school without prior preschool or kindergarten experience, due in part to the lack of available places as well as parents' failure to seek early schooling for their children.

Close to 50 people -- "50 wonderful people," the principal said -- were on the Spring Garden staff during the study year. Of these, about 30 were professional staff, including regular classroom teachers, a special education teacher, and specialists. Others included clerical, custodial, and food service workers, and 15 full- and part-time paraprofessionals who provided classroom and other assistance. Three fifths of the regular staff were African-American. Four fifths were women. In addition, up to 30 community assistants, formerly called parent scholars, worked half days in ten-week shifts in support of the school's program.

During the study period, Spring Garden teachers had from 8 to 26 years of experience. Many of those had been earned at the school. The "newest" teacher on staff had been there for five years. Except to replace an itinerant art teacher who retired, there had been no turnover since the last principal and four teachers arrived in 1986. Spring Garden's was a veteran professional staff in terms of age as well. At 37, the principal counted himself among the youngest; a teacher about his age emphasized the staff's age and stability by claiming with a wink that some of her colleagues must have started teaching there before she was born.

Staff valued this stability for teachers and administrators. Like teachers, principals also need to become "established" so children get to know their ways, this teacher commented. "It's like a friendship. Then that respect [missing from student-staff relationships in the early 1970s] can come."

That respect and a sense of common purpose also pervaded relationships among staff members at Spring Garden. "We all work together here" was a refrain that teachers repeated, one after another, in the interviews. The gym teacher, a special education teacher, the school/community liaison, the counselor, a lower grade teacher, an upper grade teacher, the math resource teacher all said it in their own words: "We have our differences but we all come together. Our children come first;" "Everyone here helps everyone else;" "When new staff come, they fit in. No one is alienated. Everyone tries to work as a group;" "We all work together here and support each other."

Working together and caring extended throughout school life. Concrete, published rules (e.g., don't fight in school), a school code of honor that students recite daily, and a schoolwide assertive discipline program helped govern student behavior at Spring Garden. But staff underlined that people, not rules, made the system work. For keeping kids in tune, "staff is key," explained a staff member. Noted another, "Leadership is exercised so that not everything is done by the book, but on an individual basis." One suspects that this held true for staff as well.

Staff apparently appreciated Spring Garden's combination of working together and caring. "People are happy to be here generally," a teacher remarked. "I like the school, the children, the staff, and my job," said another staff member. "[The former principal and the current principal] made this a positive place to work, a really caring place," another said. "Spring Garden is a great place to be. I love what I do."

History

In 1965, a teacher reminisced, Spring Garden was one of North Philadelphia's best-rated schools but later sank to the bottom. Various principals came and went, all pretty much trying to hold the lid on, to survive. Other teachers remembered those years as "chaotic" and "helter skelter." Even then, some saw Spring Garden as a "nice school" where staff members treated each other warmly despite the general lack of control, lack of respect from students, hostility from community, and strikes that elsewhere divided staffs. It wasn't until a new principal came in 1982 that things changed appreciably for the better.

The new principal declared that he didn't like what he saw at Spring Garden, recalled a teacher. Among the things he didn't like was few children on grade level. His remedy was to introduce high expectations for staff, and through staff, to students. The expectations were specific: 60 percent or more students reading on grade level in three years. The principal called this plan his "little experiment." In time it became the model for Chapter 1 schoolwide projects throughout Philadelphia. According to one teacher, Spring Garden defined the success that others schools could strive for. If that school can do it, the logic ran, then other schools can, too.

Spring Garden had prepared its proposal to join the first cohort of 11 schools in the schoolwide project in 1985-86 while the designer of the little experiment was still there. When he left the school to work with Chapter 1 at the central office, the incoming principal's job was just to implement the preexisting plan. The incoming principal in 1986 felt as if he were inheriting the Boston Celtics, a seasoned championship team.

Teachers detailed the many contrasts between the two principals yet the apparently seamless transition the school had made from the leadership of one to the other. The former principal was "the most impacting principal," one teacher commented. "He was at the helm and wanted people to know it." "He had vision and he loved the school. He knew where he was going and where he wanted staff to go. But he exercised his leadership with personal devotion. He knew when to give you a hug and when to give you a push," another teacher said. In short, the former principal "was a lion...a hard act to follow."

The incoming principal, whose job it was to implement the first official schoolwide project plan, was "different in every way" from his predecessor. According to one teacher, the incoming principal was "reserved and quiet." "He comes around the back door" to get things done, according to another. By his own description, this principal was a better button-holer, working to develop individuals and teams, and more democratic than a

"bossman" figure. Teachers nonetheless could see that the new principal had continued the former principal's theme of high expectations; that he "fine-tuned the vision," talking about specific parts and helping individuals see their roles in it; and that he carried on from his predecessor but still put his own stamp on it.

The elements of working together and caring that teachers reported in the interviews appear to be the distinctive stamp that the new principal has put on Spring Garden's schoolwide project. One way he has tried to promote teamwork and mutual support is through empowering images and frameworks. His thoughts for the day in opening exercises, his letters and memos to faculty, his exhortations in the margins of school calendars and announcements, his personal notes on lesson plans, his metaphors in conversation, were all meant to praise and inspire.

For example, the principal decorated blank space on a memo summarizing A, B, and C grades for each subject in each grade for two marking periods with a cartoon chef who is opening a dish labeled "student growth." The cover is inscribed, "The Garden: main course" and the caption says, "Thanks to you, we are cooking. Mmm, mmm, great!" "Team Spring Garden" was the title of another memo recapping the school's objectives, past record of performance, and targets. The subtitle was "Together...on the climb to glory."

A former baseball player and ever-avid fan, the principal adapted dialogue and scenes from the baseball movie, Field of Dreams, to Spring Garden in a letter to staff before spring vacation 1990. The letter read in part:

I have watched Field of Dreams twice. Each time, and many times since in replays in my mind, in the midst of that Iowa cornfield I see the Garden and I see you. Every day by your example you serve our children and you encourage, foster, and elevate a schoolwide culture of caring and togetherness. The norm of behavior you constantly reinforce is "to go the extra miles"; "to bleed blue and gold"; "to live high expectations"; "to love one another"...to lead a worklife wed to duty for children and colleagues.

The letter's closing reads: "Always yours in high expectations."

The introduction of a model with features similar to those of the current Chapter 1 schoolwide project thus came to Spring Garden four years before the project was officially launched. Spring Garden, then, provides a case study of a project at a more mature stage than others only in their second or third year. It is for this reason that Spring Garden teachers had a hard time reporting dramatic change from the official beginning of the schoolwide project until the present. Although in some ways Spring Garden's history makes it atypical of Chapter 1 schoolwide projects, it may nonetheless suggest the project's potential in other settings.

Mission and Goals

The mission of the principal and staff at Spring Garden during the study period was to nurture successful, achieving children. As stated in their school improvement plan for 1988 to 1991, Spring Garden's goal is to increase student achievement so that:

- 70 percent of all students will be at or above grade level in reading
- 70 percent of all students will receive grades of A or B on report cards in major subject areas
- 80 percent of students will attain a 95 percent attendance rate (meaning fewer than 10 days absent) for the year
- 97 percent of students on average will arrive on time for school each day.

An additional goal states that two percent of parents will attend five scheduled educational or informational events over the course of the year.

Spring Garden's Schoolwide Project proposal for 1990-1991 lists a set of interventions that support its goals:

- use of Pupil Support Committee to assist specific children (and their teachers) who are experiencing significant difficulty in academics and/or social achievement
- staff development on teaching thinking
- use of I CAN PROBLEM SOLVE (ICPS) to resolve interpersonal conflict among students, build students' self esteem, and ensure the peaceful climate of the school
- provide tutoring before and after school for children at risk
- provide monthly assemblies and classroom work for career awareness through the Penn State Adoption program
- maintain affiliation with neighborhood groups such as the Zoar United Methodist Church for after-school tutoring and the Richard Allen Homes Tenant's Council for student recognition and school publicity.

The document also lists other interventions aimed at providing academic support. These include continuing reduced student/staff ratios to provide more engaged learning time, continuing staff development programs that help improve instructional skills, and continuing the purchase of supplementary materials, learning aids, services, and equipment.

Discussion questions: To what extent are Spring Garden's goals attainable? What might be more appropriate targets, if any?

Organization of the School and the Staff

As the schoolwide project has evolved at Spring Garden, it has introduced some new staff roles, altered some existing roles, and brought new structures into existence. The roles of the math resource teacher (EMRT), the program support teacher (PST), and school/community liaison have come into being or have changed as a result of the schoolwide project at Spring Garden.

- Math resource teacher (EMRT) under the schoolwide project is authorized to work with any or all of Spring Garden's children. Under conventional Chapter 1 rules, this staff member would only be allowed to work with participants eligible for and admitted to the Chapter 1 program. Given the relaxation of the rules, she has concentrated on the primary grades (while the school's auxiliary substitute has worked with the upper grades). She has also been able to pull out whichever children the classroom teacher and she felt needed attention in a small group. This sometimes has included children whose problems lie more in controlling their emotions rather than mastering math. Her schedule during the study period included meetings with groups of eight or nine youngsters three times each week.

Other duties for the EMRT have included consultation with individuals and groups of teachers. In this role, she has conducted demonstrations, arranged for demonstrations or workshops by others, met with teachers in the cross-grade math curriculum committee and in grade groups to determine their needs and help them frame appropriate responses. She has played a pivotal role in ordering materials. ("If it wasn't for me," she said, "they wouldn't have the materials they need.") As EMRT, she has also calculated teachers' math grades and has reviewed them with teachers in what she termed a "combined conscientious effort."

- Program support teacher (PST) at Spring Garden has been a flexible role, responsible for direct instruction in individual classrooms as well as performance of schoolwide duties that vary with need. During the study period, the PST spent up to two hours a day in classrooms; served on the pupil support committee and the self-esteem committee; acted as testing coordinator for all standardized tests except for TELLS; made student assignments to classes for the coming year; and assisted the principal in dealing with students' behavior problems as necessary. She also chaired grade group meetings and the social studies curriculum committee when these groups were convened. A former lead teacher and instructional support teacher, the PST at Spring Garden had previously performed many of these roles at one time or another and said that she tried now to get involved in as many things as possible.
- School/community liaison during the study period had lived in the Spring Garden neighborhood all her life and knew it well. Her duties in the schoolwide project continued and further developed the

types of things she had done in the conventional Chapter 1 program. For example, she made seven or eight home visits daily to follow up student attendance, nurse referrals (i.e., reminding some parents to have their children examined by a physician), and other matters that teachers, the counselor, the noontime aides, or parents might have requested. "Here we don't let things pile up," she said. "We get on it right away." The liaison also spent time with individual students and had a case load as part of her service on the self-esteem committee.

As of a few years ago, Spring Garden's school/community liaison completed a bachelor's degree in early childhood education which would qualify her for a classroom teaching position. She recognized that she could get a larger paycheck as a teacher, but felt that she was a teacher in the work she already did at Spring Garden.

The schoolwide project has also brought several new structures into being at Spring Garden. Among these were grade groups, the pupil support committee, and the self-esteem committee, which are described below. However, given the principal's stress on teams as a means to "advance our mission...and support the peace and unity of our school climate," Spring Garden also had other groups which related only indirectly to the schoolwide project. The principal listed 29 of these groups at one point, including the three to be described. Some of these were formal committees, such as the union-mandated building committee, and some were informal, such as "by floors" (teachers whose classrooms were on the same floor) and "lunchroom" (individuals who tended to eat together). Although the principal clearly believed that each of these groups made some contribution to student achievement, this report will focus on the three most closely related to the schoolwide project.

- Grade groups were grade-level teams that met primarily during schoolwide project planning days. Grade groups also met occasionally during regularly-scheduled faculty meetings. A common prep period had been scheduled one day each week to accommodate grade groups' consideration of other business, but various grades differed in the extent to which they used this time.

The first grade teachers reported themselves as actively coordinating and sharing. As one first grade teacher indicated, "If one bleeds, the other is right there with you. We help each other. For example, a problem child can visit another class. We share materials and the BQC [Beautiful Quiet Children club, part of the assertive discipline program in Spring Garden's first grade classrooms] crosses all first grades." Although meetings may have been infrequent, other grades also shared: the third grades pooled for a science experiment and others sometimes cycled students for reading and math. At Spring Garden, we were told, teachers don't have to go through the administration to make such arrangements. On the contrary, they have been encouraged to work it out themselves.

- Pupil support committee (PSC) met weekly or bimonthly for an hour before school to review the cases of individual students with achievement or behavior problems and to explore ideas for

assistance. Formal members of the PSC at Spring Garden during the study period were the principal, the counselor, the nurse, and reading and math specialists, but anyone could attend (and be paid) as long as he or she contributed ideas. Any staff who were dealing with the child under review were expected to attend.

PSC meetings provided a thorough review of each case through staff members' reports of what had been done, what worked and what hadn't, and discussion of additional strategies to implement. "The timing of the meeting may not always be ideal, especially when you are confronting the problem daily," a teacher commented, "but the PSC has ensured that help will eventually come to you."

- Self-esteem committee denoted the group of nine Spring Garden adults who collectively were responsible for 50 to 60 students each month. The adults included the counselor, the building engineer, the male helper, the school/community liaison, two noontime aides, two classroom assistants, and the PST. The students they saw were mostly nominated by classroom teachers who observed these students to have some problem, be chronically disruptive, or capable of doing better work.

The committee of adults rarely met but members met regularly with their students, either individually or in small groups. The content of these encounters might be unstructured conversation or a review of lessons from the I Can Problem-Solve program. Committee members developed their own styles of working with the youngsters. The counselor said it looked a lot like counseling for her; for others, it probably did not. The aim was to help these students develop the confidence to know that they can be anything they want to be. One outcome attributed to the activities of the self-esteem committee was fewer fights among students.

Discussion questions: What determines the actual activities that the incumbents in these positions undertake? To what extent have these roles changed over time?

What assistance could Spring Garden's groups use to meet their goals more effectively? Where might such help be found?

Current Strategies and Activities for Achieving School Goals

This part summarizes the current status and contemplated changes in Spring Garden's plans for improvement. Updated plans on file with the central office supplemented information that school site respondents provided for this part.

Achievement

Spring Garden's efforts to improve student achievement were firmly rooted in a process that first monitored progress and then devised strategies for improvement. The faculty was long accustomed to a data-driven

model, but the principal has stressed personalizing the data and attaching children's faces to the numbers. For example, the principal calculated that a one percent gain translated into 3.6 students: if 3.6 students could improve their grades or their scores, then Spring Garden would be one percent closer to achieving its goals. Another approach was to translate school targets into very specific, individually-tailored instructional objectives. For example, the principal and a teacher might confer about helping a particular child get three more right on a citywide test.

Data about student performance were routinely shared with teachers and parents at Spring Garden during the study period. The principal usually summarized the information and distributed it promptly to staff. At least one faculty meeting would then be geared to discussion of the data and possible responses. Staff would follow up in various ways.

Data on student performance also had consequences for the allocation of staff at Spring Garden. For example, the decision to have the auxiliary substitute focus on the upper grades was stimulated in part by their low scores on citywide tests. Having the program support teacher spend 120 minutes instead of the required 90 minutes in direct instruction was another strategic decision made in light of Spring Garden's achievement goals. Similarly, decisions about placement of classroom assistants, assignment of students to tutoring, and priority subject areas for purchase of additional materials were all predicated to some degree on achievement data.

Attendance

Spring Garden used three interrelated strategies to work toward its attendance goals during the study period. One strategy was keeping visible records of student attendance. A teacher and an assistant monitored daily attendance and charted it with stickers outside each classroom. A second strategy was to award certificates for good attendance to individuals and classes at the end of each marking period and at the end of the year. A third strategy was to post two community assistants in the halls to check attendance for latecomers, identify students with extended absences, and sometimes to make home contacts in regard to student attendance.

On the whole, teacher attendance was good during the study period. Teachers, too, could earn awards: the principal handed out medallions for perfect attendance. There were sanctions for poor attendance as well: the only teacher to receive an unsatisfactory rating during the study period did so on the basis of attendance.

Parent Involvement

The active involvement of Spring Garden's parents has been the result of much planning and effort by many people. The school/community liaison has had a hand in it by staffing the home/school association, initiating parenting classes, helping parents learn about early childhood opportunities in the neighborhood and about Spring Garden's outreach activities. In addition, she has often been parents' first stop inside the school, a gatekeeper and problem-solver who has earned parents' trust.

Community assistants, selected parents who perform various support functions around Spring Garden, have also had a hand in it. The school/community liaison has recruited social leaders in the community for these jobs because of their effectiveness in negotiating between the school and parents, helping to get the word out and parents in.

Teachers' activities to gain the involvement of parents are described in the next section rather than here, but they, too, have reached out to parents. Many have succeeded in attracting close to 100 percent participation at parent conferences at report card time. The science supervisor was characterized as one of the biggest cheerleaders in representing parent involvement to the faculty as a positive force. "She's upbeat, always talking about it, insisting how invested Spring Garden parents are in their kids' education, and trying to get staff and parents to the place where parents normally will ask teachers, 'How can we together help my kid?'"

The principal has lent his energy to boost parent involvement as well. One example was his offer to telephone parents during a designated hour on Thursday Night Thunder, a Spring Garden promotion of the Books and Beyond reading program. As presented to the students, the stated purpose was to "catch kids reading" and to "hear pages turning." The real purpose was to share the success with parents and to use it as a further inspiration. The principal reported that parents were inspired, many encouraging their children to exceed the goal of reading two or three pages a night for Books and Beyond.

All of these activities have resulted in a "vast, steady improvement" in parents' understanding of what school is all about, according to a teacher. The school/community liaison gauged that parents have learned over time that "we do extend our hand and they feel comfortable" with the school. Two measurable outcomes were the number of parent participations in the course of the year (over 1000, the school/community liaison said) and the fact that parents have begun to volunteer for various school roles.

Self-Esteem

Enhancing the self-esteem of students, parents, and staff has been a priority related to Spring Garden's mission of nurturing successful children. It is also the aim of several strategies. One of these, the Self-Esteem Committee, was described above. The school's assertive discipline program, adopted this past winter, was also mentioned. Teachers used it in their classrooms with the support of two teaching assistants who maintained the supplies of the token system and managed the accounting of the gold slips and prizes children could earn for good behavior. The principal has provided a non-tangible reward: basketball with him after school on Fridays for kids who have behaved especially well.

Counseling was another strategy. At Spring Garden, the counselor expected to see about 25 percent of the children individually over the course of a year. Counseling at Spring Garden was considered neither a punishment nor a shame: it was just one more way to help solve problems. Spring Garden's kids have the exact same problems as all other kids plus poverty, which compounds whatever else is going on, the counselor asserted. If she could free herself from the crisis counseling that made up most of

her work, the counselor would prefer to spend more time working with small groups in regular classrooms.

Building up the self-esteem of staff was also an explicit part of the plan. The principal "makes teachers feel valued, cherished, important, and then teachers can impart that to kids," a teacher stated. At a recent faculty meeting, the principal discussed the Japanese management practice that has been described as modeling love and told the staff, "This is about you."

The non-teaching assistants at Spring Garden were also part of the strategic plan. The principal coached one assistant to assume the role of first line of adult authority outside the classroom. One assumes that he helped her see herself as capable of doing the job. He apparently succeeded because the word on the yard and in the lunchroom was that this assistant speaks for the principal.

Spring Garden has also tried specifically to build parents' self-esteem. They have been included in celebrations of good scores, as discussed above, and were even congratulated by letter for their role in Spring Garden's inclusion in this study ("Mom and Dad have helped make Spring Garden selected as a model..."). Parent-Teacher talent shows have been scheduled from time to time where parents show off their singing, karate, or sewing technique. The school also held its annual Parent Recognition Assembly in June. Parents on staff proudly displayed the paper corsages and inscribed trophies they had received. The self-esteem committee has also made contact with parents to provide positive feedback about their children, for example, writing a parent a note of thanks for sending the child to school in such a good mood.

Discussion questions: How closely do these strategies conform to the school's goals? How effective do they appear to be? To what extent do all staff contribute to these strategies? What is the process for suggesting, adopting, and implementing new strategies or revising existing strategies? When is it appropriate to suggest new ideas or ideas for modifying existing strategies?

Summary: Effects of Being a Schoolwide Project

Spring Garden has had a special relationship to the Chapter 1 schoolwide project over the years. The genesis of that special relationship lies in the fact that one of the originators of Philadelphia's concept of the schoolwide project first tried out his ideas during a four-year tenure as principal of Spring Garden. When the program got its official start a year or two later, Spring Garden had in some ways already been implementing it for several years. This is doubtless the reason for a teacher saying that she really didn't see a change. As a colleague explained:

The schoolwide project seems like programs we always had. It's stuff we've already been doing, just a different title. The goals [we now have] maybe were previously unwritten, but they have not changed.

The changes that others could see have tended to be subtle, more gradual refinements in long-term progress than stark contrasts between before and after. Staff comments about the effects of the schoolwide project at Spring Garden are reproduced below.

- "The schoolwide project keeps us on task."
- "The organization of personnel is different and better: the program support teacher provides stability (like a teacher-in-charge) when the principal is out of the building; the permanent sub allows the principal to call on teachers individually to ask we are doing and how our kids are doing. Every living body does something and nothing is decided without our input."
- "The numbers [Spring Garden's target objectives and data on student performance] are useful as referents. They provide a useful common language. And plans are a good thing. But here's my off-the-wall comment: if you got all the plans together and threw them out, it would still work at Spring Garden because there are good people here and it's self-generating."
- "The impact of the schoolwide project has mainly been financial: Spring Garden got more materials, extra support people in the building, and new district staff assigned. The theme we get from the district staff is accountability, but the discretion we get from the project makes it worthwhile."
- "The principal has created a culture in which his message is the norm. [The norm states that] hands, time, and money are all available."
- "The benefits of the schoolwide project are extra money to buy extra staff and things for kids. But the money is sometimes more than we can use. Now that money is available, people ask if they are paid for time they used to give free. Even the money for materials is not the main thing. The materials are nice. They can stretch teachers' imaginations and they're psychologically important to teachers and students. What matters more is what teachers do with the materials to help children learn."
- "Teachers are pleased with the results of the former principal's little experiment."
- "There's always more to do. We never leave it alone. [It may look good] but we're always on the edge of disaster. Something could go wrong and we're ready to fall apart. The bad news is we're in the bottom of the ninth, there are two outs, and we're losing. But the good news is we've got a rally going."

SECTION II

CURRENT INSTRUCTIONAL PRACTICE AT SPRING GARDEN -- A SNAPSHOT

The second task of the study was to collect information that would suggest the current status of instructional practice in the school.

To this end, a team of educators who have worked with other Chapter 1 programs visited Spring Garden Elementary School on April 2, 3, and 4. The principal selected teachers to be visited and interviewed. Over the course of two full school days, the team visited eight classes and then interviewed the eight teachers for 30 to 45 minutes each. These eight teachers represented about one-third of the classroom teachers in the building.

This section summarizes the results of the team's classroom visits and interviews. It is organized into five parts. The first provides a brief overview of the classes visited. The second summarizes the framework of research-based factors used to structure the collection of information and describes the methods used to collect the information. The remaining sections summarize information collected for the student-related factors, the classroom-related factors, and the school and district-related factors.

Following the summary of information for each factor, some discussion questions are suggested. In general terms, they ask:

- To what extent do you agree with the perspective on instructional practice, presented in the framework of research-based factors?
- To what extent do the descriptions reflect instructional practices found across all classes and grades in the building?
- To what extent do the descriptions suggest practices that could benefit from further study and/or action?

Classes Visited

Table 1 shows the grade levels and subject areas of the classes visited. They represent four of Spring Garden's six grade levels (K-5).

Eight lessons were seen in all. They varied in content and in types of activity, as illustrated below.

- One of the first grade reading lessons began with some students dramatizing a "big book" story as the teacher read it aloud to the whole class. The class then split into three groups: the classroom assistant worked from a workbook with one group on vowels; the

Table 1

Lessons Seen by Team During Classroom Visits

<u>Subject Grade</u>	<u>Reading/ Language Arts</u>	<u>Math</u>	<u>Social Studies</u>	<u>Science</u>	<u>Writing</u>	<u>Total Lessons</u>
1	2	0	0	0	1	3
2	0	0	0	1	0	1
4/5	0	0	1	0	0	1
5	0	1	0	1	1	3
Total	2	1	1	2	2	8

teacher led another group through reading and discussing a story, and intermittently supervised a smaller third group reading stories on their own.

- The other first grade reading lesson tackled sequencing of events. The teacher wrote sentences on the board about various events, discussed them with students, and later provided students with other sentences to write in logical order on worksheets. The teacher worked with a small group of students while the majority worked with a classroom assistant and one child worked with a community assistant.
- The remaining first grade lesson was a creative writing exercise, a letter to the Easter bunny. Using whole group instruction, the teacher elicited students' experience to develop the concepts and vocabulary to be included. Students then started work on their own letters with the teacher helping individuals.
- The second grade science lesson centered on the characteristics of plants and seeds. The lesson consisted of the teacher's explanation and then a discussion with the whole class. The teacher noted students' comments on the board as they were made and reviewed this information at the close of the lesson.
- The combination fourth and fifth grade lesson was in social studies. The teacher read aloud portions of a biographical account of a black Civil War soldier from Philadelphia. The teacher paused at key points to check students' understanding of concepts and vocabulary, to take questions, and to elicit discussion of specific content.
- The fifth grade science lesson dealt with botanical food systems. The lesson was geared to the whole group and included an oral review of a previous lesson, demonstration and discussion around a plant and two terraria, and work on related vocabulary. During the lessons, students responded orally to questions, examined plants, wrote and reported observations, and took notes.
- The fifth grade lesson involved students in collective storywriting. The lesson began with a review of story parts -- through recall, oral reading and brief analysis of a story -- and explication of "elaboration," which students were then to illustrate in the stories they wrote. After students divided into groups, one student at a time in each group successively wrote sections of the group's story while the teacher kept time. The teacher and students then read the stories aloud.
- The fifth grade mathematics lesson focused on problem solving. It began with an oral review of strategies and whole group attempts to solve two challenging warm-up problems. For one that entailed deducing the number of people who would shake hands a given number of times, the teacher had students act out possible solutions. The whole class worked some number series problems together, and the rest as seatwork. The whole class reviewed the solutions and individually worked on the final set of problems while the teacher

checked their work. During part of this lesson, the classroom assistant gave make-up tests to one or two students.

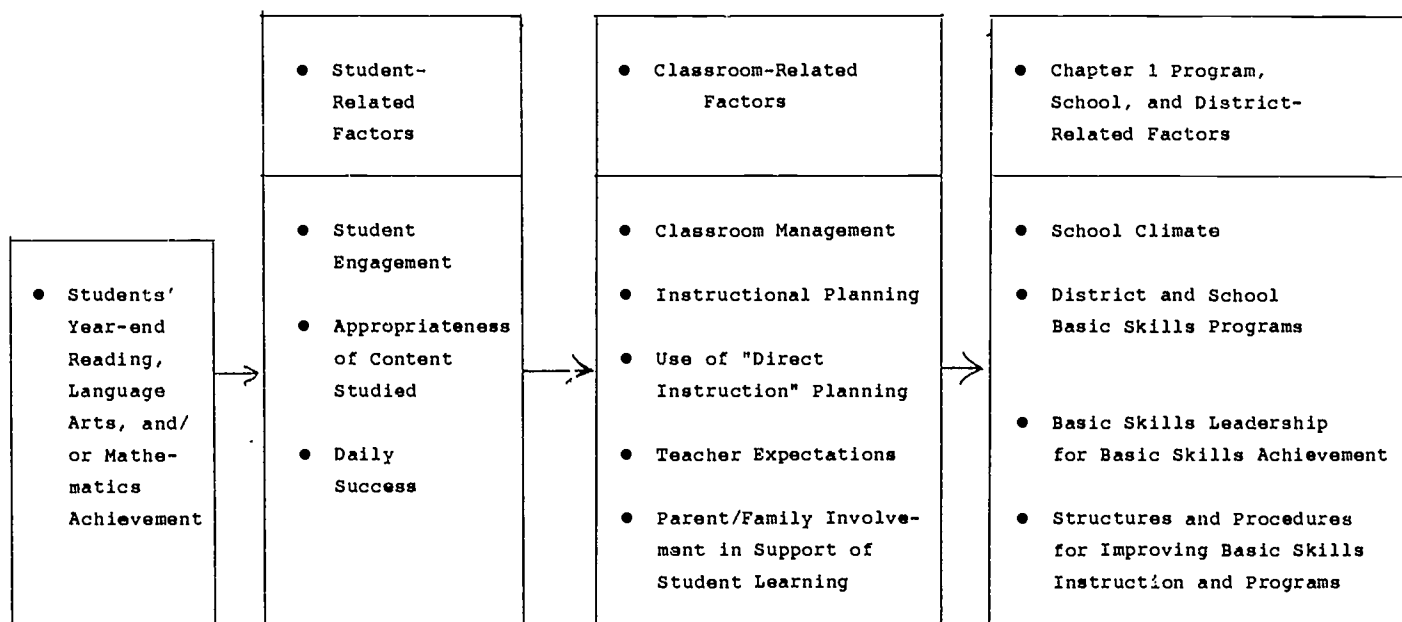
Framework of Research-Based Factors and Study Methods

This part describes the framework of research-based factors used to collect information from the teachers and classes described above. It also provides a brief description of the methods used for collecting and analyzing the data.

The Framework

Figure 1 provides an overview of the research-based factors that were used to structure the collection of information on instruction-related practices. It was developed by the designers of the Pennsylvania Chapter 1 program improvement process, known as MAGIC.

Figure 1
Framework of Research-Based Factors



The framework should be read as follows. Research suggests that students are more apt to show high levels of achievement on unit or year-end measures, if they

- are actively engaged in learning activities during a significant part of each day

- are studying content that is appropriate, given what they have learned to date and what will be assessed on unit and year-end measures
- experience a moderately high level of daily success on their learning activities.

Current research suggests that these factors are, in turn, influenced by what happens in classrooms and what teachers plan and do:

- how well they manage their classrooms
- how they balance in their instructional planning the requirements of the curriculum, what knowledge and skills students can demonstrate, and how individual students learn best
- the extent to which they teach in a manner that reflects the "direct instruction" approach
- the extent to which they expect that all of their students can succeed and the extent to which they take steps to provide a classroom environment and instruction that are consistent with that expectation
- the extent to which they succeed in involving parents or other family members in active support of their students' learning.

Current research also suggests that what happens in classrooms and what teachers do can be influenced by the climate of the school, the structure of the school/district program, the extent to which school leadership and the school as an organization focus on improving student achievement, and the structures and procedures that help teachers improve instruction. Only the latter is addressed in this part of the study; the others have been addressed earlier.

In summary, it must be stressed that this framework provides one way of conceptualizing the interrelationship of factors that research suggests influence students' basic skills achievement. It is also important to note the interrelationships among the factors. For example, high levels of student engagement may have little relationship to achievement if students are not engaged in learning appropriate content.

Methods Used

Two methods were used to collect information: classroom visits and interviews. To collect information about student engagement, classroom management, and instructional approach, the team visited eight classrooms for periods of approximately 45 minutes each. While visiting a class, the team used the MAGIC forms for observing student and teacher behaviors. One member of the team scanned the class every three minutes, and used the student behavior form to note the number of students who were engaged in academic tasks, and if not engaged, whether they were in-transition between academic tasks or off-task. The proportion of students who were observed

being engaged, in-transition, and off-task could then be calculated for the whole class period. (See the appendix for the observation form; see Table 2 for definitions and summary of student behaviors seen.)

Every 30 or 60 seconds, the other team member recorded whether the teacher was instructing, managing, or disciplining. Teachers' instructional behaviors were described as orienting, explaining/demonstrating, providing guided practice, monitoring independent practice, or providing feedback and reinforcement related to independent practice. The team was then able to calculate the proportion of time the various behaviors were recorded. (See the appendix for the observation form; see Tables 3 and 4 for definitions and summary of teacher behaviors seen.)

To collect information on the other factors, the team used modified MAGIC interview forms to structure interviews with all the visited teachers. The four team members then summarized the results of classroom visits and interviews on worksheets. MAGIC interview schedules and worksheets are included in the appendix. The descriptions below are based on this entire body of information.

The Status of the Student-Related Factors

The framework suggests that students' level of achievement can be predicted by the extent of student engagement in learning activities which address appropriate content and through which they experience a moderately high level of daily success. These factors are discussed below.

Student Engagement

Table 2 shows the proportion of student behavior that was coded as "engaged," "in-transition," or "off-task" for each of the eight lessons seen. The lessons are listed in descending order according to the level of engagement.

Student engagement was generally high in the lessons seen at Spring Garden. Engagement ranged from 77 to 96 percent in seven of the eight lessons seen. Engagement was very high (approximately 90 percent and above) in five of the seven lessons and moderately high (above 75 percent) in the other two lessons.

The eighth lesson, which was structured to allow only a few students to work while the others waited, consequently had only 45 percent engaged time. This lesson clearly illustrated how large blocks of non-engaged time can create a downward spiral of increasing in-transition and off-task behaviors. The teacher later discussed with team members how the lesson could be restructured to engage all students more. Because of this lesson's unrepresentativeness, it will not be included in the remainder of this discussion of student behavior.

Non-engaged time was coded either as in-transition or off-task. Given the high levels of student engagement in the seven lessons, both in-transition and off-task behaviors tended to be relatively low. In-transition behaviors were

Table 2

Distribution of Student Behaviors
Seen During Eight Lessons
(Ranked by Level of Engagement)

<u>Lesson Number</u>	<u>Engaged</u>	<u>In-Transition</u>	<u>Off-Task</u>
1	96%	0%	4%
2	95%	0%	5%
3	91%	5%	4%
4	90%	7%	3%
5	89%	5%	6%
6	82%	12%	6%
7a	77%	14%	9%
8b	45%	18%	37%

Note: Lesson numbers do not correspond to the lesson numbers appearing on other tables. They are provided only to facilitate discussion of the data on this table.

^aAdds to 101 percent because of rounding.

^bThis lesson was structured to engage only a few children at a time while the others waited.

Definitions:

Engaged: Students are engaged when they are involved in or attending to instruction.

In-transition: Students are in-transition when they are "in between" or preparing for the next activity.

Off-task: Students are off-task when one of these four behaviors is observed: socializing, being disciplined, unoccupied/observing, and out of room.

most pronounced where engagement was moderately high. Off-task behavior was kept below 10 percent of available time in all seven lessons.

Discussion questions: Why do students exhibit a higher level of engagement during some lessons than others? When students exhibit lower levels of engagement, do they exhibit different patterns of non-engaged behaviors? To what extent do these patterns of student behavior generalize to all lessons taught every day?

Appropriateness of Skills Studied

The teachers were asked to show their student records and to discuss the relationship of lessons' content to students' prior learning and to the learning that would be assessed.

All teachers kept individual student records. However, teachers varied in the type of recordkeeping systems they found useful. Among the systems used were the city's Student Progress Record Book, grading sheets, folders for writing and other work, "redo" notations inside the cover of students' workbooks, a "homework" book, and other types of checklists. The summary records typically showed the degree to which work was completed and mastered by noting grades for classwork, homework, teacher-made tests, and selected standardized tests such as the citywide tests.¹ Folders of student work contained samples of student performance. A file of student writing, for example, was used to document growth in the amount that students wrote and in correct use of quotation or story parts. Despite all the records that teachers kept, one remarked that some recordkeeping about students' daily work in class is necessarily mental.

All the teachers interviewed stated that they took students' prior learning into account when they planned and presented instruction. Speaking of the grand sweep of instruction, most teachers referred to the city's curriculum with its strands and pacing plans as well as textbooks' scope and sequence charts that, on the whole, structure learning logically within the year and from year to year. Other teachers spoke of their own efforts to insure that they build on students' prior learning. For primary reading, for example, one teacher first encourages children to use a story's illustrations and other context clues to help them interpret the text, intending it to feed into their understanding of main idea and characterization.

In summary, Spring Garden teachers have adopted city-mandated curriculum and recordkeeping procedures to ensure that students work on appropriate studies. In many instances, they have also supplemented these official procedures with aids and systems of their own.

Discussion questions: Should there be standardized measures for all parts of the curriculum? What useful procedures have teachers developed themselves and can others adapt them?

¹Several teachers noted that some skills taught -- such as writing -- are not assessed by citywide tests.

Students' Daily Success

The framework assumes that success is a great motivator and predictor of future success, especially for students at risk. For this reason, the teachers were asked to estimate how many of their students experienced a moderately high level of success (75 percent or more) in their daily work.

Success, according to one teacher, "is when they smile; when the light goes on and they show they understand." Another teacher defined success as a child going home happy and feeling good about the day, while still another said success was doing something well -- having one's work judged exemplary enough to be displayed in the classroom or, for a reluctant learner, producing some work to show for the day.

Teachers' estimates of children experiencing daily success ranged from a high of 82 to a low of 20 percent. The mean was about 60 percent, reflecting that all but one teacher had estimated that at least half of their children experienced success daily. The exceptionally low estimate came from a teacher whose first grade students were grouped on the basis of their lack of school success. As she sees it, her job is to help these kids "get it," too.

Teachers' strategies to help students "get it" are discussed in the section called Teacher Expectations.

Discussion question: How do teachers at Spring Garden define daily success for students? How can more children experience daily success?

The Status of Classroom-Related Factors

The framework suggests that teachers can profoundly affect the engagement and success rates of their students. This part discusses team findings about factors at Spring Garden that can influence these rates: classroom management, instructional planning, use of alternative instructional approaches, teacher expectations, and parent involvement.

Classroom Management

One indicator of how well students and instruction are managed is how students spend their time in school. Table 2, discussed earlier, showed that students in the visited classrooms mostly spent their time engaged in learning tasks as opposed to in-transition and off-task.

Another indicator of instructional management is how teachers spend their time in the classroom. Table 3 shows the extent to which teachers spent their time instructing, managing, and disciplining in the lessons seen. The eight lessons are listed according to the proportion of time spent in instruction.

The amount of instructional time in the eight lessons ranged from 67 to 98 percent. None of the teachers had to spend much time disciplining students (5 percent or less), so the major differences were due to variations

Table 3

Distribution of Teacher Behaviors
 Seen During Eight Lessons
 (Ranked by Amount of Instructional Behavior Observed)

<u>Lesson Number</u>	<u>Instructional</u>	<u>Management</u>	<u>Discipline</u>
1	98%	2%	0%
2	94%	6%	0%
3	89%	6%	5%
4	82%	18%	1%
5	82%	17%	1%
6	75%	21%	4%
7	70%	25%	5%
8	67%	29%	4%

Note: Lesson numbers do not correspond to the lesson numbers appearing on other tables.

Definitions:

Instruction: Teachers are instructing when one of these five behaviors is observed: orienting, explaining, providing guided practice, monitoring independent practice, and providing feedback and reinforcement on independent practice.

Management: Teachers are giving and clarifying directions, passing out papers, or undertaking other tasks which organize students for instructional activity.

Discipline: Teachers are attending to off-task student behavior -- for example, socializing or unoccupied/inattentive behavior.

in the time that teachers spent managing. This study defines managing as preparing or organizing students for instruction by giving directions or passing out papers, for example. The lessons with the greatest amount of instruction spent 6 percent or less of class time on these activities. Lessons containing less instructional time spent from three to five times that amount on management.

Discussion questions: To what extent do these patterns of teacher behavior generalize to all lessons taught each day? Why are some teachers able to spend significantly more time instructing? How can the topic of classroom management be considered productively at staff development and grade group sessions?

Instructional Planning

Teachers discussed influences on their instructional plans, both generally and specifically in reference to the lessons seen. The questions that they addressed included the role of the citywide curriculum, students' performance on tests, and information about individual students' learning styles.

The influence of the district curriculum. The eight teachers reported that the city's Curriculum Guide was a major influence in their planning. Various teachers indicated that the guide was useful for stating goals and objectives, pacing the introduction of topics, and marking out the progress that students could reasonably be expected to make. Teachers at Spring Garden did not rely exclusively on the guide, however; several described how they elaborated on what the curriculum guide specified by using a variety of materials and strategies from other sources, such as commercially-available materials, and by reteaching certain topics when necessary. One teacher noted that the extent of prescription varies by topic within the guides: "The curriculum is looser around animal science than plant science," this teacher remarked. Several teachers also pointed out that the guide does not cover writing. As a result, they designed their own approaches to that subject, such as encouraging students to base their writing on personal interests. However, these teachers used the guides to a large extent in all other subjects.

The influence of student test results. Citywide tests and other formal and informal assessments kept teachers aware of how many students were mastering the curriculum and the degree of their mastery. Teachers generally liked the citywide test because it matched the standardized curriculum. Teachers used other types of assessment as well, including basal mastery tests (which one teacher regarded as more accurate than citywide tests), teacher-made tests, and teacher observation. Several teachers also made sure to monitor how well students listened and followed directions in various subjects and how they performed on independent seatwork. Test and observational results suggested to teachers when reteaching was necessary, which students needed additional help, and when students needed to be challenged more.

The influence of the individual learning styles. To the extent that teachers could discern the way students learn best, teachers took account of that information in their instructional planning. Teachers made use of this information in various ways.

- One teacher "switched up" activities, that is, alternated among several work modes such as paper-and-pencil tasks, individual work on projects, and group work. This teacher also deliberately varied the skills students were instructed to use, such as writing a science fiction story based on facts the students had learned, illustrating the story, and finally, reading it aloud.
- Another teacher assigned individual students tasks that were compatible with their learning styles by dividing the class into small groups. In one, students who could work on their own did so; students who needed intensive review of a concept worked with the teaching assistant in another group; the others worked directly with the teacher.
- Still another teacher attempted to involve all students through direct instruction. For example, this teacher reported watching students' faces for signs of comprehension and calling on shy students to help them participate.
- Two of the eight teachers took individual learning styles into consideration by prescribing special programs, such as in-class tutoring, for students having difficulty. They also sought help from resources such as the reading resource teacher, the principal, and others.

One teacher pointed out that teachers don't always have the luxury of differentiating students' learning styles. This teacher's solution was to deal with individual problems as they arose.

Discussion questions: To what extent do all teachers have common decision rules about when the information from tests requires reteaching and when it requires them to provide or obtain special help for specific students? To what extent does each teacher have an adequate set of strategies to address the diverse ways in which students learn best? How can teachers pool their knowledge about dealing with individual differences?

Instructional Approaches Used

Table 4 shows the extent to which five instructional behaviors were seen during each of the lessons. Three of these behaviors -- orienting, explaining, and providing guided practice -- can be characterized as direct instruction. The other two behaviors -- monitoring independent practice and providing feedback on independent practice -- are characterized as indirect instruction. The lessons in Table 4 are listed for convenience in order of the amount of time spent in direct instruction.

Table 4

Distribution of Instructional Behaviors Seen During Eight Lessons

Lesson Number	Direct Behaviors			Indirect Behaviors			Total Indirect Behaviors
	1. Orienting	2. Explaining	3. Providing Guided Practice	4. Monitoring Independent Practice	5. Providing Feedback and Reinforcement on Independent Practice	Total Direct Behaviors	
1	21%	79%	0%	0%	0%	100%	0%
2	5%	11%	82%	2%	0%	98%	2%
3	2%	40%	46%	12%	0%	88%	12%
4	4%	72%	2%	5%	17%	78%	22%
5	5%	54%	18%	23%	0%	77%	23%
6	6%	38%	13%	43%	0%	57%	43%
7	8%	17%	30%	28%	17%	55%	45%
8	0%	31%	19%	37%	13%	50%	50%

Definitions:

- Orienting: the teacher provides students with an overview of the lesson.
- Explaining: the teacher demonstrates, models, explains, and/or discusses lesson content.
- Providing guided practice: the teacher asks the students to practice the skill or apply a concept, rule, etc.
- Monitoring independent practice: the teacher collects information about student understanding and ability to demonstrate specific skills.
- Providing feedback and reinforcement on independent practice: the teacher gives students information on their performance, along with appropriate praise and reinforcement.

Definitions:

- Direct instructional behaviors: orienting, explaining, and providing guided practice.
- Indirect instructional behaviors: monitoring independent practice and providing feedback and reinforcement on independent practice.

Note: Lesson numbers do not correspond to the lesson numbers appearing on other tables. They are provided only to facilitate discussion of the data on this table.

Three of the eight lessons spent virtually all available time on direct instruction (from 88 to 100 percent). Three lessons spent from about 60 to 80 percent of the time on direct instruction. The other two lessons balanced time about evenly (50 to 55 percent) between direct and indirect instruction.

However, the proportion of time in each lesson that was devoted to each of the three component behaviors of direct instruction varied a great deal. All lessons except one included some kind of orientation; the time spent orienting ranged from 0 to 21 percent. The variation among lessons as to time spent explaining and time spent providing guided practice ranged much more widely over the eight lessons: teachers' explaining behavior ranged from 11 to 79 percent of available time and provision of guided practice ranged from 0 to 82 percent. The only generalizations that can be made are that five of the eight lessons spent more time explaining than orienting or providing guided practice, while guided practice took up the bulk of direct instruction time in the three other lessons.

Teachers spent 0 to 50 percent of their time using indirect instructional behaviors (simply the inverse of time spent on direct instruction). In three lessons, teachers spent some time both monitoring and providing feedback on students' independent work. In the five other lessons, teachers spent no time providing feedback on independent practice.

Discussion questions: Under what conditions should direct instruction be used? Is there a desirable balance among the components of direct instruction? Is there a desirable balance between the components of indirect instruction? To what extent should there be schoolwide consistency on these?

Teacher Expectations

Teachers were asked about their expectations for students to learn higher order thinking skills, to be motivated to achieve in school, and to be successful in their daily work.

Expectations for all students to learn higher order thinking skills. All teachers indicated that they used strategies to encourage students to develop higher order thinking. Spring Garden had adopted the thinking model from the city's four models for emphasis in schoolwide projects. Only one teacher referred specifically to the "KWL" method associated with Spring Garden's model. The other teachers spoke in more general terms about helping students learn to think. Several said they used a mixture of lower and higher order skills, asking students not only to recall facts, but also to synthesize, analyze, and reconfigure information, and to infer and predict from the information. Several teachers also mentioned helping students to develop problem solving skills, especially in math and science. Examples of teaching thinking included:

- requiring each student to "ask one intelligent question" after listening to other students' oral reports

- asking students to observe differences in plant health and to infer the cause
- helping students to generalize from stories about children's actions and to apply the conclusions to their own lives
- inviting students to help plan class activities during the second half of the year
- giving students the opportunity to solve math problems about money by imagining real things to buy
- asking students to predict when graphing seed growth
- helping students distinguish between fantasy and reality about the Easter bunny
- asking students why people count by two's, five's, and ten's
- having students research on their own the answers to questions about a science experiment.

Apparently, a number of teachers also embedded thinking skills in the type of questions they asked students during class discussion; one indicated that the principal has especially noted questioning strategies in his review of lesson plans and feedback on observations.

Expectations regarding student motivation for school achievement. All teachers with whom this topic was discussed indicated one or more ways that they specifically tried to motivate students. Examples included:

- using team activities in which teams name themselves and challenge other teams
- using students' own backgrounds, interests, and things they bring from home as the basis for storytelling and writing
- giving students opportunities to provide answers in discussion and on tests and feeding back the results of their performance immediately
- telling students that learning is fun, setting high standards, instilling a sense of belonging and pride in their class by having special names for individuals and for the whole class ("I tell my kids from September on: This is the [teacher's name] academy and it's do or die in my room"), expressing genuine concern for student achievement, and providing rewards for achievement
- generally making learning fun through use of quality materials such as attractive science kits and interspersing guest speakers and field trips

- praising students, encouraging them to join the "BQC" (beautiful, quiet child) club establishing individual contracts and sending home weekly behavior charts, and rewarding students with stars, stickers, bookmarks, and treats.

Expectations for students' daily success and end-of-year promotion.

All eight teachers at Spring Garden gave evidence of their commitment to helping students succeed. Ways in which these teachers worked with youngsters who were not experiencing success included:

- working with students after school
- "buddying up" students in a group to complete class projects or assigning a peer tutor
- displaying students' work when they do experience success
- providing one-to-one assistance in class or in pull-out programs staffed by resource specialists
- tailoring homework to individuals' needs
- reteaching (perhaps in a different way) and assessing results
- regrouping
- keeping parents informed weekly of their children's weekly performance in classwork, homework, tests, and behavior.

Teachers' comments about how they planned to ensure students' promotion to the next grade echoed some of the strategies listed above. Teachers mentioned additional strategies that included:

- setting goals at the beginning of the year and maintaining high expectations throughout the year
- attempting to make the students aware of the need for better performance
- trying to identify students' difficulties and remediating them early in the year
- providing a focusing question and class notes for each topical area covered
- having students practice certain skills in several content areas.

Three teachers also expressed the view that the underlying strategy is working hard. "Everyone in the building works hard," one said. Another teacher, whose class is composed of students identified as needing extra help to succeed, sighed, "I wish I did [have a plan for getting students promoted]. I just go in every day and teach my little heart out and take it from there." After reciting a set of strategies she used for helping

students to succeed, the third teacher commented simply, "I have done all that I can."

An alternative is retention in grade. One teacher stated that "promotion is not always the answer" and that "first grade is the best place for retention." According to the principal, Spring Garden typically retains about one-third of its first graders each year. This is largely due, the principal said, to the number of students who come to the school aged six or older without any prior school experience or school readiness skills. Citywide policy to place six-year-olds in first grade also contributed to this phenomenon. Retentions taper off in the upper grades.

Discussion questions: Is the school most successful with students who come to school with pre-school experiences, who come to the same school for multiple years, and who attend school regularly? How many students are not meeting these expectations? Are there steps the staff can take that might more effectively address the needs of these students?

To what extent do staff agree on when to teach higher order skills? If there are real differences, should the staff explore the bases for these differences and seek a common perspective?

To what extent has the staff developed shared strategies for helping students who have not developed the commitment and motivation to achieve in school and/or who are being unsuccessful in their daily work? How effective are the various strategies?

Parent/Family Involvement

The framework suggests that parent involvement correlates with student achievement. The teachers were asked to estimate how many parents participated in class-related activities such as attending parent conferences, responding to communications from teachers, or assisting with classroom activities. They were also asked to estimate how many parents actively supported their children's learning at home.

Not all teachers provided estimates for both types of parent participation -- coming to school for various reasons or helping their children at home. However, most teachers provided estimates for the proportion of parents who helped their children at home. Estimates ranged widely from a high of 95 percent to a low of about 30 percent. That is, according to teachers' perceptions, almost all the parents in some classes actively supported the schooling enterprise, while in other classes, under a third of parents did.

Teachers explained the lower ranges of parent help at home in various ways. The difficulty of the material was one reason. As one teacher said, "Science words are hard," and another commented, "Parents are honest about not understanding fractions." Other reasons were that there is no one at home to help some students or, conversely, some students are able to do the work by themselves and so do not need help at home.

Most teachers at Spring Garden reported using regularly scheduled conferences to communicate with parents. Over and above various schoolwide

activities, other teachers sent letters home to all parents at the beginning of the year and sent weekly (or daily) reports or telephoned parents, especially when children were having difficulty. Other strategies that individual teachers used included:

- sending weekly reports on all students as to test scores and unfinished assignments, as well as sending reports about unfinished work two weeks before the end of the grading period
- making specific suggestions to parents (e.g., that a slow reader read to younger siblings)
- inviting parents to sit in when their children get help after school
- sending library books home to be read
- sending supplementary materials (skills sheets and old textbooks or workbooks) home with students who are having problems and asking parents to work on them with their children
- sending parents instructions about how to help their children with a book report without doing the work themselves
- sending birthday cards home
- inviting parents to holiday parties and celebrations where their children performed and the teacher, parents, and children shared food.

Some of these strategies clearly required extra effort and time from teachers, which these Spring Garden teachers seemed willing to give. One teacher reported staying late so often that she had earned the nickname, O.T., for all the overtime she put in.

Discussion questions: To what extent are the estimates of parent participation and parent/family support of student learning generalizable across the school? Why are some teachers able to obtain much higher parental participation and support? How might those teachers help other teachers gain similar levels of parental participation and support?

The Status of School/District-Related Factors

The framework suggests that what teachers do can be influenced by the climate of the school, the structure of the school/district program, the extent to which school leadership focuses staff energy on the improvement of student achievement, and the structures and procedures in place for helping teachers improve instruction. Section I of this report described the climate at Spring Garden and the priority given to the improvement of student achievement there. An earlier part of this chapter described the city's standardized curriculum and citywide tests.

This section will focus on the structures and procedures in place at Spring Garden that help teachers improve instruction. Specifically, this section will summarize what the eight teachers said about staff development, cooperative teacher planning, and supervision.

Staff Development

All eight teachers expressed satisfaction with the staff development opportunities available to them at Spring Garden. Teachers apparently had some leeway in choosing from district-sponsored and some school-sponsored inservice activities. Therefore, teachers had to some extent customized their own programs of staff development.

Of the district- and school-sponsored workshops, teachers mentioned specifically workshops on thinking, social studies, children's literature, book making, MacMillan reading, science, and children's behavior as helps in improving instruction. Some teachers had gone beyond this menu for experiences with PATHS, PRISM, AIMS, and writing. Some Spring Garden teachers have occasionally presented workshops for the rest of the faculty. As a whole, faculty members have provided much informal support for each other. One teacher particularly acknowledged the contributions of other Spring Garden teachers in helping her improve instruction.

Cooperative Teacher Planning

The teachers interviewed at Spring Garden described the resources they used for responding to individual students' needs and for planning instruction in general. When problems have arisen, teachers have talked with the principal, the counselor, reading and math specialists, or have brought children up in the Pupil Support Committee. Individual teachers have helped each other, too. For example, teachers who teach the same grade or who are scheduled for prep periods or lunch at the same hour have sometimes shared ideas or even exchanged individual students or whole classes. The Program Support Teacher has worked with Spring Garden's classroom assistants; more than one teacher indicated that her classroom assistants had been a considerable source of helpful ideas.

These kinds of cooperative planning tend to be informal and unscheduled -- a matter of catching whoever is available or catching up with someone in particular whenever possible. The principal has tended to support these encounters, but has limited means to release teachers from classrooms for this purpose. When coverage is needed, however, specialists have often provided it.

For the most part, the more general planning for instruction has taken place in similarly informal ways. Teachers have relied on time before and after school, at lunch, or during their prep periods to trade ideas and materials. One common prep period each week is scheduled so all teachers on a grade can meet, but only some grades have made regular use of that time. However, grade groups have consistently met in conjunction with prescribed planning activities for schoolwide projects. Schoolwide inservices and faculty meetings have sometimes afforded time for cooperative planning or sharing of ideas across grade levels.

Teacher Supervision

Teacher supervision at Spring Garden is almost exclusively the province of the principal. Teachers reported that the principal visits classrooms frequently ("He's always in the room, walking around and checking on students," someone said), reviews lesson plans and comments on them, observes teachers formally twice a year, and confers with them or writes a note afterwards. "He praises if he sees cause to and gives suggestions if needed," a teacher explained. "The principal encourages teachers," another stated. "He'll comment that he enjoyed watching a particular lesson or that he'd noticed that a particular kid didn't seem to be listening." For teachers who have needed help, the principal or the Program Support Teacher have usually responded, but in Spring Garden's typically informal way.

About once a month, the principal has passed on a story of how a Spring Garden teacher succeeded in reaching a child. "It brings joy to our hearts," a teacher recounted. It is part of the principal's overt strategy to supervise so that he can "catch people doing something good" and then make sure everyone knows about it and benefits from it.

Discussion questions: How can grade-level meetings be designed to support instructional improvement? Are individualized staff development strategies adequate? Are informal strategies for cooperative planning adequate? How can the flexibility of these arrangements be preserved while other, staffwide needs are addressed?

SECTION III

CURRENT INSTRUCTIONAL PRACTICE FROM THE PERSPECTIVE OF A DAY IN THE LIFE OF THREE SPRING GARDEN STUDENTS

The third task of the study was to describe the status of instructional practices from the perspective of individual students.

RBS staff shadowed three students for one school day on Friday, April 6, to gather these descriptive data. Spring Garden's principal organized the shadowing visit by requesting and selecting volunteer teachers, one each in first, second and third grade, whose classes RBS staff would visit. RBS staff members received the names of from four to six shadowing candidates from each teacher. In two of the three classrooms visited, RBS staff chose the students from the teachers' lists. Through a misunderstanding in the third classroom, the RBS staff member selected another student to shadow.

This section summarizes the results of the shadowing. It is organized in five parts. The first part presents the questions that guided the shadowing activity. It also describes the methods used to record and analyze observations. The remaining four parts summarize information collected regarding the structure of three students' day, the instructional tasks, the student's response to the instructional tasks, and student/teacher interactions.

Following each part, some discussion questions are suggested. In general terms, they ask:

- To what extent can the observations be generalized beyond the experiences of these three children on this one day?
- To what extent do the observations suggest areas for further study and/or possible action?

In reading about the students' instructional days, it is important to keep in mind that the experience represents only one day. Another day might have looked very different. For example, the shadowing visit to Spring Garden took place on a Friday, the last day before spring vacation. Some activities related to the day of the week (e.g., testing on Fridays), and some related to the upcoming vacation (e.g., transition and management time for handing out Easter baskets and other seasonal non-instructional tasks). The experiences of one child in each class also may not be representative of the rest of the class. The shadowed second grader, it turns out, was allowed to accompany her relative, an upper grade teacher, and her class on a two and a half hour outing.

Guiding Questions and Study Methods

Shadowing data are presented in this report as the answers to four guiding questions.

- What was the structure of each student's day? This question captures information about the flow of instructional activities and instructional settings that each student experienced. The descriptive account includes how much time was devoted to core subjects (i.e., reading/language arts, mathematics, social studies, science); what proportion of the day was spent on other subjects (e.g., art, music, library); how much time was spent in transition activities such as moving from class to class, changing from one subject to another, or starting up and finishing the day; what instructional formats each student experienced (e.g., presentation, recitation, or unguided seatwork); in what kinds of instructional groups each student participated (i.e., whole class, sub-group, individual); and how much time during the school day each student spent with various adults (e.g., regular teacher, resource teacher, or classroom assistant). Each element of this information is compared across the three shadowed students.

The three following questions reflect various conditions that are thought to influence student motivation and learning.

- On what instructional tasks did each student work? To what extent did those tasks introduce new content? To what extent did they require higher order thinking?
- How did students respond to the instructional tasks? With what degree of ease or difficulty did each student appear to work on the instructional tasks given during the day? To what extent did each student engage with each task?
- How did each student interact with adults during the day? What types of interactions occurred and in what grouping context?

The shadowing process was based upon a method developed by the Far West Laboratory for a study of Chapter 1 programs (Lee & Rowan, 1986).² The method as adapted for this study entailed shadowing each student from at least the first to the last bell of the day. At Spring Garden, RBS staff shadowed students from 8:55 a.m., just before opening exercises, to 2:45 p.m., dismissal. RBS staff followed their students to all their classes (including, for example, physical education and library) and during the transitions between classes. Although RBS staff ate with the shadowed child in only one instance, all RBS staff noted the transitional activities that surrounded students' lunchtime and recess.

²Lee, G. & Rowan, B. (1986). The management and delivery of instructional services to Chapter 1 students: Case studies of twelve schools. San Francisco, CA: Far West Laboratory for Educational Research and Development.

The process required shadowers to record two kinds of observations. One set of observations involved keeping track of a specific set of features of each lesson. These features included: the instructional focus of the lesson, the physical location of the lesson, variations in grouping, group size, type of instructor, the format of the instructional activity, and the time devoted to the lesson. These observations were used to describe the structure and the instructional context of the three students' day.

The other set of observations was focused field notes. In taking focused field notes, shadowers described the instructional tasks presented and the students' responses to those tasks, as well as any interactions that occurred between the students being shadowed and the teacher or any other adult. These descriptions were summarized and coded.

The summaries in this section identify students only by a letter. At Spring Garden, all shadowed students were girls: Student A, a first grader, Student B, a second grader, and Student C, a third grader.

Structure of the Three Students' Days

This part first provides an overview of each student's day and then compares the three students' day in terms of the time each student spent with the core subjects, other subjects, in transition, and at lunch and recess. A summary of each student's day in chart form appears in the appendix to this section.

Overview of Each Student's Day

Student A started her day by leading the pledge to the flag. After getting her homework checked, she and her class went to an assembly with the kindergartens and other first grades where they sang and danced in preparation for a presentation to their parents. Back in her classroom, Student A practiced spelling regular words and compound words and practiced solving math problems with the rest of the class and then took spelling and math tests based on that work. Student A spent the remainder of the morning making paper Easter baskets and writing an Easter card. After lunch and recess, Student A worked a little more on her Easter card. The next activity involved estimating and graphing jelly beans by color. The last 20 minutes of classroom time were spent collecting papers, passing out vacation homework, distributing and comparing Easter baskets, and preparing to leave for gym. Gym took up the final forty-five minutes of Student A's day prior to dismissal.

Student B and her class followed the morning announcements with a discussion of what a "good egg" is. The teacher then explained that she had prepared "good egg" certificates for every child in anticipation of giving each child one at the end of the day. The formal instructional day started with tests in spelling and math, with time between for folding answer papers and handing out "Holey Card" math tests. Student B worked steadily, sometimes counting on her fingers to calculate the addition and subtraction facts to 18 (as did many children), sometimes sucking her thumb (as did two or three others). She then filled in a worksheet about calendars as

individual seatwork until she joined the class in exchanging and correcting the math test. Student B dreamily listened to five minutes of a story before gym, and then accompanied her class to the gymnasium. Student B and her class spent some of gym time in fast-paced exercise routines to music or to the two-times table, and the rest of the time in listening and chasing games (Duck, duck, goose; Red rover; Simon says).

Returning to the classroom, Student B had just pulled her chair up into a reading/language arts sub-group to work with the teacher when she was summoned to join an upper grade class on their outing. The outing consisted of a ten-block walk to a local Pizza Hut, a meal, and return. Student B was clearly a favorite of some of the upper grade children and enjoyed her time with them. Student B rejoined her own class for singing Easter songs from songsheets and for a bunny hop around the classroom. Instead of computer time (because the computer teacher was ill), Student B participated in a social studies lesson on community. Independent work, or free time, a regular Friday afternoon feature, followed in which Student B did puzzles and played with plastic toys. Clean-up, receiving a "good egg" award, and preparation for going home consumed the rest of the school day for Student B.

Student C and her classmates began the day writing about how they intended to spend their upcoming vacation week. Student C next watched rehearsal of math problems on the board, took a math test on multiplication, and watched other students solve the test items and other math problems on the board and orally. During a mid-morning break, Student C showed the teacher her essay on her vacation plans. Student C then watched others play a listening game but did not get chosen to play. Student C spent the next hour in a sub-group with a classroom assistant first, making up sentences with certain words and later in a sustained period of silent reading; then reading aloud and responding to questions about the passages read. Student C received a star along with the other members of her sub-group. Student C joined other classmates breaking words into syllables on their own papers and aloud until lunchtime.

Student C read by herself following lunch. After hearing the teacher discuss a book report assignment, Student C and the other students spent most of the next half hour reading and discussing poetry. The class then connected the numbers and colored a worksheet, and spent 15 minutes handing out Easter baskets, cleaning up, and getting ready for going to the library. Student C and her class ended their day in the library where they heard and discussed a fable and then played a trivia game with the librarian.

Allocation of Time

Table 5 shows how time was allocated to the core subjects (reading/language arts, mathematics, social studies, and science), the other school subjects, transitions from one activity to another and from one classroom to another, and lunch/recess for Students A, B, and C.

Table 5
Distribution of Time

Student (total time shadowed)	Core Subjects (basic skills, social studies, science)	Other Subjects (physical education, art, music, library)	Transition (moving from class to class, changing content area, morning start up, finishing day)		Lunch/ recess
A (350 min.) ^a	(125) 36%	(125) 36%	(65) 19%	(35) 10%	
B (350 min.)	(77) 22%	(103) 29%	(37) 11%	(133) 38%	
C (350 min.)	(205) 59%	(60) 17%	(45) 13%	(40) 11%	

Note: Time is represented by minutes and percentage of the total time shadowed.

^aTotals add to 101 percent because of rounding.

Table 5 allows us to examine the proportion of the day that each student spent in the enumerated activities. Leaving aside Student B for the moment because of her extended lunchtime trip, Students A and C spent similar portions of their day in core and other subjects (72 and 76 percent, respectively), in transition (19 and 13 percent, respectively), and at lunch (10 and 11 percent, respectively). How they divided the time between core and other subjects, however, is very different: Student A spent equal amounts of time on both while Student C spent three times as long on core subjects as on other subjects. Had Student B spent a day more like the one her second grade classmates were scheduled for, she would have come between the two other students, spending somewhat less than twice as much time on core subjects as on other subjects. As it was, she spent approximately the same amount of time on core subjects as on other subjects.

Table 6
Distribution of Time Among the Core Subjects

Student (total time in core subjects)	Reading/Language Arts	Mathematics	Science	Social Studies
A (125 min.)	(63) ^a 50%	(62) ^a 50%	--	--
B (77 min.)	(12) 16%	(45) 58%	--	(20) 26%
C (205 min.)	(160) 78%	(45) 22%	--	--

Note: Time is represented by minutes and percentage of total time in core subjects.

^aIncludes five minutes of a ten-minute period devoted to reading/language arts and math.

Table 6 displays the time students spent on individual subjects within the core subject area. Again the students experienced different schedules. Student A spent the same amount of time on reading as on math, while Student C spent more than three times as long on reading as on math. In contrast, Student B actually spent more than three times as long on math as on reading, but -- had she experienced her class's scheduled day -- she would have spent about twice as much time in reading and language arts as in math.

Discussion questions: Does the allocation of time recorded reflect the daily allocation of time across the school year? If so, does it represent the relative importance of the various subjects? How does such a tally take account of the variety of learning activities? What other important questions might be asked about time allocations? Do the differences in how time was used suggest areas for further study or possible action?

Instructional Format

Shadows recorded the types of instructional formats that each student experienced during the core subject periods. The various formats are defined below.

- Presentation: The shadowed student listens to and watches teacher presentations, explanations, demonstrations, and/or reading of a story for an uninterrupted period of time.
- Recitation: Individually or as part of a group, the shadowed student responds to teacher questions and/or a teacher-presented exercise.
- Discussion: The shadowed student and classmates exchange information and ideas on a topic. They respond to each other without significant intervention or interpretation by the teacher.
- Guided Seatwork: The shadowed student practices skills or rehearses information, often using worksheets or workbooks, while being actively monitored by the teacher. The student may work on such exercises alone, with a partner, or as a member of a small group.
- Unguided Seatwork: The shadowed student does seatwork that is not actively monitored by the teacher.
- Surrogate: The shadowed student receives instruction through a surrogate (e.g., computer, listening center, VCR, or film projector).
- Testing: The shadowed student takes a test or completes an exercise that will be used to assess level of mastery or learning.
- Management: The shadowed student prepares for a next activity or performs management tasks (e.g., waits for papers and materials to be distributed, takes out a book and finds a certain page, assembles materials, moves to form a group, corrects papers for the teacher).

Table 7 shows how much time each student spent in various instructional formats during the core subject periods.

Table 7
Distribution of Time of Core Subjects By
Instructional Format

Student	Presentation	Recitation	Discussion	Guided Seatwork	Unguided Seatwork	Surrogate	Testing	Management
A (125 min.)	--	(45) 36%	--	(60) 48%	--	--	(20) 16%	--
B (77 min.)	(5) 6%	(20) 26%	--	--	(7) 11%	--	(30) 39%	(15) 19%
C (205 min.)	--	(115) 56%	--	(55) 27%	(10) 5%	--	(10) 5%	(15) 7%

Note: Time is represented by minutes and %age of total time in core subjects.

Each student's day again had a very different complexion as to instructional formats used during core subjects. Student A spent almost half of core subject time doing guided seatwork, whereas Student C spent just over half her time in recitation. For the portion of core subject instruction that Student B experienced, she spent the largest share, almost two-fifths, in testing.

All three students participated in recitation, ranging from over a quarter to over a half of available core subject time. All three also were tested but the amount of testing time varied widely, from a high of close to two-fifths to a low of only one-twentieth of available core subject time. Only one, Student B, heard a presentation when her teacher read briefly from a library book. None of the students had the opportunity to participate in discussion with their peers and none received instruction from educational media surrogates.

Instructional Grouping

The extent to which students experienced a variety of instructional groupings was also recorded by the shadowers.

- Whole group refers to a situation in which all students in a class are receiving the same instruction, are engaged in the same activity, or are following the same set of directions.
- Sub-group refers to a situation in which an adult is working with a shadowed student and others, but fewer than the whole class, such as a small reading group.
- Individual refers to a situation in which a student is being tutored or interacting instructionally as an individual with an adult.

Table 8 shows the proportion of time during the core subject periods that each student experienced these instructional groupings.

Table 8
Distribution of Time of Core Subjects By Instructional Grouping

Student	Whole Group	Sub-Group	Individual
A (125 min.)	(125) 100%	--	--
B (77 min.)	(77) 100%	--	--
C (205 min.)	(110) 54%	(90) 44%	(5) 2%

Note: Time is presented in minutes and percentage of total time in core subjects.

The table shows that Students A and B spent all the time allocated to core subjects as members of a whole group. In contrast, Student C experienced roughly equal amounts of whole group and sub-group time during core subjects. She also had a brief individual encounter with the teacher -- showing off her morning's essay -- which she herself had initiated. It should be noted that Student B would also have participated in a sub-group had it not been for her excursion.

Types of Instructors

Shadows recorded the extent to which each student worked with the regular classroom teacher, a resource teacher, a classroom assistant, a parent volunteer, or other adults during the day. Table 9 shows the proportion of core subject time that each student spent working with these various adults.

Table 9
Distribution of Time of Core Subjects by Instructor

Student	Teacher	Resource Teacher (Reading, Math, Science, Social Studies)	Classroom Assistant	Parent Volunteer Other	Teacher and Assistants
A (125 min.)	(110) 88%	--	--	--	(15) 12%
B (77 min.)	(77) 100%	--	--	--	--
C (205 min.)	(140) 68%	--	(65) 32%	--	--

Note: Time is presented in minutes and percentage of total time in core subjects.

The table shows that all students spent the bulk of time allocated to the core subjects with their regular classroom teachers. For Student B, the classroom teacher was the sole instructor in core subjects. Even if Student B had stayed for her reading sub-group, she still would have been working with the teacher, by all appearances. Students A and C both interacted with other instructors during some of their time in core subjects. Student C had the more sustained interaction with another adult, spending one-third of core subject time with a classroom assistant, while Student A spent one-eighth of her core subject time with the classroom teacher and classroom assistants working jointly. Only one of the three shadowed students spent any core subject time working exclusively with a classroom assistant or with parent volunteers.

Discussion questions: What are the dominant instructional formats used throughout the year? Is there a desirable balance among instructional formats? If so, how might this balance be encouraged?

To what extent is whole-group grouping typical of grouping students for instruction at Spring Garden? Should other ways of grouping students be considered? If so, how might they be fostered?

Instructional Tasks During the Core Subjects

This part describes the instructional tasks on which the shadowed students worked during their core subject periods. The tasks are described from two perspectives: the extent to which they introduced new content and the extent to which they asked students to use higher order thinking. Table 10 displays this information.

Tasks Introducing New Content

Table 10 lists the instructional tasks on which each student worked that day. Tasks that represented opportunities for students to learn new content are marked "X" in the "new content" column. Tasks not marked in that column asked students to review or practice using content introduced previously.

The tasks that introduced new content varied from 17 to 33 percent of all tasks that students worked on during their core subjects periods. However, it should be remembered that tasks are described here without reference to the amount of time each took. For example, Student A met new content in only two of seven tasks, but both were sustained over time: talking about the appropriate parts and message of an Easter card and making the card lasted for about 25 minutes in the morning; estimating, counting, and graphing jelly beans spread over 50 minutes in the afternoon.

Tasks Requiring Higher Order Thinking Processes

The next column on Table 10 is marked if the instructional task involved students in higher order thinking. The three shadowed students experienced roughly similar proportions of tasks (from 27 to 33 percent) in which they were asked to do higher order thinking. Examples of higher order thinking tasks are described below.

Table 10

Characteristics of Instructional Tasks Experienced By Each Student

	New Content	Higher Order Thinking	Clarity of Task		Engagement		
			Clear	Not Clear	H	M	L
<u>Student A</u>							
1. Has teacher check spelling and math homework.	X		X				X
2. Review spelling words for spelling test.			X				X
3. Review math problems for math test.			X				X
4. Take spelling and math test.			X				X
5. Discuss contents of Easter card and make card.	X	X	X				X
6. Has classroom assistant check Easter card.			X				X
7. Estimate, count, and graph jelly beans.	X	X	X				X
	(2 of 7)	(2 of 7)	(7 of 7)				(5-H, 2-M, 0-L)
<u>Student B</u>							
1. Take spelling test.			X				X
2. Take math test (92 addition and subtraction facts to 18).			X				X
3. Completes calendar worksheet using calendar.		X	X				X
4. Correct other student's math test.			X				X
5. Listen to teacher read part of a story.	X		X				X
6. Review and discuss "community."		X	X				X
	(1 of 6)	(2 of 6)	(6 of 6)				(5-H, 1-M, 0-L)

H, M, L = High, mixed, and low engagement

Table 10 (cont'd)

	New Content	Higher Order Thinking	Clarity of Task		Engagement		
			Clear	Not Clear	H	M	L
<u>Student C</u>							
1. Write essay about plans for spring break.		X	X		X		
2. Review math problems on multiplication.			X				X
3. Take quiz (12 problems: multiplication of whole numbers).			X		X		
4. Review math quiz solutions.			X		X		
5. Review problems on fractions and decimals.			X		X		
6. Show teacher essay about plans for spring break.			X		X		
7. Play listening game.			X		X		
8. Make sentences using new words on a flip chart.	X		X		X		
9. Read silently from skills book.	X		X		X		
10. Read aloud from skills book and answer questions.		X	X		X		
11. Identify syllables in words on worksheet.	X		X		X		
12. Review answers to worksheet.			X		X		
13. Read silently and independently.	X		X				X
14. Review parts of book report for assignment.			X		X		
15. Read literature selections and discuss.	X	X	X		X		X
	(5 of 15)	(4 of 15)	(15 of 15)		(13-H, 2-M, 0-L)		



- Student A estimated and later counted to verify her estimate of the number of jelly beans she was given. The fact that both her estimate and her counts were unstable and inaccurate is beside the point.
- Student B participated in a discussion of community members, their origins, languages, and the ways in which they are alike. This discussion required inference, comparison, synthesis, and drawing conclusions.
- Student C wrote an essay about her plans for the upcoming spring vacation that had her think about planning, organize her thoughts, and write creatively.

Discussion questions: To what extent each day do all students experience an assortment of tasks that involves new content and the review and application of prior content? To what extent should they?

To what extent do all students experience tasks that ask them to use higher order thinking? What is a desirable balance between lower and higher order thinking?

Student Response to Tasks

This part describes the shadowed students' responses to the instructional tasks during their core subject periods. Responses are viewed in two ways: the extent to which the student seemed to understand each task and the extent to which the student engaged in each task.

Clarity of Task

The column on Table 10, headed "Clarity of Task," notes the extent to which students appeared to understand each instructional task. Tasks marked as "clear" were those tasks that students appeared to understand (e.g., asked no questions about how to do them and undertook what appeared to be appropriate task-related behaviors). "Unclear" tasks were those on which the students asked fellow students or teachers for help to do the task or repeatedly asked others to check their work. An asterisk was used if students gave up on a task, expressing in words or behavior that they simply could not do it.

Table 10 shows that Spring Garden's shadowed students appeared to find all instructional tasks clear. Readers should keep in mind that this study interprets these behaviors as students' perceptions about the clarity (and appropriateness) of instructional tasks. They may or may not relate to how well students actually understood or executed instructional tasks. Indeed, shadowers in all sites reported instances in which students tackled tasks as if they understood the directions and could perform the work, but later evidence revealed that this was not so. For example, Student B, easily filled out a worksheet on the calendar until the teacher indicated she was having trouble.

Task Engagement of Students

The righthand column of Table 10 indicates the degree to which each task engaged the shadowed students.

- A task was coded "H" for high engagement if a student attended to a task and appeared to follow the directions for completing it. Depending on the task, examples of engaged behaviors might be reading, writing, listening, watching, or drawing; raising a hand in response to a question; answering a question; participating in a choral response.
- A task was coded "M" when a student exhibited a mixture of engaged and off-task behaviors.
- A task was coded "L" for low engagement if a student did not attend to the task at hand and exhibited such off-task behaviors as just sitting, socializing, acting out, or being disciplined.

All three shadowed students appeared highly engaged on the vast majority of their instructional tasks. Each student slipped into a mixture of highly engaged and less engaged behaviors only on one or two of the day's tasks. It should be noted that the degree of off-task behavior was quite moderate relative to the rest of their behavior. For example, Student A's engagement was coded as mixed when she temporarily lapsed into neutrality from her more typically eager application to all tasks. Student B began fidgeting slightly during a social studies lesson that she otherwise attended to faithfully. And Student C's behavior was coded as mixed in one instance because she interrupted her own independent reading to get an adult's attention (but did not succeed). Given the temperateness of their off-task behavior, Spring Garden's shadowed students can be said to have been highly and sustainedly engaged in their instructional tasks during their core subject periods.

Discussion questions: To what extent are these students' responses to instructional tasks typical? How might these questions be studied further? What possible action could be proposed?

Student/Teacher Interactions During the Core Subjects

This part describes the personal interactions that occurred between the individual students and the adults with whom they worked during core subject periods. It describes the types of interactions that occurred, the affect of those interactions, and the group context in which they occurred.

Types of Student/Teacher Interactions

Table 11 lists the individual or personal interactions that shadowed students had with their teachers during the core subject periods. The first two lefthand columns indicate the subject of the interactions: those related to the content of the instructional tasks are marked under "content" and those related to behavior are listed under "behavior." Interactions under the content heading include situations when the teacher directed a

Table 11
Individual Student/Teacher Interaction During Core Subjects

	Related to		Affect		
	Content	Behavior	Positive	Neutral	Corrective
<u>Student A</u>					Small Group
1. Homework checked by teacher: all spelling correct, but not math; told that teacher will have to explain to her parents how to help her learn this.	X			X	
2. Praised for spelling word correctly without looking.	X		X		
3. Praised for spelling compound word ("boyfriend") correctly.	X		X		
4. Praised for pushing her chair in.		X	X		
5. Defined word ("greenhouse") correctly.	X			X	
6. Shoulder looked over by teacher during test.	X			X	
7. Asked teacher what a word was during test; told it was a familiar number word.	X			X	
8. Contributes answer about Easter card greeting ("Dear Mother"); greeting written on board.	X			X	
9. Asked if she has written her Easter card yet.	X			X	
10. Volunteered to teacher that she earned a "gold slip" during lunch; asked cause.		X	X		
11. Easter card checked by classroom assistant.	X			X	
12. Answered two questions incorrectly about number of jelly beans.	X			X	
13. Graph checked by teacher; told she may color in heading.	X		X		
14. Asked to finish up.		X		X	
TOTALS	11/14 (79%)	3/14 (21%)	5/14 (36%)	9/14 (64%)	0 (0%)
<u>Student B</u>					
1. Shoulder looked over by teacher while doing calendar worksheet; asked if she was finished; told she was having trouble; asked to put worksheet away.	X			X	
2. Told (as part of a group) to close social studies books.		X			
3. Answered question about languages in community ("African?"); told that teacher not sure.	X			X	
TOTALS	2/3 (67%)	1/3 (33%)	0 (0%)	2/3 (67%)	1/3 (33%)

Table 11 (Cont'd)

	Related to		Affect		Small Group
	Content	Behavior	Positive	Neutral Corrective	
<u>Student C</u>					
1. Asked teacher if students will check math quiz; told yes.	X			X	
2. Showed teacher essay on upcoming vacation plans; teacher listened and nodded.	X		X		
3. Praised for making sentences out of two new words.	X		X		X
4. Praised for making sentence out of another new word.	X		X		X
5. Announced that she had finished assignment; told to read next assignment.	X			X	X
6. Praised for answering question on reading assignment.	X		X		X
7. Praised for answering another question on reading assignment.	X		X		X
8. Received a star (along with all sub-group members).	X		X		X
9. Announced that she had finished syllabification exercise; error pointed out by teacher.	X			X	X
TOTALS					
	9/9 (100%)	0 (0%)	6/9 (67%)	3/9 (33%)	7/9 (78%)



subject-related question to a student or provided interpersonal feedback on a student's oral or written answer. Behavior interactions include positive reinforcement of the student for appropriate behavior, such as sitting nicely, or corrective feedback on inappropriate behavior.

Table 11 shows that during instruction on the core subjects, Spring Garden's three shadowed students interacted at different rates with adults. Student A had 14 interpersonal encounters, Student C had nine, and Student B, who missed about 90 minutes of classroom time, had three interpersonal encounters. The preponderance of these interactions related to the content of the core subject: interactions were content-related two-thirds of the time for Student B, almost four-fifths of the time for Student A, and all the time for Student C. In other words, instruction was the primary vehicle for contact between these students and their teachers at Spring Garden.

Affect of Interactions

Table 11 also shows the affect of each interaction as positive, neutral, or corrective. The most striking fact for the shadowed students was the virtual absence of corrective or punitive interactions. In only one interaction -- when the teacher saw that Student B was still working on the calendar worksheet, commented on the difficulty Student B was evidently having with it, and asked her to put it away -- was there even the hint of reprimand. (And even then, there really wasn't.) It was not that teachers overlooked students' mistakes: Student B answered two questions about the number of her pink and green jelly beans and each time the teacher said no; and Student C's teacher pointed out an error in her work on the syllable worksheet which Student C then corrected. Rather, the tone and texture of these interactions were neutral or matter-of-fact, but not punitive.

If interactions were not corrective at Spring Garden, what were they? Students A and C experienced either positive or neutral interactions with adults during their core subjects, although in differing proportions. Student B's few interactions were neutral or mildly corrective. On the whole, it appears that Spring Garden's shadowed students encountered adults in positive or neutral ways during their core subjects.

Group Context

The righthand column of Table 11 notes if the interactions occurred in the context of a sub-group. Only Student C experienced a sub-group during the core subject period. For her, who had the median number of individual interactions that day, fully seven of nine individual encounters occurred while she was in sub-groups. Six of the seven these interactions came as she and eight others worked with the classroom assistant; one came as she and 17 others worked with the regular teacher while the remaining students had their turn with the classroom assistant. In contrast, Student A, who had the greatest number of interactions, spent no time at all in sub-groups during her core subject periods.

Discussion questions: To what extent do teachers and individual students interact over the course of a school day? To what extent should they? What is a desirable balance among positive, neutral, and corrective interactions? What can teachers do to achieve that balance?

SECTION IV

SOME CONCLUDING THOUGHTS

The first three sections of this report have presented highlights of what RBS staff saw and heard during visits to Spring Garden Elementary School and talks with staff between January and June of 1990. In this section, we reflect briefly on the information provided in preceding sections.

Section I suggests the nature and scope of changes that Spring Garden's staff have made through the life of the schoolwide project. Those changes have affected school organization; staff roles and relationships; the monitoring and assessment of student progress; the planning and problem-solving processes evident at school, grade, classroom, and individual student levels; instructional materials and strategies; responses to student behavior; and parent involvement. Although it is difficult to pinpoint the actual start of the schoolwide project at Spring Garden, it is clear that the project has galvanized staff energy around its goals. We see the challenges for Spring Garden in the coming year to be: finding a comfortable balance between informal and formal improvement strategies, devising systematic ways to disseminate good ideas and practices among staff members, and maintaining the project's momentum while making the transition to a new principal.

Section II provides a snapshot of instructional practice at Spring Garden. It suggests that the teachers whose classrooms we visited:

- develop instructional plans that respond both to the requirements of the district's curriculum and to their students' learning needs
- manage their classes efficiently, so that most of their time is devoted to instruction and most of their students' time is spent on task
- motivate their students to learn
- design and present lessons that ensure a moderately high level of daily success for most students
- help students having difficulty to attain mastery of specific knowledge and skills
- involve parents in support of the learning outcomes they seek for their students.

From RBS' perspective, Spring Garden's challenge will be extending the richness of these veteran teachers' knowledge and skill to each other and throughout the school. The staff at Spring Garden have much to teach each other. They can share new approaches -- how to exploit the interdisciplinary potential of various subjects, for example -- and they can help each

other reflect on their own approaches and practices. Enhanced opportunities for staff to learn from each other can probably be built into planning and staff development arrangements that are already in place at the school.

Section III describes the variety of individual students' experiences on a given day. Specifically, the shadowed students at Spring Garden tend to:

- be involved in a mixture of subjects, instructional formats, and tasks
- be highly engaged by those instructional tasks
- have some opportunities to work on higher order thinking
- spend most of their time in instructional activities rather than in transition
- experience a preponderance of positive or neutral interactions with the adults they encounter in school.

This analysis challenges Spring Garden staff themselves to examine the school experience of individual students. Such an examination would give staff a novel perspective from which to view schooling practices. The insights they would gain thereby might add significant and otherwise unavailable data to Spring Garden's school improvement process.

APPENDIX

Students' Daily Schedule
April 6, 1990

Student A -- GRADE 1
Daily Schedule
April 6, 1990

Start Time	Elapsed Time	Lesson ¹	Location ²	Grouping ³	Size	Instructor ⁴	Format ⁵
8:55 a.m.	10 min.	Reading/LA + Math	Classroom	Whole Class	16	Teacher	Seatwork
9:05 a.m.	10 min.	Transition	Hallway	Whole Class	17	Teacher	Management
9:15 a.m.	35 min.	Other	Auditorium	Other	100	Resource Teacher	Other (Assembly)
9:50 a.m.	20 min.	Transition	Classroom	Whole Class	19	Teacher	Management
10:10 a.m.	5 min.	Reading/LA	Classroom	Whole Class	19	Teacher	Recitation
10:15 a.m.	2 min.	Math	Classroom	Whole Class	19	Teacher	Recitation
10:17 a.m.	3 min.	Reading/LA	Classroom	Whole Class	19	Teacher	Recitation
10:20 a.m.	15 min.	Reading/LA	Classroom	Whole Class	19	Teacher	Recitation
10:35 a.m.	5 min.	Math	Classroom	Whole Class	19	Teacher	Testing
10:40 a.m.	5 min.	Transition	Classroom	Whole Class	19	Teacher	Testing
10:45 a.m.	50 min.	Other	Classroom	Whole Class	19	Teacher	Management
11:35 a.m.	5 min.	Reading/LA	Classroom	Whole Class	19	Teacher	Seatwork
11:40 a.m.	15 min.	Reading/LA	Classroom	Whole Class	19	Teacher	Recitation
11:55 a.m.	5 min.	Transition	Classroom	Whole Class	19	Teacher	Seatwork
12:00 p.m.	35 min.	Other (Lunch)	Other	Other	??	Other	Management
12:35 p.m.	15 min.	Reading/LA	Classroom	Whole Class	19	Teacher + Asst.	Other (Lunch)
12:50 p.m.	30 min.	Math	Classroom	Whole Class	19	Teacher	Seatwork
1:20 p.m.	20 min.	Math	Classroom	Whole Class	19	Teacher	Recitation
1:40 p.m.	20 min.	Transition	Classroom	Whole Class	19	Teacher	Seatwork
2:00 p.m.	40 min.	Other (Gym)	Other (Gymnasium)	Whole Class	19	Teacher + Asst.	Management
2:40 p.m.	5 min.	Transition	Classroom	Whole Class	19	Resource Teacher	Other (Exercise)

Total Minutes: 350 min.
Total entries per column: 21

¹ Lessons/Minutes:	² Location/Minutes:	³ Groupings/Minutes:	⁴ Instructor/Minutes	⁵ Formats/Minutes
Transition (65 min.)	Classroom (230 min.)	Whole Class (280 min.)	Teacher (205 min.)	Seatwork (110 min.)
Reading/LA (58 min.)	Auditorium (35 min.)	Other (70 min.)	Resource Tchrs. (75 min.)	Management (65 min.)
Math (57 min.)	Hallway (10 min.)		Teacher + Asst. (35 min.)	Recitation (45 min.)
Rdg./LA + Math (10 min.)	Other (75 min.)		Other (35 min.)	Testing (20 min.)
Other (160 min.)				Other (110 min.)

Student B -- Grade 2
Daily Schedule
April 6, 1990

Start Time	Elapsed Time	Lesson ¹	Location ²	Grouping ³	Size	Instructor ⁴	Format ⁵
8:55 a.m.	7 min.	Transition	Classroom	Whole Class	20	Teacher	Management
9:02 a.m.	4 min.	Other (Awards)	Classroom	Whole Class	20	Teacher	Recitation
9:06 a.m.	7 min.	Transition	Classroom	Whole Class	22	Teacher	Management
9:13 a.m.	7 min.	Reading/LA	Classroom	Whole Class	22	Teacher	Testing
9:20 a.m.	5 min.	Transition	Classroom	Whole Class	22	Teacher	Management
9:25 a.m.	23 min.	Math	Classroom	Whole Class	22	Teacher	Testing
9:48 a.m.	7 min.	Math	Classroom	Whole Class	22	Teacher	Unguided seatwork
9:55 a.m.	15 min.	Math	Classroom	Whole Class	19	Teacher	Management
10:10 a.m.	5 min.	Reading/LA	Classroom	Whole Class	21	Teacher	Presentation
10:15 a.m.	3 min.	Transition	Hallway	Whole Class	21	Teacher	Management
10:18 a.m.	47 min.	Other (Gym)	Other (Gymnasium)	Whole Class	21	Resource Teacher	Other (Exercise)
11:05 a.m.	2 min.	Transition	Classroom	Subgroup	15	Teacher	Management
11:07 a.m.	133 min.	Other (Field trip)	Other (restaurant)	Other (5th Grade)	20	Other (Tchr. + Asst.)	Other (Lunch)
1:20 p.m.	5 min.	Other (Music)	Classroom	Whole Class	22	Teacher	Other (Singing)
1:25 p.m.	5 min.	Transition	Classroom	Whole Class	22	Teacher	Management
1:30 p.m.	5 min.	Other (Music)	Classroom	Whole Class	22	Teacher	Other (Dancing)
1:35 p.m.	20 min.	Social Studies	Classroom	Whole Class	22	Teacher	Recitation
1:55 p.m.	42 min.	Other (Indep. work)	Classroom	Whole Class	20	Teacher	Unguided seatwork
2:37 p.m.	8 min.	Transition	Classroom	Whole Class	20	Teacher + Asst.	Management

Total minutes: 350 min.

Total entries per column: 19

¹ Lessons/Minutes:	² Locations/Minutes:	³ Grouping/Minutes:	⁴ Instructor/Minutes:	⁵ Formats/Minutes:
Math (45 min.)	Classroom (167 min.)	Whole Class (215 min.)	Teacher (162 min.)	Management (52 min.)
Transition (37 min.)	Hallway (3 min.)	Sub Group (2 min.)	Resource Teacher (47 min.)	Unguided seatwork (49 min.)
Social Studies (20 min.)	Other (180 min.)	Other (133 min.)	Teacher + Asst. (8 min.)	Testing (30 min.)
Reading/LA (12 min.)			Other (133 min.)	Recitation (24 min.)
Other (236 min.)				Presentation (5 min.)
				Other (190 min.)

Student C -- Grade 3
Daily Schedule
April 6, 1990

Start Time	Elapsed Time	Lesson ¹	Location ²	Grouping ³	Size	Instructor ⁴	Format ⁵
8:55 a.m.	5 min.	Reading/LA	Classroom	Whole Class	22	Teacher	Management
9:00 a.m.	10 min.	Reading/LA	Classroom	Whole Class	22	Teacher	Seatwork
9:10 a.m.	5 min.	Math	Classroom	Whole Class	23	Teacher	Recitation
9:15 a.m.	5 min.	Math	Classroom	Whole Class	24	Teacher	Management
9:20 a.m.	10 min.	Math	Classroom	Whole Class	24	Teacher	Testing
9:30 a.m.	25 min.	Math	Classroom	Whole Class	24	Teacher	Recitation
9:55 a.m.	10 min.	Transition	Classroom	Whole Class	24	Teacher	Management
10:05 a.m.	5 min.	Reading/LA	Classroom	Individual	1	Teacher	Seatwork
10:10 a.m.	10 min.	Reading/LA	Classroom	Whole Class	24	Teacher	Recitation
10:20 a.m.	15 min.	Reading/LA	Classroom	Sub Group	9	Classroom Assistant	Recitation
10:35 a.m.	25 min.	Reading/LA	Classroom	Sub Group	9	Classroom Assistant	Seatwork
11:00 a.m.	20 min.	Reading/LA	Classroom	Sub Group	9	Classroom Assistant	Recitation
11:20 a.m.	5 min.	Reading/LA	Classroom	Sub Group	9	Classroom Assistant	Management
11:25 a.m.	5 min.	Reading/LA	Classroom	Sub Group	18	Teacher	Recitation
11:30 a.m.	15 min.	Reading/LA	Classroom	Sub Group	18	Teacher	Seatwork
11:45 a.m.	5 min.	Reading/LA	Classroom	Sub Group	18	Teacher	Recitation
11:50 a.m.	10 min.	Transition	Classroom	Whole Class	24	Teacher	Management
12:00 p.m.	40 min.	Other (Lunch)	Other	Whole Class	24	Other	Other (Lunch)
12:40 p.m.	10 min.	Reading/LA	Classroom	Whole Class	24	Teacher	Unguided seatwork
12:50 p.m.	30 min.	Reading/LA	Classroom	Whole Class	24	Teacher	Recitation
1:20 p.m.	25 min.	Other (game)	Classroom	Whole Class	24	Teacher	Seatwork
1:45 p.m.	20 min.	Transition	Classroom	Whole Class	24	Teacher	Management
2:05 p.m.	35 min.	Other	Other (Library)	Whole Class	24	Resource Teacher	Recitation
2:40 p.m.	5 min.	Transition	Other (Library)	Whole Class	24	Resource Teacher	Management

Total minutes: 350 min.

Total entries per column: 24

¹ Lessons/Minutes:

Reading/LA (160 min.)
Math (45 min.)
Transition (45 min.)
Other (100 min.)

² Locations/Minutes:

Classroom (270 min.)
Other (80 min.)

³ Grouping/Minutes:

Whole Class (255 min.)
Sub Group (90 min.)
Individual (5 min.)

⁴ Instructor/Minutes:

Teacher (205 min.)
Classroom Asst. (65 min.)
Resource Teacher (40 min.)
Other (40 min.)

⁵ Formats/Minutes:

Recitation (150 min.)
Seatwork (80 min.)
Management (60 min.)
Testing (10 min.)
Unguided seatwork (10 min.)
Other (40 min.)