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School-sponsored Service Programs and the Educational Development of High School Students

Andrew Furco

University of California - Berkeley

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**School-sponsored Service Programs
and the
Educational Development of High School Students**

by

Andrew Furco

B.A. (University of California, Los Angeles) 1984
M.A. (University of California, Los Angeles) 1986

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Committee in Charge:

**Professor K. Patricia Cross, Chair
Professor Paul Ammon
Professor Richard Barth
Adjunct Associate Professor Bart Grossman**

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NSLC
c/o ETR Associates
4 Carbonero Way
Scotts Valley, CA 95066

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Educational Development of High School Students

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by

Andrew Furco

The dissertation of Andrew Furco is approved:

K. Patricia Cross May 14, 1997
Chair Date

Paul Amman May 14, 1997
Date

R. P. Barth May 15, 1997
Date

B. J. ... May 15, 1997
Date

University of California, Berkeley

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CHAPTER ONE

SERVICE PROGRAMS IN K-12 SCHOOLS

Everyone can be great because anyone can serve.
Martin Luther King, Jr., 1968

Background

Currently, a growing number of our nation's school districts are encouraging students to perform community service. Vermont, Minnesota, and Pennsylvania, for example, all include community service activities as part of their K-12 education plans. Maryland requires all high school students to complete 60 hours of community service prior to graduation. And as part of California's Challenge Initiative, it is expected that by the Year 2004, every student in California will engage in at least one community service or service-learning experience prior to graduation (1996, California Department of Education).

As a state-wide effort to improve the education of K-12 students, the Challenge Initiative will phase in a community service requirement by asking school districts to become Challenge districts. By becoming a Challenge district, a school district agrees to meet certain educational standards and subscribe to certain educational priorities set by the State Department of Education in exchange for several waivers of the California Education Code. One standard is

that districts must, at each grade span (K-5, 6-8, 9-12), offer every student at least one opportunity to engage in community service. The goal is to have fifty percent of the state's districts become Challenge districts by the Year 2000, and all school districts to become Challenge districts by the Year 2004.

While some educators and policy makers see the rise of service programs in K-12 schools as a positive step toward more fully engaging students in useful and exciting learning experiences, others remain unconvinced that students should be spending precious school time performing community service. Service proponents claim that linking community service with the academic curriculum provides students with an important personal and practical education that is usually not available within the traditional classroom curriculum (Boyer 1990; Kendall & Associates, 1990; Mainzer, Baltzley, and Heslin, 1990; Wood, 1990). Other proponents suggest that engaging students in community service activities can help improve students' self-esteem, motivation towards school, citizenship, as well as their leadership, communication and social skills (Berman, 1990; Fowler, 1990). Although a great deal of anecdotal data exists which indicates that service programs generally have positive outcomes for students, few findings from methodologically sound research studies are available. Most of the documented findings from existing research have been based on studies that were quite limited in scope and, consequently, are not readily generalizable beyond the specific programs that were studied.

According to Robert Shumer (1994), a leading service program researcher, the methodological limitations of most studies of K-12 service programs have resulted in findings that are tenuous, idiosyncratic, and subject to numerous possible interpretations. He suggests that this is because the majority of previous studies of service programs have not utilized longitudinal, experimental research designs. Indeed, most studies of school-sponsored service programs have relied

on quasi-experimental designs which have not been able to establish cause and effect relationships between the service program and its educational impacts on students (Shumer, 1994). There is only one known study, a study of college students in a service-learning program, in which students were randomly assigned into experimental (service-learning) and control (no service-learning) groups. According to Shumer (1987), there has been a routine violation of the underlying assumptions of experimental research among service program researchers.

Debra Hecht (1997) points out that the employment of scientific methodologies is not easy in service program research. She writes, "Studying an education program such as service learning is difficult, especially when one tries to apply traditional methodologies" (p. 1). Hecht believes that this is due primarily to the "fluid" nature of service programs. Because service programs are idiosyncratic, change continually, and are often difficult to define precisely, "data collected about a program today, may not be accurate in two months" (Hecht, 1997, p. 11). The service field needs more comprehensive research approaches that can better explore the impact of service activities on the educational development of students (Hecht, 1997, Shumer, 1994, Kendall & Associates, 1990).

The fact that only a few empirical research studies have been conducted on service programs may initially appear surprising given that the pedagogy, philosophies, and principles that undergird service programs are rooted in the well-known, longstanding learning and cognitive theories of John Dewey, Jean Piaget, James Bruner, Lawrence Kohlberg, and others. However, upon closer inspection, one can easily see why studying the effects of service program on K-12 students is a complex undertaking.

Most of the constructs that form the basis for K-12 service programs — enhancing self-esteem, building career awareness, developing civic responsibility, providing opportunities for social development, promoting good values and ethics, increasing motivation for learning, for example — are difficult to measure (Gray, 1996). Secondly, studying high school students (as opposed to older students) is difficult. Students' behaviors and responses must be analyzed carefully since younger students may be more fearful of the process or may not be able to properly assess or clearly express their feelings, attitudes, and opinions about particular issues. And, due to human subjects protocol restrictions, permission from each student and each student's parent must be obtained. In many cases, as was the case in this study, a researcher who is not officially affiliated with the school site is given limited time with and access to the students (Shumer, 1994). This often places limitations on a study which may prevent a researcher from exploring critical issues fully. Perhaps these are some reasons why most of the service program research studies have been performed on students in higher education.

Another reason for the scant research on this topic is that it is difficult to find instruments that can definitively measure the full range of service program outcomes. In many cases, service program researchers have had to develop their own set of instruments as a means to adequately capture the wide range of program outcomes (Shumer, 1994). Finally, because service programs are inherently idiosyncratic — each program is defined by the interrelationship among its particular participants, community, and service activities — it is often inappropriate to generalize study findings from one program to another program. However, as service programs become a more integral part of K-12 schooling, it is inevitable that there will be a growing call for research that can justify the inclusion of these programs in students' formal education.

K-12 Service Program Opponents

While one can assume that most persons agree with Dr. Martin Luther King, Jr.'s statement, "Everyone can be great because anyone can serve," not everyone agrees that schools should play a role in engaging students in service. For some people, providing "service" is connoted with religious activities that promote altruism and target students' moral development, two topics that often stir up debates over the separation of church and state (Delve & Mintz, 1990). Others, however, oppose service programs for more pragmatic reasons. Teachers have suggested that community service programs add needless paperwork to an already over-burdened system (Conrad, 1990; Harrison, 1987). School administrators have viewed service programs as being legally fraught and politically charged.

Some believe that although performing service is a good thing, it should not be a required component of schooling. In a number of cities and in Maryland where community service is required for high school graduation, education policy makers who oppose required service maintain the belief that community service programs are exploitive; service programs not only force students to perform duties that distract them from their academic studies, but such programs only benefit the special interest groups that support and sponsor the programs (Conrad, 1990). And parents have compared children in such programs to prisoners who are sentenced to fulfill community service requirements (Council of Chief State School Officers, 1989). Supporting this skepticism, various regulations concerning academic requirements, student employment, transportation liability, and student health and safety have stymied efforts, in many states, to institute required and non-required service programs in K-12 schools (Cunningham, 1989).

Why Service?

Given both this vocal opposition and a lack of definitive research findings, why is there a current proliferation of service programs in K-12 schools? One reason is that over the last two decades, there has been a growing belief among education experts that schools must do more than focus primarily on academic learning and intellectual development. After the Nation at Risk (1983) report unveiled the abysmal state of our nation's K-12 education system, many education experts highlighted the need for K-12 schools to better prepare every student for a future life as an active citizen and worker (Gardner, 1984; Goodlad; 1984, Boyer, 1983). John Gardner (1984) wrote, "Let us build an educational system that serves each in terms of his or her talents, stretching each, challenging each, demanding of all the best that is in them" (Gardner, 1984, p.94). Ernest Boyer (1983) believe the same, suggesting that to truly challenge every child to his/her full capacity, students must be more actively engaged in the learning process. According to Boyer, schools need to: link the curriculum to a changing national and global context; recognize that all students must be prepared for a lifetime of both work and further education; improve instruction and give students more opportunities for service in anticipation of their growing civic and social responsibilities as they become adults; and smooth the transition from school to adult life by making available to students new learning places both on and off the campus (Boyer, 1983, p.7).

One consequence of this paradigm shift has been what K. Patricia Cross calls "The coming of age of experiential education" (Cross, 1994). While experiential education has been around for most of the century, it appears to be gaining more legitimacy in today's K-12 schools. Cross (1994) suggests that this coming of age is due to three sets of pressures on today's educational system: the

urgent needs of society for well-educated workers and citizens who can apply their knowledge to real-world problems; cognitive psychology developments that reveal the importance of active and constructivist learning; and the current focus on improving teaching and learning through ongoing formative, classroom assessment. This coming of age of experiential education is evident in a number of recent popular K-12 education reforms (e.g., project-based learning, school-to-work, cooperative learning). Many of its pedagogical trademarks — active learning, discovery learning, contextual learning, individualized learning — have all become part of the lexicon of today's K-12 teachers. In addition, the recent passage of both the National and Community Service Trust Act of 1993 and the School-to-Work Opportunities Act of 1994 is further evidence of renewed interest in experiential education.

According to Jane Kendall, the resurgence of experiential education has brought with it a rise in service programs. Kendall believes there are two reasons for this:

First, the methods of experiential education are the same as those needed for the effective combination of service and learning. These methods were better refined and articulated in the 1980's, thus offering a deeper body of knowledge—and greater potential for success—to the current community service advocates than was available to their counterparts in the 1960's and 1970's. Second, a number of educational institutions now have more experience in dealing with the institutional issues that off-campus education raises. This growing sophistication increases the likelihood that more colleges and schools will be able to institutionalize service [sic] as an integral part of their missions because they now have more administrative and curricular models for supporting the use of experience-based learning than they had in the 1970's.

(Kendall & Associates, 1990, p.14).

Other education experts suggest that the rise in service programs goes beyond pedagogical reasons related to experiential education. Gardner (1992)

suggests that the increased attention being paid to community service activities is due to a reaction to the breakdown of community. He writes, "Today we see the weakening and collapse of communities of obligations and commitment, and of coherent belief systems. We see a loss of a sense of identity and belonging, of opportunities for allegiance, for being needed and responding to need — and a corresponding rise in feelings of alienation, impotence and anomie" (Gardner, 1992, p.7). As a result, individuals lose the conviction that they can make a difference in the world. The ultimate consequence is a "diminution of individual responsibility and commitment." (Gardner, 1992, p. 8). Gardner (1992) suggests that through volunteer community service experiences, young people will learn how the adult world works, and will ultimately seek to build and maintain their communities.

Another reason for the rise in K-12 service programs is that colleges and universities are looking more favorably upon applicants who have experiences serving the community. In fact, experiential education appears to be on the rise within many colleges and universities around the country (Kendall & Associates, 1990). Finally, because of state and federal cuts in education, schools are relying more on local community support. School officials are realizing the educational and economic importance of forming strong alliances with local business and community agencies. In many cases, these alliances become active partnerships where the community-based organizations take on responsibilities for providing students with learning experiences (American Vocational Association, 1994).

Purpose of the Study

Given the rise of service programs in K-12 schools, the purpose of this study was to attempt to determine what educational outcomes, if any, service programs have for K-12 students. In particular, the study focused on students in

high school, where most K-12 service programs reside. The study addressed two questions:

- What outcomes do students who participate in service programs experience?
- Are there significant differences in educational outcomes among various types of service programs?

The findings from this study may not only help determine the what outcomes service programs foster for students, but they may provide a rationale for developing specific *types* of service programs.

Types of Service Programs

While community service clubs have operated in high schools for many years, much of the recent attention on service programs has centered around service-learning — the integration of community service into the academic curriculum. According to Cairn & Kielsmeier (1991), service-learning provides a means to bring context and relevancy to what students are studying. While service-learning is not a new concept, it is quickly becoming a popular pedagogical tool for instruction. For many teachers, service-learning is seen as a way for students to apply course content to address real issues in the community. For many teachers, service-learning is seen as a way to benefit both the students and the community. In fact, this point distinguishes service-learning from other types of service-related experiential education endeavors such as community service, field education, internships, and volunteerism. Although most types of service programs provide opportunities for students to apply their learning outside the classroom, each type is *intended* to serve a different educational purpose.

The Similarities

School-sponsored volunteer, community service, service-learning, and internship programs seek to develop various aspects of students' educational development (e.g., civic responsibility, career development, academic development, etc.) by engaging students in service to the community. The community can be a student's neighborhood, town, city, or school, or it can be an group of people (e.g., the homeless) or the environment (Kendall & Associates, 1990). These various types of service programs, despite their particular intended educational purpose(s), are fundamentally similar in five ways:

- 1) **Philosophy:** Service programs are typically based on the experiential education philosophy of teaching and learning.
- 2) **Paradigm:** Service programs tend to see students as providers of resources, active participants, producers of knowledge, providers of help, and people who make things happen.
- 3) **Pedagogy:** Service programs often utilize experiential education pedagogical strategies such as active learning, exploratory (discovery learning), contextual learning, cooperative learning, innovative learning, and individualized learning. All service programs expand teaching beyond the classroom by providing students opportunities to apply course knowledge to real situations.
- 4) **Partnerships:** Service programs encourage schools to establish partnerships with outside entities.

5) **Programmatic Issues:** The various types of service programs often must grapple with similar programmatic issues such as transportation of students to and from work/service sites, liability concerns when students are off campus, and general concerns over how students external experiences are coordinated and integrated with what goes on at school.

The various types of service programs have foundations in the experiential education philosophy which purports that learners learn best when they are actively engaged in hands-on meaningful activities (See Chapter 2). Many service proponents believe that by utilizing various experiential and constructivist learning approaches, service programs provide opportunities for students to construct their own meaning by connecting new learning to what students already know (Mainzer et al., 1990; Shumer, 1987).

To be effective, service programs often require collaborative partnerships with agencies outside the school. These agencies help define, establish, and facilitate appropriate field-based learning experiences for students. And because students often engage in activities away from school, the various types of service programs likely face similar programmatic issues such as providing safe student transportation to and from field sites, ensuring liability issues are properly addressed, and developing effective classroom reflection strategies for linking students' service experiences with their overall education.

Distinctions Among Service Programs

School-sponsored service programs typically include a learning component, even though the emphasis on learning may vary from service program to service program (Sigmon, 1994). Consequently, the various types of

service programs are often indistinguishable in practice (Giles & Freed, 1985). According to Robert Sigmon (1994, 1979), the primary differences among service programs are based on the following questions:

- 1) Who is benefiting most from the activity, the *recipient* or the *provider* of the service?
- 2) Is the emphasis of the activity predominantly on *service* or on *learning*?

However, Kendall & Associates (1990), Stanton (1987), and others suggest that program differences go beyond these two issues. They suggest the different service program types serve different educational purposes. Based on various definitions of service programs that appear in the literature, Table 1 lists the ways in which community service, service-learning, and internship programs, — the three program types central to this research study — are distinct.

Table 1:
DISTINCTIONS AMONG THREE TYPES OF SERVICE PROGRAMS

| | COMMUNITY SERVICE | SERVICE-LEARNING | INTERNSHIP |
|--------------------------------|------------------------------------|-----------------------------------|------------------------------------|
| PRIMARY INTENDED BENEFICIARY | Recipient | Recipient & Provider | Provider |
| PRIMARY FOCUS | Service | Service and Learning | Learning |
| INTENDED EDUCATIONAL PURPOSES* | Civic Develop. Ethical Develop. | Academic Devel. Civic Develop. | Career Develop. Academic Devel. |
| INTEGRAT. WITH CURRIC. | Peripheral | Integrated | Co-curricular/ Supplemental |
| NATURE OF SERVICE ACTIVITY | Based on a Social Cause | Based on an Academic Discipline | Based on an Industry or Career |

*In addition to their primary intended educational purposes, most service programs types intend to develop personal & social outcomes.

Community service programs tend to have a strong emphasis on service for which there is an intentional purpose to benefit the recipient of the service activity. In high schools, for example, community service activities typically address a social issue (e.g., recycling, homelessness, AIDS, the environment) and are often part of after-school clubs that are not formally related to any academic course or curriculum. According to the National and Community Service Trust Act of 1993, community service programs are intended primarily to foster students' civic participation and ethical development.

Service-learning seeks to engage students in activities that both combine community service and academic learning. Because service-learning programs are typically rooted in formal courses (core academic, elective, or vocational), the service activities are usually based on particular curricular concepts that are being taught. Many service-learning activities provide students with opportunities for further academic development by allowing them to apply their knowledge to address a curriculum-related need in the community (e.g., students in a geometry course use their understanding of geometry to design and build wheelchair access ramps for disabled persons). While students may develop socially and personally, the primary intended purpose of service-learning is to enhance students' academic development and civic responsibility (Conrad & Hedin, 1989).

In *internship* programs, students tend to spend time at an agency to learn about a particular career industry. For the most part, internship programs are primarily concerned with preparing students to be productive workers (American Vocational Association, 1994). Some experts have argued that internships are not truly a type of *service* program but rather refer to a *work* or "job readiness" program (Kendall & Associates, 1990). However, according to Dwight Giles and Jamille Freed (1985) *internship* is a generic term that is part of a

cluster of educational methods (including community service and service-learning) known as "off-campus" education (in Kendall & Associates, 1990, p.349). There are many instances where students in internship programs provide a service or where students' service placements are referred to as internships.

It is sometimes impossible, simply by observing an activity, to distinguish between a *service* internship and a *work* internship. Here is a scenario that exemplifies this point:

A class of Biology students are studying a unit on infectious diseases in a high school's health academy. Most of the students are in the academy because they plan to pursue a career in the health field. As part of the course, the students must complete an unpaid "internship" at a local hospital. The internship involves having the students work with nurses to learn how vaccines help stop the spread of infectious diseases. An important part of the internship is the time students spend assisting the nurses in providing health education and vaccinations to children in the local community. The students discuss the importance of the vaccinations and how their work is helping to prevent the children from getting potentially fatal diseases.

In this scenario, it is not always obvious which activities constitute *work* and which constitute *service*. As experiential education programs, *work-based* programs are rooted in many of the same philosophies, pedagogies, and principles as are *service* programs. Therefore, although the focus of this study was on *service* programs, the inclusion of internships here is warranted given their formal connections to many service programs, their prevalence in high schools, and their overall similarity to community service and service-learning activities. One of the purposes of this study is to determine if, indeed, there are significant differences in the educational outcomes fostered by community service, service-learning, and internship programs.

CHAPTER TWO

THEORETICAL FRAMEWORK AND REVIEW OF SELECTED LITERATURE

The problems of our schools are inextricably tied to the feeling on the part of many of our youth that they are isolated, unconnected to the larger world outside their classrooms.

Ernest L. Boyer, 1987, p.8

Theoretical Framework

The pedagogical approaches utilized in community service, service-learning, and internship programs are based on the well-established theories of John Dewey, Jean Piaget, James Bruner, David Kolb and others. In particular, these pedagogical approaches are rooted in experiential education and constructivist teaching theories. They focus on the following forms of learning:

- active (participatory) learning
- discovery and exploratory learning
- contextual learning
- cooperative learning
- innovative learning
- individualized learning

Each form of learning plays an important role in characterizing both the nature of service programs and their overall impacts on students. The theoretical underpinnings for each form are presented below.

Active (Participatory) Learning

Service programs operate on the premise that students' participation in the learning process should be as active as possible. Cairn & Kielsmeier (1991), Kendall and Associates (1990), and Sigmon (1979) suggest that service programs are student-driven whereupon learning objectives are formed in the context of what needs to be done to serve others and/or oneself. Specifically, according to Kendall and Associates, service programs encourage the active involvement of students in the planning, development, execution, and assessment of their projects. These principles reflect the core of the experiential education theories espoused by Dewey, Bruner, Kolb, and others. "There is, I think," wrote Dewey, "no point in the philosophy of progressive education which is sounder than its emphasis upon the importance of the participation of the learner in the formation of the purposes which direct his activities in the learning process" (Dewey, 1938, p. 67).

Dewey (1938) believed that when students actively participate in their learning, they are able to construct knowledge that is personally meaningful and fulfilling. In his writings, Bruner (1961) promotes the idea that a student should be viewed neither as a passive recipient of information nor as a bundle of stimuli-response connections. Instead, according to Bruner, a student should be viewed as "one who selects and transforms information, constructs hypotheses, and alters those hypotheses according to the evidence presented" (in Anglin & Bruner, 1973, p. 397). In ideal service programs, students are provided opportunities to confront a wide array of issues that challenge their beliefs and ideals. It is believed that from these challenges, they reconstruct their beliefs, opinions, and ideals based on their real life community-based learning experiences (Gardner, 1992).

Discovery and Exploratory Learning

James Bruner (1961) states, "The hypothesis that I would propose here is that to the degree that one is able to approach learning as a task of discovering something rather than learning about it, to that degree will there be a tendency for the child to carry out his learning activities with the autonomy of self-reward or, more properly by reward that is discovery itself" (in Anglin & Bruner, 1973, p. 406). K-12 service programs often seek to more actively engage students in the learning process by providing students opportunities to explore various solutions for real social issues. Service proponents believe that by engaging students in service to others and/or their community, students have opportunities to discover new knowledge for which they can construct their own meaning (Gardner, 1992; Boyer, 1987; Shumer, 1987). This view is in line with Piaget's belief that learning through discovery and exploration motivates students to continue learning by leading them to experience the pleasure of solving a problem that is seen and chosen as one's own (in Steffe & Gale, 1995). Because service programs can involve students in addressing real needs in the local community, students may have opportunities to explore various approaches in addressing those needs. In many cases, the primary goal of service programs is not to find the "right" solution, but rather to select an appropriate approach that will produce the most benefits. Students who perform service typically are not expected to "solve" a social problem. Rather, the service activities are intended to allow students to construct a better understanding of how the issue affects them and others (Berman, 1990).

Successful service programs include structured reflection sessions that encourage students both to analyze their own thinking about the causes they are addressing and construct their own theories on how to best address the

particular issues. This is an important element especially in high school service programs where, according to Piaget (1958), adolescents are in the formal operations stage of cognitive development. It is at this stage that adolescents become capable of reflective thinking, moving away from concrete thought processes to a more abstract realm of thinking (Inhelder & Piaget, 1958).

Reflection activities provide students opportunities to think critically about how their service activities relate to their school curricula and/or personal lives.

Through journal writing and other reflection techniques, students are encouraged to convert their group discussions into internal speech which is used to organized their thoughts about their service experiences. This convergence of speech and practical activity, according to Vygotsky (1978), creates the most significant movement in the course of a young person's intellectual development.

Contextual Learning

Too few of today's high school classrooms provide students with a learning environment in which the relevance to real life is clear and the subject matter is inter-connected with curricula taught in other classes (Boyer, 1983). According to Vygotsky (1978), the teaching of formal disciplines inaccurately assumes that regardless of the irrelevance of the subjects to daily living, they are the greatest value for pupil's mental development. It has been shown that learning in one area has very little influence on overall development (Vygotsky, 1978). In order for true learning to occur, students must acquire specialized abilities that can be transferred among various situations and subject domains. According to Cairn & Kielsmeier (1991), service programs bring context and meaning to an often fragmented school curriculum; this contextualization of learning facilitates students' development of "portable" or transferable skills that can be used among a variety of educational and personal situations.

One intended outcome of high school service programs is to assist students with making the transition from adolescence to adulthood (Kendall & Associates, 1990). Piaget (1958) believed that the adolescent is an individual who is beginning to think of the future and his/her future work in society (in Inhelder & Piaget, 1958). Service programs often place students in situations where they must deal with a combination of choices, struggle with various possibilities for action, and deliberate over drawing logical conclusions. These situations, all components of Piaget's formal operations stage, encourage students to take on adult-like roles in real, contextualized situations.

Another intended outcome of high school service programs is to develop within students a sense of empathy and care for others. To do this, service program often place students in situations where they must attend to the needs of others: serving the ill, feeding the homeless, accompanying the elderly, etc. By placing students in actual situations where these people reside, students get first hand knowledge of what the service recipients' lives are like. Through his work, Lawrence Kohlberg (1972) found that stimulating a child to put himself or herself in another person's position is an important strategy for developing empathy (in Duska & Whelan, 1975). Initially, for some students, such activities might appear quite daunting. Students could more easily read about the homeless or view a video about the elderly. However being placed in the actual settings where elderly persons live their daily lives presents students with a context that the classroom cannot provide. And when this kind of field work is combined with academic content, enriching and exciting learning situations can be created (Kendall & Associates, 1990).

Cooperative Learning

"Human learning is a social enterprise.... No individual is expected to know the same things to the same degree, as occurs in the typical classroom...Working together, the group can produce a brilliant collective product that no individual could have been expected to produce alone" (Farnham-Diggory, 1990, p. 63). At Dewey's University of Chicago lab school, students at various age levels were encouraged to work collaboratively on hands-on projects through which they could explore their individual talents through social cooperation and exchange of ideas (in Mayhew & Edwards, 1936). Similarly, many service programs encourage students to work with one another on a common issue or cause. The nature of human interactions that are fostered through service program activities play an important role in the social and personal development of students (Berman, 1990; Mainzer, Baltzley, & Heslin, 1990).

The majority of K-12 service programs involves the engagement of students in activities where they must work as part of a collaborative team. Through these collaborative interactions, students learn much about themselves and others. Education theorist Ralph Tyler states, "Youth are too largely segregated from adult life, are given too few opportunities to serve others, and are permitted too few occasions in which they can take major responsibility for actions that affect others" (1982, p. 24). Consequently, according to Tyler, many students receive little or no experience in working with others for a common purpose. Collaborative participation activities can help students sharpen their social skills and help them gain confidence in their social effectiveness (Tyler, 1982; Lickona et al., 1976).

Innovative Learning

It can be assumed that many school-sponsored service programs operate with the intent of providing students opportunities to learn new information that will better prepare them for the future. Service programs provide students with opportunities to make contributions to others and themselves, sometimes in an effort to discover strategies for building a better future (Kendall & Associates, 1990). According to Farnham-Diggory (1990), traditional schools are doing a poor job in training students for the real-world learning that awaits them after their formal studies. Schools are not providing appropriate kinds of learning opportunities. She writes, "It has never been the case in real life that rows of individuals, sitting behind desks, have each been charged with solving the same problem to the same level of competence" (1990, pp. 63-64).

Because students are being taught how to maintain and perpetuate the status quo, Farnham-Diggory suggests that there instead must be "innovative learning". Innovative learning is focused on acquiring skills for dealing with new situations and involves anticipatory and participatory learning. Anticipatory learning prepares people to use techniques such as forecasting, simulations, scenarios for considering trends, making plans, and evaluating future consequences. Participatory learning involves the formal sharing of decision-making responsibilities as well as the development of a spirit of cooperation, dialogue, and empathy. Through innovative learning approaches, students can learn how to work together to make the best of each individual's ability for achieving important group goals. These principles can be found in various types of service programs.

Individualized Learning

Not to be confused with "independent" learning, individualized learning is a teaching strategy whereby individual students' learning styles and needs are considered. Because different students learn in different ways, a single approach to teaching (e.g., didactic, visual, etc.) may not be effective for all students. Many theorists have discussed the importance of tailoring teaching to meet the needs of individual learners. Dewey (1938) believed that instruction must focus on the development of individual students' mind, not on blocks of subject matter. As mentioned earlier, students at his lab school were encouraged to explore their individual talents through hands-on projects.

In comparative studies of students from different cultures and subcultures, Cole and Bruner (1971) found that group differences in achievement and aptitude may not be so much the result of innate differences as the fact that certain situations may favor one group more than another. According to this view, the teacher's task is to establish a learning atmosphere in which *every* student can "transfer skills he already possesses to the task at hand" (in Anglin & Bruner, 1973, p. 399). To do this, the teacher must establish learning situations to which each student's preferred mode of learning can be applied.

In his treatise on experiential education, David Kolb (1984) discusses how learning proceeds through a four stage cycle, moving from concrete experiences, to reflective observation, to abstract conceptualization, and finally to active experimentation. He proposes that the transitions between these cycles involves four distinct individual learning styles — divergent, assimilative, convergent, and accommodative. Kolb suggests that different people tend to favor different aspects of the learning process and consequently rely most often on their preferred mode of learning.

Depending on the service activity, service programs can provide students with opportunities to learn through their preferred individual learning style. As Conrad & Hedin (1987) suggest, students in service programs select those educational approaches and techniques that best suit their learning style(s). And because students must often work with others to accomplish their service goals, they often must learn to accept and work with learning styles that may be different than their own. Because each student brings a different set of experiences and a unique perspective to the learning situation, individual students' learning outcomes may vary.

Because most service programs utilize an experiential, exploratory, and individualized approach to teaching, many service programs do not have a model plan to follow. Rather, the curriculum unfolds and evolves as the students participate in their service activities (Tyler, 1982). This notion is supported by Piaget's theory of cognitive development which, according to Carolyn Edwards, "leads not to a specific rigid and defined curriculum, but rather to a flexible approach to understanding and working with children that can be adapted to any age group or learning setting." (Edwards, 1986, p. 6). The individualized learning approach utilized by many service programs typically encourages students to employ their individual talents, creativity and abilities so that the needs to be addressed can be served best. This suggests that if service programs are individualized to some degree, the educational outcomes for students who engage in similar service activities may not necessarily be the same among all students. Wolfgang Kohler (1940) would say that this is because human behavior is determined by the dynamic interaction with environmental forces where responses to a particular stimulus may be similar, but never identical. However, at this point, no evidence exists that fully explains how service programs impact individual students similarly or differently.

The theoretical framework presented here encompasses the important pedagogical approaches utilized in service programs. These approaches lead to a number of potential educational outcomes for students. These outcomes are the focus of the next section.

The Changing Purposes of K-12 Education

According to John Goodlad (1984), there is little agreement as to what the purposes of K-12 education should be. For many people, the primary purpose of K-12 education centers around imparting important bodies of knowledge to students as a means to develop students' intellectual and critical thinking skills. Gardner (1992) suggests that because service is not generally viewed as a true academic, intellectual pursuit, many educators and policy makers are not supportive of making strong linkages between the academic curriculum and service. For them, service is not an important part of schooling. "It's marvelous that our young people want to help with these problems, but they shouldn't get academic credit for it. That would cheapen the experience and lower our standards" (Conrad, 1990, p. 504).

However, recently there have been a number of challenges to the view that "education is academics". A number of education experts suggest that this traditional notion of education is inadequate for today's student (Farnham-Diggory 1990, Conrad, 1982, Goodlad, 1984). According to Farnham-Diggory (1990), the traditional curriculum "represents a fixed system through which children are passed. The curriculum does not grow from the needs and interests of a particular group of children in a particular classroom.... Children may find the curriculum interesting, but it is of very little use to them because it is quite remote from their world" (pp. 9, 12).

Much of the curriculum that is taught in schools is based on static knowledge that is transmitted from the teacher to the student. Students often learn this knowledge with expectation that it will eventually be useful and important. Lawrence Kohlberg (1970) suggests that, in actuality, there exists two curricula: a *manifest* (or overt) *curriculum*, which encompasses the academic knowledge that is to be transmitted to students; and a *hidden curriculum* that encompasses non-academic learning—attitudes, values, dispositions, and social relations (Gordon, 1985). The hidden curriculum is seen as being extremely powerful and as having a profound influence on students' overall education (Gordon, 1985; Wasserman, 1978; Kohlberg; 1970). For example, while the manifest curriculum teaches students in a social studies class about the importance of equality, the hidden curriculum teaches students that, in reality, individuals are not all treated equally. Students witness unequal treatment in the classroom, in the school yard, in the community, and in their homes. These personal testimonials have profound learning consequences for students. According to Kohlberg (1970), the hidden curriculum strongly influences the kinds of behaviors students learn and exert. Kohlberg believes that the hidden curriculum accounts for 90 percent of what goes on in classrooms.

This principle has strong implications for service programs. While some service programs (namely, service-learning programs) are intended to advance the *academic* curriculum, many other service programs are intended to foster development in the so-called "non-academic domains". Goodlad (1984) defines the non-academic domains as personal, career, social, ethical, and civic development. In his book, *A Place Called School: Prospects for the Future*, Goodlad proposed a set of goals for all schools, most of which are non-academic and are likely, in many schools, to be relegated predominantly to the hidden curriculum. Like Goodlad, many service program proponents believe that there is more to

effective schooling than academic development (Conrad & Hedin, 1989, Kendall & Associates, 1990, Shumer, 1994). In their assessment of the benefits of service programs for young people, Conrad and Hedin (1980) developed a list of educational outcomes typically sought for students who participate in service programs. The outcomes on their list span the academic and non-academic domains and are closely aligned with many of the K-12 goals proposed by Goodlad (See Table 2).

Given the numerous potential educational outcomes of service programs, it is not enough to study only a small set of educational impacts. And because service programs vary greatly from site to site, single-site studies tell us little about programs at other sites. To be able to fully assess the outcomes of service programs on students' educational development, researchers must investigate and scrutinize how different types of service programs at different sites impact students across the span of educational domains. To date, no single study has assessed the impacts of service activities on students across all six of the educational domains presented in Table 2. While collectively, previous studies have found evidence that service activities have positive outcomes for students in each of the six domains, individually, the studies have tended to investigate a limited set of educational outcomes based on one type of service activity (e.g., tutoring). Only one K-12 study, a study conducted by Dan Conrad (1980), has successfully compared the outcomes of more than one type of service program across a series of educational domains.

The next section reviews the scope, focus, and findings of previous studies, revealing how, in most cases, the studies have been limited in their ability to determine how different types of service programs impact students.

Table 2: Comparison of Goodlad's Goals for K-12 Schools and the Aims and Outcomes of Service Programs

John Goodlad's goals adapted from: *A Place Called School* (1984);
 Aims and Outcomes of Service Programs adapted from: *The Impact of Experiential Education on Youth Development* (1980) by Dan Conrad and Diane Hedin

| | GOODLAD'S GOALS FOR K-12 SCHOOLS | AIMS AND OUTCOMES OF SERVICE PROGRAMS |
|-------------------------|--|--|
| Academic Goals | <p>Schools should help students master the basic skills and fundamental processes of reading, writing, mathematics, communication, listening, and the utilization of resources.</p> <p>Schools should develop students' ability to think rationally, problem solve, use and evaluate knowledge, and understand change in society.</p> <p>Schools should also focus on helping students develop a positive attitude toward intellectual activity.</p> | <ul style="list-style-type: none"> •Basic academic skills (writing, reading, math) •Higher -level thinking skills (critical thinking, problem solving) •Skills in learning from experience (observing, asking questions, thinking for oneself) •Skills in particular subject matter (psychology, civics, biology, etc.) as related to experiences •Communication skills (listening, being articulate in presenting ideas, etc.) •Tacit learning skills (the nuances that cant' be fully explained in a book or lecture but are often the most important things of all to know) •More positive attitude toward education, learning (possibly, but not necessarily, school) |
| Vocational Goals | <p><i>Schools should provide a career or vocational education where students:</i></p> <ul style="list-style-type: none"> • learn how to select a personally satisfying occupation; • become knowledgeable about career options; • develop salable skills; develop a productive work ethic; & • develop positive attitudes toward work. | <ul style="list-style-type: none"> •Knowledge of and some experience with service-related career possibilities •Realistic ideas about the world of work •Contacts for future job possibilities |

Table 2 (cont'd): Comparison of Goodlad's Goals for K-12 Schools and the Aims and Outcomes of Service Programs

| | GOODLAD'S GOALS FOR K-12 SCHOOLS | AIMS AND OUTCOMES OF SERVICE PROGRAMS |
|-----------------------|---|--|
| Personal Goals | <p><i>Schools should help students learn to:</i></p> <ul style="list-style-type: none"> •develop their willingness to receive emotional impressions; •expand their affective sensitivity; •develop the ability to cope with social change; •develop the ability to engage in constructive self-criticism; •deal with problems in original ways; •become tolerant of new ideas; •be flexible and to consider different points of view; •seek to contribute to cultural and social life through one's artistic and a vocational interests; •a philosophy of life; •self-confidence; decision-making skills; •a willingness to accept responsibility for one's own decisions and their consequences; •skill in the selection and attainment of some personal, life-long learning goals; •search for meaning in their activities; •plan and organize the environment in order to meet their goals; •assess realistically and live with one's limitations and strengths; and •recognize that one's self-concept is developed in interaction with other people. | <ul style="list-style-type: none"> • Self-esteem, self-worth, competence, and confidence • Self-understanding, insight into self • Self-direction, personal motivation • Independence, autonomy, assertiveness • Sense of usefulness, of doing something worthwhile • Personal power, belief in ability to make a difference • Conscious set of personal values and beliefs • Openness to new experiences, ability to take risks and accept challenges • Ability to take responsibility, acknowledge and accept consequences of actions • Capacity to be productive, persevere in difficult tasks • Willingness to explore new identities, unfamiliar roles |

Table 2 (cont'd): Comparison of Goodlad's Goals for K-12 Schools and the Aims and Outcomes of Service Programs

| | GOODLAD'S GOALS FOR K-12 SCHOOLS | AIMS AND OUTCOMES OF SERVICE PROGRAMS |
|---------------------------------|---|--|
| Civic And Cultural Goals | <p><i>Schools should help students develop:</i></p> <ul style="list-style-type: none"> • a historical perspective; • knowledge of the workings of government; • a willingness to participate in political life; • a commitment to values of liberty; and • an understanding complex organizations. <p><i>Schools should help enculturate students so that students learn:</i></p> <ul style="list-style-type: none"> • to understand the values of the civilization and groups of which they are a member; • an awareness and understanding of their cultural heritage; • an understanding of the manner which past traditions operate in and influence the present; • how to apply the fine arts to the appreciation of other cultures. | <ul style="list-style-type: none"> • Increased likelihood of continuing to be active in the community • Sense of usefulness, of doing something worthwhile • Personal power, belief in ability to make a difference |
| Ethical Goals | <p><i>Schools should foster students' moral and ethical development by teaching students to:</i></p> <ul style="list-style-type: none"> • judge events as good or evil; • develop a commitment to truth and values; • learn to utilize values in making choices; • develop moral integrity; and • develop and understanding of the necessity for moral conduct. | <ul style="list-style-type: none"> • Conscious set of personal values and beliefs • Ability to take responsibility, acknowledge and accept consequences of actions |

Table 2 (cont'd): Comparison of Goodlad's Goals for K-12 Schools and the Aims and Outcomes of Service Programs

| | <p align="center">GOODLAD'S GOALS FOR K-12 SCHOOLS</p> | <p align="center">AIMS AND OUTCOMES OF SERVICE PROGRAMS</p> |
|----------------------------|--|--|
| <p>Social Goals</p> | <p><i>Through their schooling, students should be able to:</i></p> <ul style="list-style-type: none"> •develop interpersonal understandings where they appreciate opposing value systems; •develop an understanding and appreciation of cultures different from one's own; •understand the functioning of families; •know how to communicate effectively in groups; •develop a concern for others; and •learn to form productive, respectful, and cooperative relations with others. | <ul style="list-style-type: none"> • More positive attitude toward living and working with people of diverse backgrounds • Concern for the welfare of others, a broader circle of people about whom one feels concern and responsibility • Knowledge and understanding of others • Skills in caring for others • Ability to work cooperatively with and to trust others |

Assessing the Multiple Outcomes of Youth Service Programs

Rooted in the teaching and learning theories of experiential education, service programs are likely affected, to some degree, by each of the forms of learning described earlier in the chapter. Unfortunately, it is not well understood how each of the learning forms influences the impact service programs have on students. The research on school-based service programs has not yet reached a stage where such relationships have been explored. Instead, almost all of the existing research has focused on investigating how individual service programs affect either the service providers or the service recipients. The studies of service programs at the K-12 level, in particular, have tended to focus on determining whether or not service programs have positive impacts on the student who *provides* the service. This is because many service program proponents believe that until this primary question is answered for program skeptics, service programs will only play a peripheral role in students' formal educational experiences (Kendall & Associates, 1990).

While several studies have provided valuable insights into the potential educational outcomes of service programs for K-12 students, there is still no clear understanding of how different types of service experiences affect students. If anything, the study findings have resulted in more questions about the overall impacts of service programs on young people (Kendall & Associates, 1990).

As mentioned in Chapter One, community service programs are intended primarily to foster students' civic responsibility and ethical development while service-learning programs are intended primarily to foster students' academic and civic development (National and Community Service Trust Act, 1993). Internships, on the other hand, are intended primarily to foster students' career

and academic development (Giles and Freed, 1985). However, the findings from previous research studies appear to suggest that there are no discernible outcome patterns within service program types; the outcomes of individual program types appear to go beyond the educational domains they are intended to foster. All community service programs, for example, do not appear to foster the same outcomes for students just as the outcomes of all service-learning and internship programs appear to vary from program to program.

While this observation is not very surprising, given that service programs are idiosyncratic, only one research study has compared the outcomes of different types of service programs (e.g., community service vs. service-learning vs. volunteerism). All other studies have focused on investigating the outcomes of a single program type on various aspects of student development. For the most part, previous studies have sought to determine whether a particular service program at a particular site has affected students on a set of predetermined outcomes, which are usually based on the program's intended goals and objectives.

Overall, previous study findings have revealed that K-12 service program outcomes are predominantly positive and span all six of Goodlad's educational domains. In their review of youth service program studies, Yates and Youniss (1996) found that most school-sponsored service programs studies have found positive outcomes for students, spanning students' interpersonal, intrapersonal, moral, and social responsibility development. Similarly, a wide range of educational outcomes were noted by Williams (1991) who, in an earlier review of studies on service-related field education programs, found that such programs have positive personal, career, affective, and academic outcomes for students. Likewise, in their review of K-12 service program studies, Conrad and Hedin (1989), the most cited of all service program experts, identified intellectual

development and academic learning, personal growth and development, and social growth and development as the most common outcomes for programs that combine service and learning. While all three study reviews conclude that service programs have generally positive student outcomes across a variety of educational domains, it is unknown, at this time, which domain(s) appears to be affected most profoundly from students' participation in service.

Studies of Community Service Programs

Four studies have investigated the outcomes of K-12 *community service* programs on students' educational development. Overall, these studies found positive outcomes on participating students across several educational domains. The findings from these studies suggest that the outcomes of community service programs go beyond the primary intended educational purposes of the programs: to foster students' civic responsibility and ethical development.

In a multi-site, year-long study, Newmann & Rutter (1983) investigated the effects of high school community service programs on students' social development (participation in working and social groups, confidence in working with others), personal development (sense of empowerment), and civic participation (sense of responsibility and concern toward others). The study compared the outcomes of one group of students in community service programs (n=163) at eight schools. Each school selected a group of students not engaged in service to be part of the control group (n=160). Efforts were made to match students in the two groups by gender, grade point average, and socio-economic status.

Qualitative and quantitative analyses of the various data collected (pre- and post-tests, an open-ended questionnaires, and interviews that covered development in each of the three domains) revealed significant differences in

social and personal outcomes between the two groups at the .05 level of significance. Despite this being a study of *community service* programs, the outcomes in civic participation were not significantly different between the two groups. (Ethical development was not included in the study). The most significant differences appeared to be between school sites, whereby students at some schools gained significantly more than students at other schools. Although attempts were made to match students by gender, grade point average, and socio-economic status, it is possible that this finding may have been due to other differences (e.g., students' age, students' prior experience with service) between the students who attended the different schools. Nevertheless, this finding is interesting in that it suggests that individual school cultures, and the service programs that operate within them, might play an important role in the ways students experience service programs.

Outcomes across a variety of domains were also noted by Luchs (1981) who compared selected changes among two groups of students engaged in community service activities at an urban high school. One group (n=133) participated in 30 hours of community service while a comparison group (n=126) did not participate in service activities. To measure changes in students' personal, academic, career, and civic development, a researcher designed pre- and post-test that measured developmental gains in students' attitudes toward school, civic participation, and personal empowerment was administered to students and interviews of selected students (n=10) and teachers (n=5) were held. The community service group showed significantly more positive gains across a range of outcomes including personal empowerment, self-esteem, acceptable school behavior, attitudes towards others, and career awareness. Interestingly enough again, no significant differences in civic participation between the two groups were noted.

In a later study, Calabrese and Schumer (1986) explored the multiple outcomes of community service activities over time by comparing students' civic responsibility, personal development, academic development, and social development over a ten and twenty-week period. In this study, one group of students (n=25) were provided opportunities to engage in a variety of community service activities over a ten-week period while a second group of students (n=25) did not engage in service activities. After the 10 weeks, 12 of the 25 students in the community service group continued service for an additional ten-weeks. At the ten- and twenty-week intervals, a post-survey designed to measure students' sense of alienation, civic participation, isolation, personal empowerment, and collaborative and cooperative work was administered to all 50 students. The study also assessed changes in participating students' grade point averages.

Through a qualitative analysis of students' survey data, Calabrese and Schumer (1986) concluded that the students who performed service for 20 weeks showed decreased alienation and isolation. The study found no increases in students' grade point averages; Calabrese and Schumer concluded that this was because students' grade point averages were high at the start of the study. While some increases in social development and civic responsibility were noted, these increases were not significant (Calabrese and Schumer, 1986). Just as Luchs (1981) and Newmann and Rutter (1983) had found, students' community service experiences (both at the ten-week and twenty-week periods) revealed no significant changes in students' civic development, one of *community service's* purported intended outcomes.

In a more recent study of a community service program, Middleton (1993) investigated the outcomes of community service activities as they related to students' social, personal, and ethical development. (Civic responsibility was not

included as an outcome variable). In this study, pre- and post-tests which measured students self-esteem, helping disposition, emotional disposition, social interest, empathy toward others, and sociability were administered to two groups of high school students. One group (n=60) was involved in a series of community service activities while the second group (n=80), which was not involved in service, served as a comparison group. No matches were made between the two groups. The pre-tests were administered at the start of the semester-long program. The post-tests were administered near the end of the semester. The study found that students in the experimental group showed significantly greater gains in their sociability, self-esteem, and empathy. No other significant differences in outcomes were noted between the two groups. While this finding is interesting, it is unclear as to whether the differences in group outcomes were a result of differences between students in the two groups studied.

Collectively, these four studies reveal that *community service* activities potentially have positive student outcomes that go beyond civic and ethical development. Ironically, while the studies reveal that community service programs can enhance students' personal, social, academic, career, and ethical development, there has been almost no evidence that such programs impact students' civic development. As will be shown in the next section, the findings from studies of service-learning and internship programs also suggest that, for the most part, the actual outcomes of particular service program types go beyond their intended educational purposes.

Studies of Service-Learning Programs

According to the National and Community Service Trust Act of 1993, service-learning programs are intended to develop students' academic

development and civic responsibility. Only one study, conducted by Schollenberger (1985), explored the relationship between of service-learning and K-12 students' academic development. The study's findings revealed that service-learning provides students with opportunities for intellectual development by engaging them in activities that require higher order thinking. In this study, the researcher developed two instruments — the Service-Learners' Self-Perceptive Inventory and the Service-Learners' Directed Log — to measure students' involvement and performance in higher levels of thinking. The study engaged 50 high school students in a variety of service-learning activities over a one-semester period. Over the course of the semester, students' involvement and performance in higher order thinking skills were measured at regular intervals. While no comparison group was included the study, the findings concluded that service-learning activities provide students with additional opportunities to problem solve, analyze complex situations, develop creative solutions, and analyze issues from a variety of perspectives. Schollenberger (1985) suggests that the increased opportunities service-learning provides for students to engage in higher level thinking have strong implications for improving students' overall academic achievement in school.

While there are no other known studies that have investigated the academic outcomes of service-learning on K-12 students, a study conducted by Batchelder and Root (1994) revealed multiple outcomes of service-learning among college undergraduates. Batchelder and Root (1994) compared outcomes from two groups of undergraduates; over the course of a semester, one group of students (n=48) were engaged in a variety of service-learning activities while a second group of students (n=48) were not engaged in any service activities. Both groups completed pre- and post-tests which involved having the students solve a variety of social problems, based on a set of scenarios. Students in the service-

learning group also completed journal entries about their service experiences. Using t-tests, the analysis involved comparing the two groups' gains on a variety of dimensions: civic development (advocacy for change), personal development (ego development), ethical development (prosocial decision making), and academic development (transference and appropriate application of problem solving strategies to new situations). At the .05 level of significance, the study findings showed significant differences in gains between the service-learning and the no service groups in civic, academic, and ethical development. Unlike students in the no service group, the service-learning students made significant gains in their ability to problem solve and their ability to see multiple dimensions of problem solving. According to Batchelder and Root (1994), the service-learning group also showed more indications than the no service group in their resolve to actively address key social issues.

Unfortunately, these scant findings do not provide any definitive data on the impacts of service-learning on student development. Further research on service-learning is needed so that a broader spectrum of outcomes can be investigated. New service-learning studies should focus on capturing outcomes across a broader range of educational domains. For example, expanding Schollenberger's study to include outcomes beyond the academic domain would help the field better understand the relationship between service-learning and students' personal, social, career, ethical and/or civic development.

Studies of Internship Programs

The impacts of internship programs on students' career development are documented widely in the literature on school-to-work programs (Stern et al., 1994). The literature on school-sponsored service programs, however, has attempted to explore the outcomes of internship programs beyond students'

career development. In a study by Hamilton & Zeldin (1987), for example, academic and civic outcomes between two groups of high school students were compared. One group of students (n=59) served as interns at local government agencies for up to 40 hours. The other group of students (n=29) attended the same high school as the internship group but did not participate in a service internship program. The study attempted to determine if there were any differences between the two groups in students' academic development (knowledge of local government and social studies issues) and civic responsibility as measured by a battery of pre- and post-tests. Controlling for pre-test scores, a regression analysis revealed that the internship group had significantly more knowledge about local government, was more apt to involve themselves in governmental affairs, and showed greater signs of political confidence than the students in the no internship group (Hamilton and Zeldin, 1987).

Similarly, in a more recent study conducted by Rob Shumer (1994), significant differences in academic and civic development, as well as career development, were found between students at a high school who participated in a service internship program and students who did not. The internship group included 96 students in year-long activities which included community service, career exploration, and civic education. The no internship comparison group included 48 students at the school who were not in the internship program, but who agreed to be part of the study. Students completed a battery of pre- and post-tests that measured students' sense of career aspirations, students' understanding of civic issues, and students' attitudes towards school learning. Students' attendance and grade point average were also monitored. Students in the two groups were not matched in any way. A quantitative analysis revealed that students in the internship group showed significantly greater gains in all

aspects of the assessment. Significant differences were also noted between groups in students' attendance and grade point averages. According to Shumer (1994), students participating in the internships made significantly higher gains in attendance and grade point averages than did the no internship group. However, these differences may have been due to initial differences among students in the two groups.

As with the studies of other service program types, the findings from these two studies suggest that internship programs can potentially foster outcomes for students that go beyond their primary intended educational purpose. However, the findings are not definitive. Additional studies are needed before any firm conclusions about the relationship between internship programs and students' educational development can be made.

Comparing Different Types of Service Programs

Despite some indication that service programs may foster positive educational outcomes for students, it is unknown, at this time, which educational domain(s) is affected most by which type of service program. Because most studies have been designed to research the outcomes of one type of service program on various aspects of student development, previous studies reveal little about how outcomes, across service program types, are similar and/or different.

Two studies have attempted to compare the outcomes of different types of service programs. In a study by Conrad (1980), the outcomes of four types of experiential education programs on students' personal, social, academic, career, and ethical development were explored. Although the experiential education programs all had a strong service component, none of the programs were integrated into students' daily academic curriculum. The study involved 612

students from nine high schools in the United States who were part of 15 school-sponsored experiential education programs. The service group comprised of students from 11 of the 15 programs. These 11 service programs were categorized into four program types — community service, community study, internships, and outdoor adventure. A comparison group of students who were not engaged in any form of experiential learning was comprised of students enrolled in four classes that were housed in four of the participating high schools. Participation in the study was based on the self-selection of teachers and programs directors who agreed to involve their students in the study.

Using a combination of researcher developed scales, well-tested psychosocial scales, and student report data on attitudinal scales, Conrad sought to find significant differences between the experiential and non-experiential groups in students' self-esteem, social responsibility, personal responsibility, attitudes towards adults, attitudes towards others, career maturity, moral reasoning, and problem solving skills. Based on students' gain scores for each of the scales, t-tests were used to analyze differences in between the two groups. Conrad found that, for every scale used in the study, students' gain scores (post-test score minus pre-test score) were significantly higher than they were for those in the comparison group at the .05 level of significance. While these findings are encouraging, they are quite tenuous. The study had several limitations, especially in regards to the non-equivalence of the student groups studied (e.g., differences between groups in gender, age, ethnicity, and other variables).

Conrad also explored differences between each of the groups (four experiential learning groups and the non experiential group) through an analysis of variance. Based on the gain scores used in the two-group comparison, Conrad found no significant differences in gain scores (at the .05 level of significance) for any of the scales between any of the service program types. According to

Conrad (1980), the greatest predictor of positive change for students was students' individual reports of their experiences. Conrad concluded that experiential education program outcomes primarily are based on students' individual experiences with particular activities rather than on any overall group outcome. Although the study did not employ a strong experimental design (e.g., random assignment of students, etc.), the study's large sample size and its inclusion of multiple types of experiential education programs makes this the most comprehensive service study to date.

A second comparative study of service programs was conducted in 1988 by Hamilton and Fenzel who compared the outcomes of two experiential education programs — a community service program and a child care assistance program — on youth's general knowledge acquisition, overall skill development, attitudes toward personal responsibility, and attitudes towards civic responsibility. This study, however, was not as comprehensive as Conrad's study in that it only included participants from one program site. The study involved 73 youth ages 11-16 who were part of a 4-H Series program in New York. The study utilized written questionnaires as well as interviews of the youth and the adults with whom they worked. Almost all the youth in both groups reported gains in their general knowledge acquisition and overall skill development. The adults included in the study (n=11) reported that they saw gains in the youth's self-esteem and personal responsibility. Like Conrad, Hamilton and Fenzel (1988) found that gains in the youth's development varied according to the participants' individual needs and experiences.

However, Hamilton and Fenzel's study did not include a comparison group, making one wonder whether most of the reported gains were actually a result of natural maturation among the youth over the course of the year. Almost all of the data gathered for the analysis were from participants' self-

reports. In addition, the two service programs studied were not part of a school program whereby the youth participated in the program as "students".

Consequently, the findings of this study are not very generalizable to *school-sponsored* service programs. Nevertheless, it is a study worth mentioning here since it is one of only two previous attempts to compare outcomes of different types of service programs.

Generalizing Previous Study Findings

While collectively, the previous studies have been helpful in revealing the potential educational outcomes of school-sponsored service programs on students, it has not been possible to coalesce all these findings into one broad statement about K-12 service program outcomes. Because previous K-12 service program studies have not employed true experimental designs, their findings overall are tenuous and quite limited in their generalizability to other programs. As Shumer (1994) suggests, service programs engage particular groups of students in a set of activities that provide a wide range of learning and service opportunities for students, and therefore, it is difficult to generalize study findings from one service program to another. Because individual studies have addressed different combinations of educational outcomes and have used different methodologies, data sources, instruments, and data analyses techniques to arrive at their conclusions, it remains unclear which educational outcomes are manifested with which service program type.

Service program researchers have had to contend with the lack of appropriate instruments and protocols that can measure the multiple outcomes of service programs across vastly different student populations and community sites (Gray, 1996). The instruments that are available typically have been developed with a specific program in mind (e.g., a measure of social awareness

for a ninth grade social studies service-learning program in which students provide service to the homeless). Such instruments are generally not valid for studying service programs at other sites, especially if programs at other sites differ significantly in the characteristics of the participating students or the nature of the service activities (Shumer, 1994). Thus, overall, the findings garnered from previous studies have limited generalizability beyond the program studied.

The Methodological Limitations of Previous Studies

There has been no systematic approach to studying various types of service programs across a variety of educational domains. Indeed, for many years, previous study findings have been considered to be tenuous, at best. In 1980, Conrad and Hedin wrote,

While strong endorsements of experience-based education by leading educators and social scientists abound, relatively little hard evidence of the impact of such programs on students appears. Little effort has been made to test systematically the assumptions underlying the endorsements or to investigate empirically which specific forms or formats of experiential programs may be the most effective in realizing the hypothesized benefits. (p. 8)

Today, the service field continues to struggle with finding strong, conclusive evidence of the impacts of service programs on K-12 students.

One reason for this ongoing struggle is that almost all of the existing individual studies suffer from a series of methodological limitations that have prevented their findings from having greater influence on the service field. In analyzing the methodologies utilized, most previous studies have suffered from one or more of the following methodological limitations:

- the findings were based on outcomes from only one type of service program (e.g., community service, internship) or service activity (e.g., tutoring);

- the impact studied focused on only one or two educational domains (academic, career, etc.) and did not consider the full range educational outcomes;
- the study did not include a control group for comparison;
- the study did not include a random sample;
- the data were collected from a limited number of data sources;
- the data were based on information gathered from one or two measures; (e.g., one pre-/post-test);
- the data were analyzed through one approach (quantitatively or qualitatively);
- the time frames within which the impacts were expected to occur were short (e.g., 10 weeks); and
- the findings were based on small sample sizes and/or on less generalizable samples (e.g., youth involved in a non-school-sponsored 4-H program).

In addition to these limitations, previous studies have not considered many variables which likely may influence how students are affected by service programs — students' prior experience with service, teachers' level of experience, the varying intensities of service experiences, the extent to which the educational outcomes of service programs last over time, and many other variables. Even when researchers make efforts to design studies that are thorough and comprehensive, limitations such as these are often unavoidable when studying multifaceted educational programs (Hecht, 1997; Shumer, 1994). Hecht (1997) writes, "Even studies of service learning which attempt to establish the greatest controls in terms of design are generally quasi-experimental" (p. 13). While efforts were made by this researcher to be as comprehensive as possible in the methodological design of this dissertation study, existing naturally occurring conditions imposed several unavoidable limitations (e.g.,

randomization of subjects was not possible). Thus, as with most previous studies of K-12 service programs, the design of this study is based on a sample of convenience. A full account of the limitations of this dissertation study are presented in Chapter Six.

Despite the limitations of previous studies, their findings have paved the way for further research and inquiry. For example, for this dissertation study, the studies played an important role in developing the theoretical framework, identifying the range of potential educational outcomes for students, and providing overall direction and focus. Many of this study's pre- and post-test survey items, for example, were based on the measures and educational constructs included in some of the previous studies.

Overall, the methodologies employed in previous studies helped in the conceptualization of a more comprehensive methodological approach to studying service programs. This more comprehensive approach resulted in the development of the Evaluation System for Experiential Education (ESEE). Designed specifically for this study, this system incorporates both qualitative and quantitative methods and builds upon the lessons learned from previous research studies. Because the same data collection and analysis techniques are used across a variety of service programs, a comparative analysis of educational outcomes across program types is possible. ESEE assesses program outcomes across all of the educational domains service programs are purported to affect — academic, vocational, social, personal, social, ethical, and civic development. It uses a variety of instruments and data sources as a means to capture the idiosyncratic essences of individual service programs while capturing broader, more generalizable data that are common to all service programs. The next chapter describes the development of this system and how it was used in this study.

CHAPTER THREE

METHODOLOGY

...It is getting harder to find any methodologists solidly encamped in one epistemology or the other. More and more "quantitative" methodologists, operating from a logical positivist stance, are using naturalistic and phenomenological approaches to complement tests, surveys, and structured interviews. On the other side, an increasing number of ethnographers and qualitative researchers are using predesigned conceptual frameworks and prestructured instrumentation, especially when dealing with more than one institution or community .

Matthew Miles & A. Michael Huberman, 1984, p. 20

Significance of the Study

The primary purpose of this research was to study previously unaddressed issues regarding the educational outcomes of various types of service programs for high school students. The study sought to go beyond the limited scope of previous studies by researching service programs in a more methodologically comprehensive way. Using multiple quantitative and qualitative measures, the study compared the educational development outcomes of students in four program categories:

- community service programs
- service-learning programs
- internship programs
- programs that do not provide service opportunities

The study measured students' development across six educational domains:

- academic development
- career development
- personal development
- social development
- civic responsibility
- ethical development

The constructs for each domain were based on the purported outcomes of service programs described in Chapter Two.

As a comparative analysis, this study has the potential of shedding new light on the possible ways different service programs affect students. Because it utilizes the same research instruments and measures across a variety of individual service programs, and because it includes a fairly large sample size ($n=529$), the results of this study are potentially more generalizable than previous study results. In addition, this study generated the development of the Evaluation System for Experiential Education (ESEE), a comprehensive assessment system that can measure the educational outcomes of students in *any* type of service program. As service programs become more prevalent in schools, it is hoped that the findings of this study will assist educators in making more well-informed judgments about the educational roles particular types of service programs play in K-12 education.

Research Questions

The study addressed two primary questions:

- 1) Are there significant differences in the educational development between students who perform service (of any type) and students who do not perform service?
- 2) Are there significant differences in the educational development of students who participate in different types of service programs?

These two questions guided the research design and data analysis.

The first question is designed to determine to what extent this research supports earlier research findings. While there is some research evidence which suggests that service programs, in general, have positive educational outcomes for students, the findings have not been definitive. For the most part, causal

links between youth service activities and students' educational outcomes remain weak (Shumer, 1994). Given the rise of service programs in K-12 education, this first question warrants further investigation.

The second question is designed to determine if particular types of service programs lend themselves to fostering particular student outcomes. For example, do community service programs tend to foster civic participation while internship programs tend to foster career development? This, too, is an important question since most service programs are designed and developed with certain educational goals in mind. Yet, as the research literature suggests, service programs often serve more than their *intended* purpose(s) (Berman, 1990; Mainzer et al., 1990). This second question will help determine if indeed there are significant differences in student outcomes among different types of service programs.

Embedded within each of the two questions central to this study are many subquestions — Which program type appears to have stronger outcomes for students? What program aspects (e.g., type of service activity, nature of student working relations, degree of integration with the curriculum, etc.) most influence program outcomes? — While these and other subquestions are interesting and have implications for practice, they are not a focus of this study. However, it is hoped that the findings of this study will help provide direction for future investigation of these and other subquestions that exist.

Recruitment

In the initial phase of the study, the researcher paid several preliminary visits to potential school sites in California to speak with service program coordinators about their programs. Six schools, all of which concurrently operate

the three program types central to this study — community service, service-learning, and internship — were invited to participate in the study. In addition, in order to establish some baseline data against which the outcomes of students in service programs could be compared, each of these schools had to identify a group of students who were not participating in any of the school's service programs. This group of students served as the comparison group.

Of the six schools initially invited for participation, a "participation agreement" was discussed with four schools (one in Los Angeles, one in Bakersfield, and two in the Bay Area). However due to problems with travel, concerns over confidentiality, a limited budget, schedule conflicts, and parental permission restrictions, data from only two schools (one in Southern California and one in Northern California) were ultimately used for this study. While preliminary data from the other schools were collected, these data were not used in this study. Nonetheless, the opportunity to visit these additional sites provided the researcher with a broad perspective of programmatic approaches that allowed for a better contextualization of the two schools ultimately included in this research. For example, visits to the four other schools revealed that service programs, regardless at which school they are situated, all deal with many of the same programmatic questions and issues: Which service activities are appropriate for the students? What will the requirements of the service program be? How will the students' service experiences be assessed? How will students get to and from their service sites?

To insure full cooperation from all constituents at the two schools, formal approval was obtained from the site principal, site service coordinators, teachers, parents, and wherever possible, the local community agencies at which students served. The researcher met with various school officials to discuss the study in detail. To secure their approval, the researcher agreed to various requests made

by each of the school site's administrators. These requests included having protocols pre-approved by teachers and/or administrators before they were administered to students, allowing the teachers to have veto power over the administration of any measure in the study, and fairly strict guidelines as to when, with whom, and where the researcher could collect data.

While these guidelines were an understandable attempt to protect the students, teachers and the school from any intrusions or disruptions the study might cause, these guidelines, at times, limited the researcher's ability to follow up on certain aspects of the programs. For example, the researcher was not always permitted to visit the classrooms at potentially informative times. At the start of the study, a pre-determined schedule for classroom and service site observations, student and teacher interviews, survey administration, was set. Changes in the schedule needed to be approved by the participating teachers and the site administrators ahead of time. In addition, the researcher was not permitted to make last minute improvements to protocols, without prior approval from the school officials. Most critically, the researcher was not permitted access to students' permanent records nor was he allowed to collect any data that concentrated on particular individual students. Completed students' responses to journals, for example, were sent to the researcher by the teachers with teacher constructed identification markings. The researcher was not privy to the names or nature of individual students. While the researcher knew from which class or program the journal data came, there was no way to match individual students' journal responses (or data from interviews, etc.) with the survey data.

Even though the confidentiality of all subjects was maintained throughout the research, parental permission had to be obtained in order to allow the high school students to participate fully in this study. In the end, 529 students, from

34 classes, taught by 24 different teachers at two schools sites (referred to in this study as North High School and South High School) agreed to and were eligible to participate fully in the study (See Chapter Four). The researcher met with all the participating teachers at their respective sites to review the research design and evaluation system that would be used in the study.

Research Design

The data collection began in September 1995 and ended in June 1996. During this period, the researcher made periodic visits to both sites to collect data. While the researcher made efforts to collect the various sources of data from both schools at similar points in time, the data collection process had to accommodate each school's schedule. Parental permission that allowed individual students to participate in the study was obtained by each school. The parental response rate for the two schools averaged 71%. This high response rate was due to the support and encouragement provided by each school's administrators. Every effort was made to ensure parents that students' participation would be confidential and that the unit of analysis for the study would be the students' program, not the students themselves. To ensure student confidentiality, each participating student was given a random "participation code" which was used to match their pre-survey and post-survey data. Each teacher was provided with a step by step guide book that included all the study instruments along with a timeline for the administration of each instrument. For the most part, teachers and their administrators were very cooperative in allowing the researcher to visit their classrooms, talk with them and their students, and interrupt their lessons with study questionnaires and surveys.

While students served as the primary source for data collection of program outcomes, teachers, administrators, and community based organizations served as secondary data sources. The use of multiple data sources allowed the researcher to capture varying perspectives on students' educational experiences in the programs. Despite strong cooperation from the schools' teachers and administrators, the data sets from a number of classes were incomplete; not every subject was able to complete every instrument used in the study. Nevertheless, the overall process secured enough data to allow for a fairly thorough comparative data analysis.

The Use of Quantitative and Qualitative Approaches

Given the complex and idiosyncratic nature of service programs, the researcher sought to collect a wide range of data from a variety of data sources by using quantitative and qualitative approaches. While the service field lacks definitive quantitative findings, quantitative analyses, in and of themselves, may not be able to capture the total essence of a service experience (Gray, 1996). According to Shumer (1994) and Hicks and Hirsch (1991), there is a limit to the depth of information one can gather about students simply through quantitative research. Hicks & Hirsch write, "Personal interviews and/or focus groups with students could provide a credible base of qualitative information to back up and flesh out the quantitative data, and substantiate the informal anecdotal evidence that currently exists" (1991, pp. 10-11). The corroboration of findings derived from a combination of quantitative and qualitative approaches could produce some strong evidence regarding the nature of service program outcomes. Therefore, along with collecting pre-/post-test survey data which were analyzed quantitatively, the study also collected data from focus group interviews,

samples of student work, responses to journal questions, and observations, all of which were analyzed qualitatively.

Methodological Challenges

The complex nature of young people's educational development poses serious challenges to researchers who seek to find causal linkages between what happens to students during school and actual changes in their overall behavior. Without a highly controlled experimental study design, definitive causal linkages are virtually impossible to affirm. And because human subjects' protocols are especially protective of young people, researchers who seek to study the educational development of children and adolescents become even more limited in both the methods they can employ and the assessment tools they can administer. The researcher of this study, for example, had to make several changes to the study protocols at the request of the school administrators. These changes included shortening the length of the student survey, making students' reporting of ethnicity optional, and rewording several journal questions which were deemed to be "too personal" in nature. In addition, the researcher had to make it clear to the participating students that they had the choice not to respond of any portion of the study that might make them feel uncomfortable.

One major obstacle during the study was the difficulty of adequately controlling for competing and confounding influences on students. Throughout their day, students are exposed to multiple settings simultaneous with their involvement in the service programs. To complicate matters further, the number and nature of students involved, the program start and end dates, the times of the day during which students were involved, and the types of service activities in which students engaged varied from classroom to classroom. This resulted in

a number of unanticipated variables that required consideration in the data analysis.

Unfortunately, the most effective means of controlling for these variables — an experimental design with random assignment of participants into control and experimental groups — was not feasible. As a result, the approach used for the study was a *quasi-experimental, nonequivalent-control-group design* that compared student outcomes at the start and end of the program. This approach allowed for the monitoring of the educational development of four groups of students as they progressed through their respective programs. Individual student's raw data were aggregated by program type — community service, service-learning, internship, no service — and compared across these program types to ascertain *program* patterns as they related to each of the six educational domains.

Another major challenge for this study was to find ways to collect useful data that would not significantly interfere with students' normal daily routines. The quasi-experimental design used in this study attempted to capture students' educational developmental patterns in their actual settings. This approach, referred to by Jean Lave (1988) as "socially situated cognition" (p. 313) sought to compare the outcomes of students at the same school who were involved in different types of service programs. In order for this research to be significant, the design needed to be able to incorporate a series of data collection techniques that could be understood and utilized by students of various ages (14-18), of varying ability levels, in a variety of school programs and courses (e.g., academic, vocational, etc.), and engaged in different kinds of service activities.

Another challenge was finding valid and reliable research instruments that could both capture students' educational development across six domains and be appropriate for administration to a large sample. After a review of close

to two hundred surveys, questionnaires, and tests, it became evident that no single existing instrument could measure all six domains key to this study. At one point, a battery of eight well-tested attitudinal survey instruments was considered for administration. However, given the ages of the students, this approach would have been impractical since the entire battery would have taken each student several hours to complete. Also, because the instruments were not designed specifically for students in service programs, each of the instruments in the battery contained several items that were inappropriate for this study. In addition, each of the test battery instruments utilized a different measurement scale, making any systematic data analysis very complicated.

Ultimately, a new quantitative survey instrument had to be developed. This new instrument pooled items from existing attitudinal surveys to form a comprehensive survey that could measure outcomes in six educational domains. This new instrument was supplemented subsequently with a series of qualitative instruments to ultimately form ESEE. ESEE (Evaluation System for Experiential Education) was an attempt to develop a comprehensive, multi-faceted approach to assessing educational outcomes of students in service programs (See Appendix A for a copy of ESEE's instruments, measures and protocols).

Data Sources and Data Collection

The Evaluation System for Experiential Education (ESEE) was developed because there was no available set of instruments, well-tested or otherwise, that could collect the most telling information on students' service experiences and assess the outcomes of these experiences as they relate to students' educational development. Basically, ESEE is a compilation of a variety of instruments, measures, and protocols that capture students' educational development through a variety of data sources. According to Edward Chittenden (1991), it is essential

that multiple strands of evidence be gathered when assessing student development over a period of time. Chittenden writes, "One legacy of conventional testing is the expectation that a uniform set of procedures, administered on a single occasion, can satisfy multiple and sometimes conflicting needs for information and evidence" (p. 26). Because this study sought to reveal how students evolve educationally throughout the course of their involvement in service activities, the periodic administration of ESEE's instruments (quantitative and qualitative) over the course of the year allowed for a fairly comprehensive assessment of students' progress.

ESEE includes a set of 11 data collection instruments, protocols, and approaches (see Table 3):

- 1) a researcher-designed student pre-test/post-test survey instrument;
- 2) student journals;
- 3) semi-structured focus group interviews;
- 4) a content analysis of samples of student produced work (papers, portfolios, and presentations);
- 5) a student placement questionnaire;
- 6) teachers' program goals and objectives;
- 7) classroom site visits and observations;
- 8) teacher focus group interviews;
- 9) a teacher questionnaire;
- 10) a community-based organization questionnaire; and
- 11) formal and informal meetings with site administrators.

These instruments and protocols were designed specifically to capture the full range of students' service experiences as they relate to each of the six educational domains. Together, they provided a comprehensive and rich data set that allowed for a variety of quantitative and qualitative analyses to be conducted. Collectively, these data captured the essences of individual programs while providing a mechanism to analyze different and distinct programs uniformly. In addition, they allowed the researcher to more fully understand and interpret the experiences of students within and across the various types of service programs.

TABLE 3: OVERVIEW OF INSTRUMENTS & ANALYSIS TECHNIQUES

I. DATA FROM STUDENTS

| INSTRUMENT | DESCRIPTION | PURPOSE | ANALYSIS TECHNIQUE |
|---|---|--|---|
| <p>1) a researcher-designed student pre-test/posttest survey instrument</p> <p>n= 283</p> | <p>Assessed students' attitudes towards school, their community, themselves, and other across six educational domains: academic, career, personal, social, civic, & ethical development. Contained 41 items, questions about student demographics, and some open ended questions. Post-test had same items plus some questions that asked students about the effects of service on their lives.</p> | <p>Allowed for a uniform quantitative analysis of student outcomes in six domains, over a one year period, between three service program types and a comparison group.</p> | <p>Controlling for gender, ethnicity, and school site, as well as grade level and pre-test score differences, an ANCOVA was conducted for each of the six domains to determine significant difference (p= .05) between groups in post-test results. Controlling for same variables, an ANCOVA was conducted for each domain to determine if outcomes for four program types (community service, service-learning, internships, and no service) were equal among groups.</p> |
| <p>2) student journals (8 questions)</p> <p>#1 n=412 #2 n=203 #3 n=162 #4 n=274 #5 n=112 #6 n=309 #7 n=365 #8 n=324</p> | <p>Students responded to eight uniform questions that focused on students experiences in the program. (The comparison group responded to five out of eight questions). The questions are sequential in that they attempted to track students' progress throughout the term.</p> | <p>Provided an opportunity for students to describe their experiences in detail (unlike the pre-/post-surveys). By having students respond to the same questions, comparisons among students' responses could be made.</p> | <p>Qualitative review of journal entries. Entries were coded based on references made to each of the six educational domains. Data were placed in a meta-matrix for comparison with qualitative data from other instruments and data sources. Themes and patterns that emerged were noted, coded, and labeled.</p> |

TABLE 3: OVERVIEW OF INSTRUMENTS & ANALYSIS TECHNIQUES (continued)

I. STUDENTS (continued)

| INSTRUMENT | DESCRIPTION | PURPOSE | ANALYSIS TECHNIQUE |
|--|--|--|--|
| 3) semi-structured focus group interviews <i>n=64</i> | Students addressed a series of questions related to their experiences in the program, the impact of the program on their development, and reflections on the service process. | Provided the researcher an opportunity to gather more in-depth data from students. It also provided the researcher to investigate pertinent issues not addressed in the journals or surveys. | Interviews were recorded and transcribed verbatim. (All identifiable material was removed). Transcripts were coded based on references made to each of the six educational domains. Data were placed in a meta-matrix for comparison with qualitative data from other instruments and data sources. Themes and patterns that emerged were noted, coded, and labeled. |
| 4) a content analysis of samples of student produced work (papers, portfolios, and presentations). <i>representing 109 students</i> | As part of their course, students were asked to share their work at various times throughout the semester. This sharing came in the form of classroom presentations, essays, product of a service project (e.g., mural), and/or portfolios. The researcher visited classrooms on several occasions to observe students' presentations. | Allowed for a broad analysis of students' depth of thinking in regards to the topics at hand. Analyses of student work helped address questions like "Is the work of students in service more sophisticated or well-thought out than that of students in the control group?" | General descriptions about the quality and sophistication of students' work was noted. Any information that revealed student impacts related to the six educational domains were entered into the meta matrix. Data were compared with qualitative data from other instruments and data sources. Themes and patterns that emerged were noted, coded, and labeled. |
| 5) a student placement questionnaire <i>n= 227</i> | Students were asked to indicate: numbers of hours per week they served; what activities they engaged in; whether they served alone or with others, and what challenges they confronted. | Information was used to determine the significance to which each of these variable correlates with student outcomes. | References to outcomes in the six domains were entered into the meta-matrix and compared with data in other cells. Themes and patterns that emerged were noted, coded, and labeled. |

TABLE 3: OVERVIEW OF INSTRUMENTS & ANALYSIS TECHNIQUES (continued)

II. TEACHERS

| INSTRUMENT | DESCRIPTION | PURPOSE | ANALYSIS TECHNIQUE |
|--|--|---|---|
| <p>6) teachers' program goals and objectives</p> <p><i>n=15 teachers (17 classrooms/ programs)</i></p> | <p>Teachers were asked to identify the goals and objectives for their program. They were asked to define their program's goals and objectives, describe how students' learning and service activities would be integrated into the curriculum, and to reveal what data sources they would have available to assess student outcomes.</p> | <p>This information helped the researcher determine the type of service program (cs, s-l, internship) as well as provided important descriptive data about the program which helped the researcher determine the similarities and differences among programs and program types.</p> | <p>The goals and objectives were used primarily as descriptive data.</p> |
| <p>7) classroom site visits and observations</p> <p><i>n=7 visits</i></p> | <p>The researcher visited a sample of classrooms in each program type to document any evidence related to student development in the six educational domains.</p> | <p>The visitations allowed the researcher to gain descriptive data about the programs as well as to gather information that might supplement or support other findings. It also provided the opportunity to further investigate any data that were interesting or appeared out of the ordinary.</p> | <p>Informal notes were taken. Display of information from students or teachers that revealed information about any of the six educational domains being investigated were placed in the appropriate meta-matrix cell for comparison with other data. Themes and patterns that emerged were noted, coded, and labeled.</p> |
| <p>8) semi-structured teacher focus group interviews</p> <p><i>n=13 teachers</i></p> | <p>Teachers were asked a series of questions about experiential education as a pedagogy, assessment and evaluation of student performance, incorporation of service into the academic curriculum, the effects of service on students, and suggestions for the future.</p> | <p>Provided an opportunity for the researcher to capture additional data on student development in the six domains. It also provided the teachers the opportunity to share with the researcher any issues not asked for in the teacher questionnaire.</p> | <p>Data which provided information on students' educational development were placed in data matrix. Themes and patterns that emerged were noted, coded, and labeled. Other data were used for descriptive purposes and for further contextualization of the programs.</p> |

TABLE 3: OVERVIEW OF INSTRUMENTS & ANALYSIS TECHNIQUES (continued)

II. TEACHERS (continued)

| INSTRUMENT | DESCRIPTION | PURPOSE | ANALYSIS TECHNIQUE |
|---|---|--|---|
| 9) a teacher questionnaire <i>n=7 teachers</i> | Some teachers completed a brief questionnaire that asked them to relay students' development in each of the six educational domains. Teachers were asked to provide specific examples of student development. | This information supplemented findings from other data. The data provided the researcher with the teachers' perspectives regarding the impact of service activities on students. | Data which provided information on students' educational development were placed in data matrix. Emerging themes and patterns that emerged were noted, coded, and labeled. Other data were used for descriptive purposes for further program contextualization. |

III. COMMUNITY ORGANIZATIONS

| | | | |
|--|---|---|--|
| 10) a community-based organization questionnaire <i>questionnaire (n=0)</i> <i>phone int. ((n=11)</i> <i>other (n=17)</i> | A short survey was designed to assess the community agency representatives' perspective on students' effective in the service placements. However, due to school rules, the questionnaire could not be sent out. (Both site administrators believed this would violate the agreement of maintaining participant anonymity since students would have be identified by name). | To assess the agencies' perspective on how service impacted the students and how the service program helped the community. Phone interviews with community agency reps (n=11) were conducted instead. Letters of appreciation and logs from calls from community agencies were also analyzed. | Questionnaire was not included in the study. Data from phone interviews, phone logs, and agency letters, that referred to student development in the educational domains were entered into the meta-matrix and were considered in the cross-cell data analysis. The other data were used for descriptive purposes. |
|--|---|---|--|

IV. ADMINISTRATORS

| | | | |
|---|--|--|--|
| 11) formal and informal meetings with site administrators | Administrators (program coordinators, vice principals, and principals) were asked a series of questions. | To gain an understanding of the program's history and administrator's level of support. Interviews allowed the researcher to hear administrator's observations of the program's effect on student development. | Most data were used for descriptive purposes. Data which provided information on students' educational development were placed in data matrix. Themes and patterns were noted, coded, and labeled. |
|---|--|--|--|

The comprehensiveness of ESEE is revealed in Table 3 which lists each data source, describes the collection technique employed, provides a rationale or purpose for each technique, and describes how the collected evidence was analyzed. As Table 3 shows, each datum serves a variety of purposes. While most of the data are used to make assertions about student development in each of the six educational domains, some of the data are used for descriptive purposes only. Because data were collected from students, teachers, administrators, and community-based organizations, strong corroboration among these data sources help strengthen the power of the findings.

Data Collected From Students

A series of data was collected from students. First, in an effort to obtain a uniform, quantitative data set among students across programs and across schools, two student attitudinal surveys were administered, each approximately 25 minutes in length. A pre-test was administered at the start of the term, before the students engaged in the service activity. The post-test was administered at about the time students were ending their service experience. The pre- and post-tests are identical except for some additional reflective questions on the post-test. The survey asks students to indicate their attitudes towards school and their local community as well as indicate attitudes about themselves and others. The survey is made up of 41 items that measure students' attitudes across the six aforementioned development domains (Refer to Appendix A.1a and A.1b for a copy of the survey).

The pre- and post-surveys used in this study were developed by the researcher over a two-year period. The researcher sought to find survey items that could measure outcomes aligned with the intended goals of service programs (See Chapter Two). Initially 140 survey items were considered. The

majority of these items were taken directly from a number of relevant, previously tested survey instruments (e.g., Rosenberg Self-Esteem Test, Pier-Harris Children's Self-Concept Scale, etc.).

An analysis of these items was conducted to determine the range of constructs that were being measured. The analysis involved identifying and labeling the construct(s) that each item measured and then categorizing those constructs into six educational domains: academic, career, social, personal, ethical, and civic. The survey items were then grouped within these domains. Survey items which measured constructs that fell into more than one domain were marked as multi-dimensional and were considered as items for each of the domains into which they fell.

To create a pilot survey of reasonable length (30-45 minutes long), the items in each domain that most directly addressed the goals of service programs were marked as "dominant" items. For example, the item "When I see something wrong or unfair happening to someone else, I usually try to do something about it" was seen as directly addressing civic responsibility. Items that addressed the goals more indirectly were marked as "secondary" items. All remaining items were eliminated.

Based on this analysis, a 60-item pre-test survey was developed. This survey was piloted among 25 high school students. Based on feedback from these students, the pilot survey was revised (e.g., questions were reworded, survey format was changed) to create the 41 item pre-test and post-test surveys used in this study. In brief, the 41-item student survey consisted of the following constructs:

- *Academic domain*

The survey sought to measure changes in students' attitudes and motivation toward school and learning, understanding of relevance of academic content, and overall school performance;

•*Career domain*

The survey sought to measure changes in students' formulation of career plans and emphasis on finding a career that was personally rewarding and/or beneficial to others;

•*Ethical domain*

The survey sought to measure changes in students' attitudes toward standing up for what is right, willingness to participate on behalf of justice, and their ability to better distinguish between right and wrong, and good and bad.

•*Social domain*

The survey sought to measure changes in students' ability to work with others and attitudes toward those who are culturally and racially different.

•*Personal domain*

The survey sought to measure changes in students' self-esteem, self-concept, sense of self-empowerment, and overall leadership skills.

•*Civic participation domain*

The survey sought to measure changes in students' awareness of societal issues and willingness to take on active roles in the community;

Of the 41 items, twelve simultaneously measured constructs in *two* of the six educational domains. Two survey items (in Section III, #17 and #29) measured aspects of *three* domains (See Appendix B). Since the six domains were considered to be independent from each other and would be therefore be

analyzed individually, the researcher decided that these "overlapping" items would be included in the measurement of all domains into which they fell. For example, a survey item that measured constructs in both the social and personal domains (e.g., I usually feel uncomfortable starting conversations with people I do not know) was included in the analyses of students' social development *and* personal development. (A list of these items and the domains which they measure is provided in Appendix B).

A reliability test of the 41-item pre-survey was conducted.¹ This process produced reliability values for each domain and indicated which survey items would contribute to the internal consistency of each of the 6 domains. The items which were found to contribute most to the survey's reliability were employed for the final data analysis; the remainder of the items were eliminated. Table 4 indicates the results of the reliability tests for each of the six domains:

Table 4: Reliability Test of Survey Items

| DOMAIN DOMAIN | ORIGINAL # OF ITEMS | # OF ITEMS IN FINAL ANALYSIS | CRONBACH ALPHA |
|------------------|------------------------|---------------------------------|-------------------|
| Academic | 9 | 8 | .67 |
| Career | 10 | 8 | .54 |
| Ethical | 8 | 7 | .72 |
| Social | 9 | 8 | .43 |
| Personal | 14 | 13 | .59 |
| Civic | 7 | 6 | .71 |

A list of the original and "final analysis" survey items is provided in Appendix C.

¹All the ESEE protocols, including the revised pre- and post- surveys, were adopted by the Service-Learning Research and Development Center at UC Berkeley to assess educational outcomes of students (N=1071) in various types of service programs across California. The pre-survey data from these assessments were used to determine the survey's reliability in each of the six educational domains.

While not highly reliable, the primary goal was to develop a respectable, reliable instrument of reasonable length that could adequately assess student attitudes regarding several constructs across six developmental domains. It should be noted that constructing such an instrument posed many difficulties. While adding more items to the survey for each domain would almost certainly improve the reliability of the survey, the longer the survey got, the less likely students would be interested in completing the survey. In addition, since the survey would be only one of eleven measures to consider, the limited reliability of the survey was not considered to pose a serious threat to the strength of the overall results. And given that this survey was the only one available that attempts to measure outcomes across all six domains, its inclusion was considered more desirable than its exclusion.

Along with the survey administration, other complementary data from students included information from direct observations, interviews, journal entries, samples of student work and completed field placement forms. Each of these sources of data provided the researcher with additional information about the various aspects of the program and the students' individual experiences. The direct observations, for example, involved three or four visits (up to 3 hours) to each of the two school sites. The researcher served as participant observer in the school setting, focusing on those students participating in the study. The observations and spontaneous conversations are recorded in field notes during natural contexts. In all cases, the researcher sought to capture evidence of student development in each of the six developmental areas. Remarks from students, nature of student interactions, comments from the teachers, and other references to students' progress in the various domains were all noted. Because the emphasis of the research was on capturing the educational outcomes of individual service programs and not on assessing the nature of individual

students' progress, great efforts were made to respect students' privacy. Therefore, the use of students' and teachers' names was avoided in the field notes. Because all data results are reported in the aggregate by school (North High School and South High School) and by service program type (community service, service-learning, internship, and control), individual pieces of data cannot be connected with specific students.

At each of the two school sites, four student focus group interviews were conducted using a sample of 32 students from each site. The interviews were conducted in groups of eight according to the type of service program in which the students were enrolled (8 students per each of the four groups studied). The interview participants all were students who agreed to engage in a 30-minute group interview that explored answers to various questions related to their service experiences (See Appendix A.3 for sample of student focus group interview protocol). While the students' teachers were present during the administration of the pre-test and post-test surveys, they were not present at the group interviews. This was done to help put students at ease and to encourage students to respond as honestly as possible about their experiences. In addition to these interviews, a number of teachers allowed for their entire class to be interviewed. All interviews were recorded and transcribed. All names and identifiable information were not included in the transcriptions.

Finally, additional data on students' educational development were collected through an examination of documents including a student service placement form, curricular materials, administrative notices, school publications, student writings, student journals, artwork, and portfolios. These sources did not include students' names and were offered to the researcher by the teachers as a general representation of student work from each program type. Much of this

data provided the researcher with direction for developing probing questions for the student and teacher focus group interviews.

Data Collected From Teachers

To determine how teachers perceive the impact of service activities on students, teachers were asked to participate in a short interview which was designed to help provide the researcher with a clearer sense of the nature of the course (see Appendix A.6 for sample of teacher focus group interview protocol). In addition, all participating teachers were asked to complete a brief questionnaire which asked them to provide examples of the various ways students have developed through service. All references to or descriptions of any of the six educational domains that were indicated on the questionnaire were coded (See Data Analysis and Display Section).

Data Collected From Administrators

The researcher was able to collect data about the program from site coordinators through informal one-on-one interviews. These site coordinators served as a liaison between the researcher and the teachers. They provided valuable information about their perceptions of the individual programs. While much of the collected data from them were used for descriptive purposes, any clear references to student outcomes were noted.

Data Collected From Community-based Organizations

Because a goal of service programs is to meet community needs, it is essential to hear the community's perspective about the program and the students who participate. Representatives from community-based organizations provide first-hand observations of what students learn as students serve. The

ability to capture information from community organizations was limited. The community agency survey included in ESEE could not be sent due to school rules at one of the sites. However, a small number of face-to-face and phone interviews were conducted with representatives from community agencies. Unfortunately, the interviews were limited in scope and small in sample size. Nevertheless, although the interview findings were not considered to be representative of the entire community-based organization population, the information from these interviews, along with data from letters of appreciation and personal calls from community agency representatives, were analyzed and considered in drawing conclusions about programs' affects on students.

Data Analysis and Data Display

The hypotheses reflected in the research questions shaped the initial research design, data collection, and data analysis processes. Through an inductive data analysis approach, which combines the processes of data collection and data analysis, the analysis process involved traditional quantitative statistical analyses and employed a variety of qualitative data analysis techniques. As Table 3 revealed, each measure and source of data was analyzed through an approach appropriate for the type of information collected. For example, the survey pre-test and post-test data were analyzed quantitatively through analyses of covariance (ANCOVA's) to measure differences in educational outcomes among students participating in the different types of service programs. Observations, journals, and interviews, on the other hand, provided qualitative data for content analyses.

The content analyses of the qualitative data generated categories, themes, hypotheses, and properties about the students' service experiences across the

programs. Data reduction (selecting and transforming raw data) occurred during and after the collection of the data. Throughout the study, anticipatory data reduction — making decisions regarding what people, settings, events, time period, and processes should be further investigated — was employed. Once reduced, the data information was assembled, coded, and organized into categories whereupon the categories were analyzed and conclusions were drawn. These conclusions are discussed fully in Chapter Five.

Quantitative Data Analysis

The quantitative data analyses focused on answering the two questions central to this study. The first question explored differences in outcomes between students who perform service and students who do not.

Question (1): Are there significant differences in educational outcomes between students who perform service (of any type) and students who do not perform service?

In hypothesis form, the equations for this question are as follows:

$$H_0: \mu_{\text{service}} = \mu_{\text{no service}}$$

$$H_1: \mu_{\text{service}} \neq \mu_{\text{no service}}$$

To address this question, students' pre-test and post-test data were submitted to an analysis of covariance (ANCOVA) for each of the six domains. To control for initial student differences between the two groups, a set of variables including gender, ethnicity, and school site were used as conditions with grade level and students' pre-test scores as covariates.

Using the same pre- and post-test data, and employing the same conditions and covariates, an ANCOVA was conducted for each of the six educational domains to address the second question of the study:

Question (2): Are there significant differences in educational outcomes among students in different types of service programs?

This question sought to determine whether certain types of service programs tend to foster outcomes in particular educational domains. In hypothesis form, the equation for this question is as follows:

$$H_0: \mu_{cs} = \mu_{sl} = \mu_i = \mu_{ns}$$

(where cs = community service, sl = service-learning, i = internships, ns = no service).

H₁: the means of the program types are not all equal

These questions were asked for each of the six educational domains. They also guided the qualitative data analyses.

Preparing Survey Scores for Quantitative Analysis

The process to prepare each student's survey scores for the ANCOVA in each domain is described below:

1) Each student's post-test item scores were grouped by domain, based on the survey item analysis described earlier. For example, a post-test score for an item that measured academic development was grouped with the other item post-test scores from survey items that measured academic development; a post-test score for an item that measured personal development was grouped with the other item post-test scores from survey items that measured personal development, and so forth. (See Appendix C for a breakdown of survey items into the six domains). Items that measured more than one domain were placed in all the domain groups they measured. The number of survey items used in the final analysis for each of the six domain groups were listed in Table 4. For each domain, the resulting scores were added together and then were divided by the number of survey items in that domain to arrive at a *post-test domain score* (six domain scores for each student).

2) To derive each student's six *pre-test domain scores*, the same process was employed using each student's *pre-test item scores*.

The Analyses of Covariance

Students' pre-test domain scores and post-test domain scores were submitted to six ANCOVA's (one for each domain). To control for initial differences between the groups studied (e.g., service/no service), gender, ethnicity, and school site were used as conditions with grade level and students' pre-test domain scores as covariates. ANCOVA's were conducted for each educational domain to determine if outcome differences between groups were significant at the .05 significance level. To test the null hypothesis that addresses the first question of the study, the community service, service-learning, and internship student groups were combined to form the *service* group (n=158). A group of students who did not participate in a service program served as the *no service* or comparison group (n=125).

To test the null hypothesis for the study's second question, the three service groups were considered separately according to the service program type they represented. The no service group remained intact and was used a comparison group (fourth group). If significant differences at the .05 significance level were found between any of the four groups in any domain, the Tukey Test was performed. The Tukey Test allowed for comparison of all possible pair-wise combinations of the program types (six pairs in all) to determine between which groups (e.g. between service-learning and community service) the significant differences lay.

All significant quantitative findings from these ANCOVA's were noted and were then compared with the findings from the qualitative data analyses.

Because the reliability of the survey instrument (for each domain) was fair, at best, significant survey findings, in and of themselves, were considered encouraging but not definitive. When the quantitative and qualitative findings corroborated, the results were considered to be more conclusive.

Qualitative Data Analysis

The qualitative data were analyzed throughout the data collection phase. Based on recurring patterns among the data, all journal, interview, and observation data were reduced and placed into what Miles and Huberman (1984) call a "meta-matrix". A meta-matrix provides a means to organize large quantities of data so that systematic analyses can be performed. Miles and Huberman (1984) write,

Cross-site (or cross-case) analysis multiplies the data set by as many single sites as are in a study...Before this amount of data can be analyzed it has to be *managed*....Meta-matrices are master charts assembling descriptive data from each of several sites in a standard format. The basic principle is *inclusion* of all relevant data...From there, the analyst usually moves to *partition* the data further (divide it in new ways) and *cluster* data that fall together so that contrasts between sets of sites on variables of interest can come clearer. These partitioned and clustered meta-matrices are progressively more refined, and entail some transformations of narrative text into short quotes, summarizing phrases, ratings, and symbols. (pp. 151-152).

The meta-matrix provided a framework for organizing information from all the measures and data sources. Along with helping to sort out the outcomes of each service program type in each of the six educational domains, the meta-matrix helped the researcher identify other recurring themes among the data. To help describe the meta-matrix data display process, a framework which lays out how the data from each of the data sources were displayed is presented below (See Table 5).

Table 5: Partial Meta-Matrix Layout for Qualitative Data Cells

| | | DATA SOURCE | | | |
|-------------------|----------|------------------|--------------------|-------------------------|--------------------|
| | | Student Journals | Student Interviews | Samples of Student Work | Teacher Interviews |
| COMMUNITY SERVICE | Academ. | 1 | 25 | 49 | 73 |
| | Career | 2 | 26 | 50 | 74 |
| | Personal | 3 | 27 | 51 | 75 |
| | Social | 4 | 28 | 52 | 76 |
| | Ethical | 5 | 29 | 53 | 77 |
| | Civic | 6 | 30 | 54 | 78 |
| SERVICE-LEARNING | Academ. | 7 | 31 | 55 | 79 |
| | Career | 8 | 32 | 56 | 80 |
| | Personal | 9 | 33 | 57 | 81 |
| | Social | 10 | 34 | 58 | 82 |
| | Ethical | 11 | 35 | 59 | 83 |
| | Civic | 12 | 36 | 60 | 84 |
| INTERNSHIP | Academ. | 13 | 37 | 61 | 85 |
| | Career | 14 | 38 | 62 | 86 |
| | Personal | 15 | 39 | 63 | 87 |
| | Social | 16 | 40 | 64 | 88 |
| | Ethical | 17 | 41 | 65 | 89 |
| | Civic | 18 | 42 | 66 | 90 |
| NO SERVICE | Academ. | 19 | 43 | 67 | 91 |
| | Career | 20 | 44 | 68 | 92 |
| | Personal | 21 | 45 | 69 | 93 |
| | Social | 22 | 46 | 70 | 94 |
| | Ethical | 23 | 47 | 71 | 95 |
| | Civic | 24 | 48 | 72 | 96 |

Within each of the numbered cells, all the relevant information from the specified data source, as it relates to the program type and educational domain, was entered. As the data were analyzed, quotes, observations, and other relevant information were sorted in a "cell" corresponding to the type of service program

and educational domain to which the data referred. For example, data garnered from interviews of students in community service programs that provided information on students' academic development were placed in cell number 25. If the data from these interviews referred to students' civic development, then that information would be placed in cell number 30. The meta-matrix allowed for an enormous amount of data to be sorted and categorized as it was being collected throughout the course of the study. In addition, the organization of the data in this manner not only allowed the researcher to observe central themes within each cell, but it also facilitated the comparing of themes across the various service program types, educational domains, and data sources.

Criteria for Selecting Cell Data

Basically, each meta-matrix cell was simply a pad of paper on which particular pieces of data were recorded systematically. On each numbered pad, all the *significant* information, relevant to the program type and educational domain, were recorded. Only data that were considered *significant* were placed in appropriate cells for analysis. To be considered significant, the data had to meet both of the following criteria:

- (1) The datum had to make a clear and overt statement, comment, or observation (positive, negative, or neutral) about students' development in one or more of the six educational domains.
- (2) The statement, comment, or observation had to be clearly attributable to the programs that were being studied.

Some of the more generic pieces of information (about 10% of the data) did not meet these criteria. Therefore, they were excluded from the meta-matrix and were not part of the data analysis process. For example, interview comments or journal entries stating that the service program was "a great experience", "very

exciting", "a lot of fun", "helpful", and "cool" were not included in the matrix unless such statements were qualified with more specific comments directly tied to the six educational domains. In other cases, comments which might have referred to an educational domain (e.g., "I really learned a lot about science....I'm starting to like it more), but did not make any specific reference to the programs being studied (and therefore not attributable to the program), also were not recorded onto the matrix. Again, the data recorded on the matrix had to be overt statements about *both* the particular program in which students were enrolled and its educational outcome(s) for students. These criteria allowed the researcher to set some standards for the information that would be included in the meta-matrix cells. Given the enormous amount of data that was collected, these criteria ensured that the only that information which would help address the study's two main questions would be recorded. Besides having to meet these two criteria, no other filtering process was used in the data recording process.

Organization of Individual Data

Within each cell, each data entry was numbered with a code, based on the program and data source (student, teacher, community agent) who contributed the information. This reference code allowed the researcher to return to the original data source for contextualization. These numbered entries also allowed the researcher to account for the number of subjects and classrooms represented in each cell. In addition, because of the reductive nature of the meta-matrix approach, strong efforts had to be made not to decontextualize data into minute pieces of information. Whenever possible, relevant bits and pieces of individual interviews, journal entries, observations, and student work samples were strung together to provide a more contextualized and holistic representation of the data collected.

One major challenge to using the meta-matrix approach was determining what to do with one datum that touched on more than one educational domain. For example, in one journal, Student #N69 wrote the following about his/her history service-learning class:

The class is fun because I get to help other people. Specially when I help those who need it..... Mrs. [Smith]'s a good teacher because I learn a lot from her.... She helps me with my service project and my homework.... She's showed off my project to the whole class last week...I got an A on my [history] test because of her class.... I like her class because my friends are here. We get to work on projects together and thats fun.

In this journal entry, the student indicates that the class has affected him/her in getting a good grade on a test (academic development). There is also some indication that this service-learning class helps the student feel good about himself/herself (personal development) and provides a positive social atmosphere (social development) for the student. The meta-matrix approach suggests that this entry be broken down into several components (by educational domain), placing each component into a different cell. While this approach helps categorize the data into manageable parts, this approach, in its final layout, assumes that each educational domain is independent of each other. For the researcher, this raised the question of whether one can separate out students' development in such a way. In other words, to what degree might a student's personal development in the class affect his/her academic and/or social development? Such confounding influences on students' educational development, coupled with the lack of precision in determining attribution for particular student developments (e.g., was it the service activity that contributed to the student's personal development or was it the teacher's praise of the service project) all made the data analysis of this study very complicated.

One solution to address this issue was to pay special attention to data that were multi-dimensional. The researcher noted each of these data with cross-cell reference codes and conducted a brief analysis to determine if any patterns existed among these data. For example, were data on personal development usually linked with data on students' social development? While such issues went beyond the scope of this study, obvious and interesting connections among the domains were pursued further with additional analyses.

The Data Analysis Process

The qualitative data analysis utilized an inductive approach. Rather than working from a framework of underlying assumptions (e.g., community service programs tend to foster civic responsibility while internships tend to foster career development), all significant patterns, regardless of whether they supported or challenged existing assumptions, were analyzed. Emergent patterns and themes were color coded and then labeled. In order to reduce the likelihood that the identified themes would not be subjected to researcher-bias, the themes and supporting data were presented to several colleagues during the study. Their input assisted in refining the themes, identifying alternative interpretations, and presenting alternative methodologies for analyzing the data.

Once all the data were recorded into the various meta-matrix cells, the data from one cell (based on a program type and educational domain) were compared with the data from the other cells within that program type and educational domain. For example, all the data on academic achievement in community service programs across the various data sources and instruments (student journals, teacher interviews, etc.) were compared. Through this comparative analysis, the researcher looked for common themes among the cells. These central themes provided a means for the researcher to reduce all the data

into manageable portions. Once the analyses were conducted within each domain and program type, cross-analysis were conducted *among* the various types of programs and educational domains. While the meta-matrix approach to organizing the data was very cumbersome, it did help the researcher maintain some order to the data analysis and it did provide a means to systematically reduce the data into smaller and more manageable portions. Once all the data were reduced into central themes, the educational outcomes of the various programs could be determined. Overall, the meta-matrix approach facilitated multiple cross-sectional comparisons and provided some insights into the differences and similarities in outcomes among the different types of service programs.

Throughout the course of the investigation, numerous questions emerged which suggested that additional measures and data sources perhaps should be added to ESEE (e.g., focus group interviews of community members). In addition, although there was opportunity to gather additional information about other interesting aspects of the service programs (e.g., How do service programs affect the culture of the school? Do service programs change a teacher's attitude toward his/her profession? Do service programs foster a closer relationship between a school and its community?), the researcher decided to focus the analysis solely on the issues relating directly to the two main questions and central hypotheses of this study.

Nevertheless, it was difficult not to constantly wonder to what degree the theoretical foundations described in Chapter Two influenced the programs' educational outcomes for students. Given all the possible interpretations, theories, and questions to consider, — How does the use of cooperative learning in students' other classes influence their educational outcome in the service class, and how might this affect or skew the results of this study? — it was difficult not

to continually question the various assumptions underlying this study. Therefore, while focusing on addressing the questions central to the study, the data were also analyzed with a critical eye that searched for alternative explanations and hypotheses regarding students' educational development.

Emerging Themes

Several themes emerged from the data analysis that provided useful information regarding the educational outcomes of service programs (See Chapter Five). While some of these themes are not categorically fixed within the original six educational domains, they reflect important educational issues that help bring understanding to the ways in which service programs might affect students. After identifying these themes, the data were re-analyzed to see how each theme played out among the various data sources. Sections within journals, interview transcripts, student work samples, and observation notes were each color coded based on the identified theme.

The various themes, as they appeared among the cells, were then sorted, categorized, and labeled. The labels given to each theme were aimed at accurately capturing the essence of what the data were displaying. Samples of each data source were reviewed again to ensure that the labels accurately fit the data. Special attention was paid to cases where the themes overlapped. In these cases, the themes were identified with cross-cell references and were analyzed critically to determine in which category they might fit best. Reviewing and revisiting data samples throughout the analysis allowed for initial interpretations to be altered or confirmed.

As will be discussed in Chapter Five, the inductive approach to data analysis established a set of themes that shed some new light on how community service, service-learning, and internship programs affect students in each of the

six domains. The themes suggest that there may not be a direct link between service program activities and educational outcomes. Instead, it appears that service activities more directly influence students' motivation to learn, their sense of empowerment, their feeling of making a contribution to the world, and their understanding of how school work relates to real-life. By influencing these aspects, service programs may provide to students the foundations that can ultimately lead to better academic, career, social, personal, civic, and ethical development.

These interesting study findings provide some new insights into the educational outcomes of service programs for high school students. In addition, the findings may help provide a basis for developing a theory for studying the impacts of service programs. However, before discussing these findings, a brief overview of the subjects, school sites, and service programs included in this study is provided.

CHAPTER FOUR

THE SUBJECTS AND THEIR SERVICE PROGRAMS

Every school in America will ensure that all students learn to use their minds well so they may be prepared for responsible citizenship, further learning, and productive employment."

Goals 2000: Educate America Act, 1993

To provide some context, this chapter provides a brief overview of the participating schools, the students, and their service activities. Overall, 529 high school students participated in the study. The students were part of 34 classrooms and programs operating at two California high schools.

The Participating School Sites

The two schools participating in this study, South High School and North High School, are comparable in a number of ways². Both schools are progressive schools that have a number of educational reform efforts underway—school within schools, site-based management, and school restructuring (SB 1274). Among the various reforms, each has embraced experiential education as a legitimate and viable approach to schooling. Consequently, both schools have strong connections with their local communities, have well-established

² In order to protect the identities of the schools involved in this study, North High School and South High School are used here as pseudonyms.

school/community partnerships, and believe in the active engagement of students in the learning process. In addition, both sites are structured with schools within the school, allowing for students to group themselves into smaller learning units according to future academic or career goals. These two schools were selected for the study because each concurrently offers its students community service, service-learning, and internship opportunities. In addition, each site was also able to identify a group of students who were not engaged in any service program and who were willing to participate in the study.

Both schools offer students a range of service experiences within each service program type. At both sites, the service programs are widely recognized, valued and part of the schools' educational mission. Despite their similarities in organizational structure and educational philosophy, the two schools differ in size, student demographics, and community location. While North High School is a discreet suburban neighborhood school located in a tight knit community, South High School is a widely-recognized large comprehensive urban high school that attracts students from all over the city. Selected demographics of the two schools are contrasted in Table 6.

South High School

As a large school that serves over 4000 students, South High School provides its students with a broad range of experiential education opportunities. The school focuses on what it calls "powerful teaching and learning" with an emphasis on school-wide learner outcomes in academics, citizenship, and workplace skills. According to one of the school's brochures, the school's goal is "for all staff to acquire pedagogy that encourages active pursuit of excellence" and to connect students to the real world, provide them with career skills, and

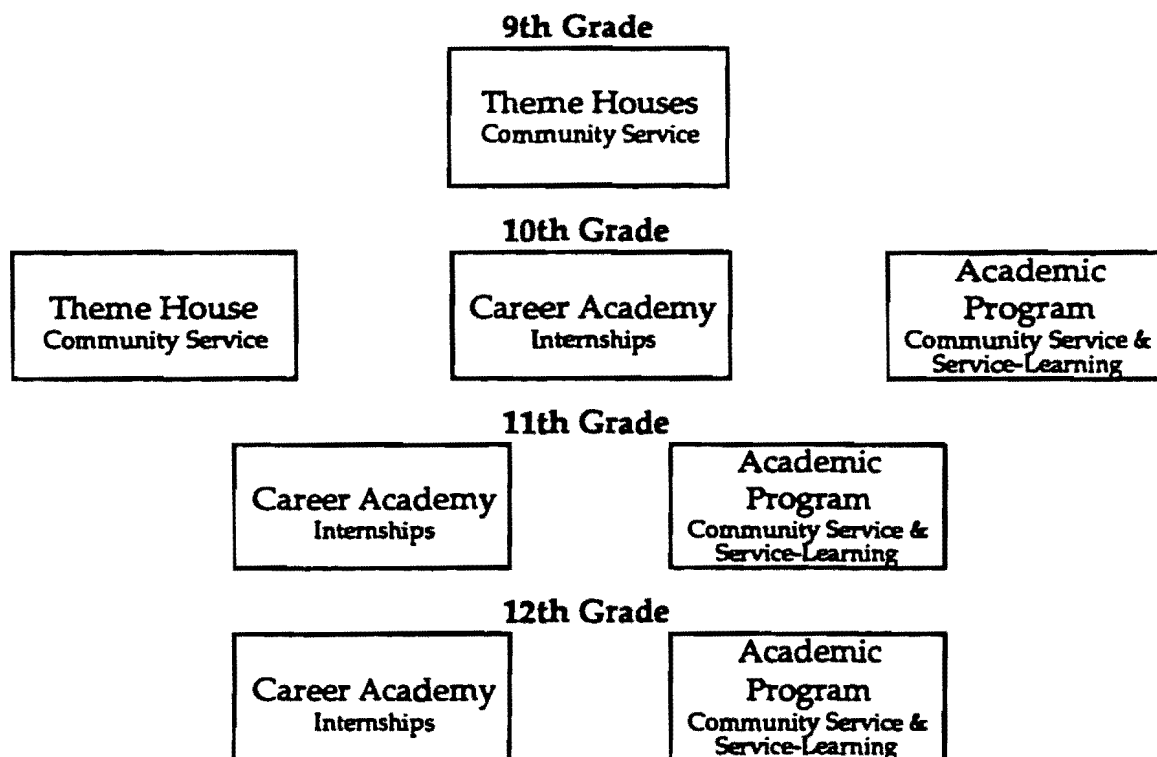
Table 6: Demographics of Participating Schools

| | South High School | North High School |
|---|--|---|
| DEMOGRAPHICS | | |
| Total # of Students (ADA) | 4017 | 1650 |
| Ethnic/Racial Breakdown of Student Body | 2% African-Amer. 15% Anglo 23% Asian/Pacific Islander 59% Hispanic/Latino 1% Other (includes American Indian, Alaskan Native, Erutrian, Hmong, and several other ethnicities & races) | 3% African-Amer. 70% Anglo 9% Asian/Pacific Islander 18% Hispanic/Latino 1% Other (includes American Indian, Alaskan Native, Erutrian, Hmong, and several other ethnicities & races) |
| SES of Community | Poor to High Middle Class | Low Middle Class to High Middle Class |
| Type of Community | Urban | Suburban |
| CULTURE OF SCHOOL | Decentralized structure, multiple programs many of which overlap across departments and houses, much teacher autonomy, good teacher collaboration, well-known, highly visible, and recognized school | Individualized programs, some teacher collaboration, little cross fertilization among the school's communities, quiet school with little recognition, very strong and vocal parent group, progressive and innovative programs |

allow them to ask essential questions. The school views experiential education as a vehicle to achieve this goal. As a result, the school currently houses nine co-curricular and after school community service programs including a school-wide 20 hour community service graduation requirement, ten service-learning courses offered through various subjects (including English, Social Studies, Health, and Math), and 11 school-to-work programs that include six career academies in which students are placed in job-related internships. In most cases, students in the internship programs and service-learning courses can use the field experiences in those programs to meet the school-wide community service graduation requirement. Students not in the internship programs must complete the service requirement on their own time.

The school's grades are organized as follows:

Diagram 1: Organization of School Programs (South High School)



Upon entering South High School in Grade 9, students are placed in a theme house that allows students to work in small cohorts interdisciplinarily on the theme of the year. During the 1995-96 school year, the ninth grade theme was Health (in the broadest sense of the word). As a result much of the students' work in English, math, science, and social studies focused on health related topics that explored issues such as health epidemics in America, violence in our streets and homes, and improving our social relations to build a healthier society. The students who began fulfilling their community service requirement in Grade 9 chose health-related service projects.

In grade 10, students can select to enroll in one of three cluster groups. Some students choose to remain in a theme house (which in 1996-97 will focus on the Environment). Other students choose to enroll in one of several career academies including (Auto technology, Business Technology, Cabinet Making/Construction, Graphic Communications/Language Arts, Health Career Occupations, Telecommunications/Computer Technology, and Media). The academies are based on a "vocademics" curriculum that both integrates academics and a vocational education and prepares students for easy transition to local trade schools (through Tech Prep articulation agreements), two-year liberal arts colleges, and four year universities. Students in the academies engage in career-related internship activities. Other students select the academic program which emphasizes the California A-F requirements and preparation for four year post-secondary institutions. Here, service-learning is part of several of the academic courses offered. Many students in the academics program also engage in various after school community service activities.

In grades 11 and 12, all students, regardless of which program they are in during grade 10, can select either a career academy program or the academic program. However, once a choice is made in grade 11, students are encouraged

to remain in that program through graduation. As in grade 10, the career academy program continues to offer all students internship opportunities while the academic program provides some students with service-learning courses. Students in the academic program who are not in a service-learning program complete their service graduation requirement through co-curricular or after school community service activities. Depending on the class and the program, students work on their various service activities individually, in small peer groups, or as a class. The service activities vary from class to class and program to program. In classes and programs where students perform service individually, the service activities vary from student to student.

Overall, 12 of South High School's 121 teachers agreed to participate in the study. These teachers were recommended to the researcher by the site service program coordinator; their participation was approved by the site principal. While the researcher encouraged each teacher to involve all their classes in the study, each teacher decided on how many and which of their classes would participate. Seven teachers decided that only one of their classes would participate in the study. For the other five teachers, several or all of their classes were included in the study. In the end, 336 students from 19 of South High School's classes and programs would participate in the study. The participation breakdown by program type is described in Table 7.

According to the service program coordinator, most teachers' decision to participate or not participate depended on their personality, work load, how "good" they perceived their classes to be, and their overall interest in the study. Because the researcher had no access to the other teachers or classes at the school, it could not be determined to what degree the participating teachers and classes were representative of the school as a whole.

Table 7: South High School Participation by Program Type

| PROGRAM TYPE | # of Classes/ Programs | Total Enrollment of Particip. Classes/ Programs | # of Students Particip. in Study | # of Different Service Projects |
|-------------------------|---------------------------|--|--|---------------------------------------|
| Community Service | 4 | 118 | 82 | 61 |
| Service-Learning | 3 | 92 | 72 | 11 |
| Internship | 4 | 89 | 51 | 48 |
| No Service (Comparison) | 8 | 231 | 131 | 0 |
| TOTAL | 19 | 530 | 336 | 120 |

Although only 12 of the school's 121 teachers participated in the study, it was determined that these 12 teachers included seven of the approximately 20 teachers at the school who were considered to be *service teachers*. Service teachers were defined as teachers who taught at least one service class/program at the school. A number of the school's service teachers who were invited to participate in the study but who chose not to be involved stated that they had no interest in engaging their students in a year-long study.

The remainder of the participating teachers from South High School were five teachers identified by the service coordinator as *no service teachers*. No service teachers did not oversee any of the school's service programs (e.g. service club) and did not include service activities in any of their classes. These no service teachers, along with eleven others, had been recommended by the service coordinator as teachers who would cooperate fully with the study and not "flake out" during the year. Since the researcher was not permitted to select at random from the school's overall population of no service classrooms, the coordinator's

recommendations became the only list from which selections for participation could be made. However, it is unknown to what degree this particular list of teachers were representative of the school's overall no service teacher population.

In the end, only five of the recommended no service teachers agreed to participate in the study. In discussing this issue with some of the no service teachers who had decided not to participate, the researcher was given the impression that a number of them felt the study would be a "burden" to and "more work" for them and their students. One no service teacher who did participate commented that he had no interest in the study, but participated as favor to the coordinator. However, for the most part, the teachers who did participate in the study were very cooperative.

From among the 530 students enrolled in the 19 South High School classes participating in the study, 336 students (63%) agreed to be part of this research study and were granted parental permission. However, not every student who agreed to participate in the study provided data for every portion of the study. For example, out of 336 participating students, only 265 students completed the student surveys. From that total, only 173 students' pre-test and post-test could ultimately be matched for the data analysis (See Chapter Five). In most cases, the researcher could not determine why some students chose to participate in some portions of the study, but not in others.

As a large comprehensive high school, the service programs at South High School varied in scope and size. While programs such as the internship classes had been in operation for some time, the three service-learning classes, for example, were only in their second year of operation. Eighty-four percent of the school's student population come from homes where English is not the primary language; the school's English as a Second Language (ESL) program serves over 1000 students speaking over 40 different languages. Consequently, many of the

service projects at South High School involved language-related activities such as tutoring non-English speakers, translating pamphlets and brochures from English to other languages, and providing assistance to non-English speakers in voter registration, health education, and/or violence awareness issues. Overall, approximately 225 projects (90% of the school's total) were operating within the 11 service classes and programs (including community service, service-learning, and internships) included in this study. However, a complete set of data about these programs could not be obtained because not all students in these classes agreed to participate in the study. In the end, data from 120 of the school's estimated 250 service projects were represented in this study.

Many programmatic issues such as student absenteeism, attrition, and apathy posed many data collection and data analysis challenges for the researcher. In addition, the study's design could not account for numerous variables such as teachers' ages, level of experience, subject matter expertise, experience in running service programs, overall enthusiasm for service, overall effectiveness as a teacher, among many other factors that went beyond the scope of the study. In addition, because the researcher had limited access to the school, it was difficult to determine how representative the teacher sample was of the school as a whole and to what degree individual teacher differences might influence the ways individual classrooms and programs operated and student outcomes were manifested. While the researcher made every attempt to incorporate these issues in the data collection and data analyses, many issues could not be addressed fully within the context of the two questions central to this study. The researcher faced similar challenges in collecting data from North High School.

North High School

The service programs at North High School are more centralized and contained than those at South High School. All of North High School's service activities are based in three of the school's five houses, called *communities*. The service projects in these three communities are facilitated by a *community learning* coordinator who assists students with field placements and general service program coordination. Through these three communities, approximately 700 students (50% of the school's total population) participate in a variety of community service, service-learning and career-related internship activities as part of the school's official *community learning* program.

Overall, the goal of the school's community learning program is to enable students in grades 9 through 12 to experience service to the community and/or career development through a four-year sequential program. Each community's community learning program is designed to address the mission of the school which states: "Students will enter adult life as responsible citizens, effective workers, and lifelong learners. [North High School], in active partnership with the home and community, aims to ensure that all students learn to use their minds well".

All three of the service communities base their community learning program on a similar sequential model in which students have the opportunity to engage in community service, internship, and service-learning programs:

| | |
|----------------|--|
| Grades 9 & 10: | Community Service Experiences |
| Grade 11: | Internship Experiences |
| Grade 12: | Service-Learning experiences through Senior Projects |

Students in grade 9 experience a 10-week field site orientation which includes training in tutoring, interviewing, conflict management, and social skills. These students are then placed in a community-based project based on the academic, vocational, or service goals of their "community" cluster. In grade 10, students develop individualized learning plans for community learning projects in non-profit agencies. In grade 11, students move to a community learning assignment that involves a career exploration component. In grade 12, students develop a senior project that is connected to an academic area and is based on a potential career pursuit. For the most part, each student in the community learning program is responsible for four hours of community learning one morning each week.

While all three communities sequence their students' service opportunities in the same way, each community places a particular emphasis on the service experience. While community learning is a central part of one community, it is only a small portion of what is expected of students in the other two communities:

| | |
|-------------|---|
| Community 1 | Satisfactory service work does not affect students' grade, but unsatisfactory work results in a 5% grade reduction |
| Community 2 | Service component makes up 20% of core academic classes |
| Community 3 | On student transcript, class is noted as a separate class called "Jobs". This "Jobs" Internship class (Grade 11) earns 2 credits. |

In order to monitor students' progress, each student provides a written portfolio that includes site supervisor evaluations of the student, a reflective journal, all signed documents required prior to placement, timecards, and a final

report covering all aspects of the placements, such as students' initial expectation, their views of co-workers, a typical day, and what the student learned from the experience. In addition, each semester, a school advisor visits each students' field placement site to determine if the students' learning goals and objectives are being met.

Along with the three communities, the school houses two other communities that do not engage their students in the community learning program. In which community the students decide to enroll is determined by the student and his or her parent(s). Although not encouraged, students may transfer from one community to another over the course of their studies at the school.

For this study, students from 15 classes among the school's five communities were included. The service group (community service, service-learning, and internship) was made up students from the three communities that include the community learning program. The comparison group comprised of students from the school's other two communities which do not engage their students in the community learning program. For the most part, the students in North High School's community learning program work on their service projects either individually or in a small group. Unlike South High School, the North High School sample did not include any students that were part of "whole class" service projects (where all students in a class worked together on one service project).

The participation breakdown by program type for North High School is described in Table 8:

Table 8: North High School Participation by Program Type

| PROGRAM TYPE | # of Classes | Total Enrollment of Particip. Classes | # of Students Particip. in Study | # of Different Service Projects |
|-------------------------|--------------|---------------------------------------|----------------------------------|---------------------------------|
| Community Service | 3 | 72 | 38 | 38 |
| Service-Learning | 6 | 161 | 56 | 43 |
| Internship | 4 | 84 | 45 | 45 |
| No Service (Comparison) | 2 | 59 | 54 | 0 |
| TOTAL | 15 | 376 | 193 | 126 |

After hearing the researchers' needs for the study, the school's principal, the chair of the school site council, and the community learning coordinator put out a general call to teachers to participate in the study. From this call, 12 of North High School's 61 teachers agreed to participate in the study. This group included 10 of the school's 27 *service teachers* and 2 of the school's 34 *no service teachers*. However, as with South High School, the researcher could not determine to what degree these teachers were representative of the school as a whole.

As with South High School, each teacher decided which of their classes would be involved in the study. While three of the ten *service teachers* involved two of their classes in the study, the other seven included only one of their classes. The two *no service teachers* each agreed to engage only one of their no service classes as a comparison group. It is not known why particular teachers decided to include or not include some or all of their classes in the study. Overall, data from 15 of the school's classes and programs were included in the final analysis.

From among the 376 students enrolled in the 15 North High School classes included in the study, 193 of the students (51.3%) agreed to be part of the study and obtained parental permission. It could not be determined to what degree the students who chose not to participate were different than the students who did participate. As was seen with South High School, not every student who agreed to participate in the study was willing to participate in every portion of the study. Out of 193 students, 167 students completed the student surveys. However, because of attrition, absenteeism, and identification miscoding, only 110 of these students' pre-test and post-test surveys could be matched for the data analysis (See Chapter Five). Other portions of the data (from journals, field placement forms, etc.) were also incomplete.

As with South High School, the researcher was confronted with a number of challenges during the data collection which involved some important considerations. For example, students at North High School have the option of choosing their communities and consequently, based on their selection, choose whether or not to participate in service activities. Therefore, the researcher needed to consider to what degree students who select one of the community learning communities differ from students who do not. This consideration was also applicable to South High School's students, although to somewhat of a lesser degree. In addition, other issues such as the experience and expertise of the teachers, the culture of the school and the classes, and numerous other factors considered for South High School also needed to be considered for North High School. While these and other issues compounded the data collection, these issues were likely to have important implications for the data analysis and the ultimate conclusions that would be drawn. Although attempts were made by the researcher to address these issues as they arose, not enough data about all these

and other issues could be collected during the limited time the researcher had with each school.

Implications of the Differences among Classrooms and Schools

The 34 classes at these two sites varied programmatically in a number of ways: their approach to the service activities; their overall student enrollment; the experience and effectiveness of the teacher; the academic subject matter with which the program was affiliated; the actual service activities students performed; just to name a few. Although these differences created several methodological challenges for the researcher (e.g., how does one control for all these variables?), the range and scope of the participating programs provided the researcher with a broad and rich context for observing recurring outcomes within and among the four program types.

Since service programs are idiosyncratic, variations among service programs, even within the same program type, are expected. And because a goal of this study was to produce some findings that could be generalized to other service programs, the variations among the programs included in this study could be seen as a strength. For example, whereas most previous studies of service programs utilized a limited set instruments and protocols designed specifically for the individual programs that were being studied, this study sought to utilize a more universal approach by employing a common set of measures and protocols that could capture a broader range of educational outcomes across various different types of service programs. Based on a fairly large sample representing a wide range service programs, the researcher would be able to capture some common educational outcomes of service programs that operate across a broad spectrum of classroom situations. Consequently, by involving a sample that includes a broad range of classrooms, teaching

situations, and students, any recurring patterns in student outcomes noted within particular types of service programs (e.g., service-learning) might be attributable to the nature of a particular type of service program. Of course, collecting too much data from too many programs may likely result in an overabundance of individual pieces of data that reveal very little. As will be described in Chapter Five, the design employed in this study was able to detect some emerging themes across classrooms and programs. These themes shed some light on the particular common outcomes of service programs as they relate to students' educational development.

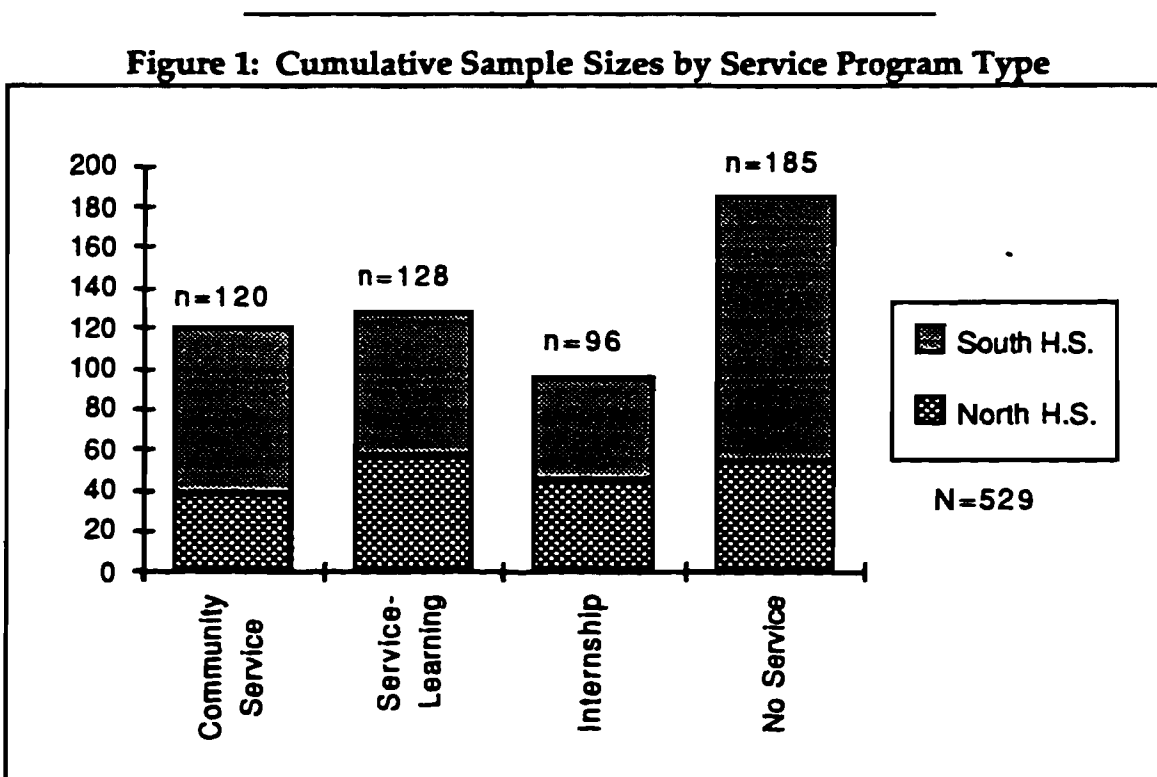
The Subjects

The total sample of the study was 529 students. Table 9 details the overall representation of participating students by grade level, program type and school site.

Table 9: Delineation of Total Student Participation by School Site and Program Type

| | NORTH HIGH SCHOOL | SOUTH HIGH SCHOOL |
|----------------------------------|---|-------------------------------------|
| Community Service | 38 students <i>Grades 9 & 10</i> | 82 students <i>Grades 9 - 12</i> |
| Service-Learning | 56 students <i>Grade 12</i> | 72 students <i>Grades 10-12</i> |
| Internship | 45 students <i>Grade 11</i> | 51 students <i>Grades 10-12</i> |
| Comparison Group (No Service) | 54 students <i>Grades 9-12</i> | 131 students <i>Grades 9-12</i> |
| | Total: 193 students | Total: 336 students |

The participating students from North High School represent 11.7% of the entire school population while the participating students from South High School represent 20.3% of the school's total average daily attendance. Since the researcher did not have access to any information about the students who did not participate in the study, it could not be determined how similar or different the students who participated in the study were from the students who did not. The sample sizes for each service program type are provided in the following graph:



Overall, the sample sizes for the four program types studied were all large enough to provide some evidence about the particular outcomes for each program.

The instruments and protocols used in the study were meant to capture as much different data as possible from the subjects; they could not, however, capture *all* the data from *every* participating student. While 529 students participated in the study, not every student provided data for every measure and instrument. For example, out of 529 students, only 372 students submitted survey results. From that sample, only 283 of the pre- and post-test scores could be matched. This was because either some students were absent when one of the surveys (pre- or post-) was administered, or some students did not use the same identification code for both tests. However, these students did contribute other information to the study through journal questions, interviews, and field placement forms.

Similarly, only 21% of the subjects completed all eight of ESEE's journal entries. While 87% of the sample completed at least one journal entry; only 72% completed two or more. Those students who completed journals did not necessarily complete the survey. In addition, field notes collected by the researcher during classroom and service placement observations contain data only for a small fraction of the students in the study. And as was intended by design, focus group interview data was provided by only 64 of the study participants (See Table 3). While the data were fairly evenly distributed among the four groups studied, it was not possible to determine how representative the samples who provided the various sources of data were to the overall student populations at the schools. It is acknowledge that the sampling for this study was based on convenience and self-selection — the study investigated outcomes of students who wanted and could participate, all of whom were enrolled in classes whose teachers' chose to provide them with the opportunity the participate. Therefore, the findings of the study are likely to have limited generalizability.

While the research design was helpful in collecting a large set of data from a variety of data sources, the design was not conducive to collecting complete demographic information about every student. As a result, complete analyses to determine whether or not particular demographic characteristics were important variables in affecting student outcomes across the domains and data sources could not be conducted. The student survey was the only instrument in ESEE that asked students about their gender and ethnicity. Therefore, such demographic data is available only for the 283 students who completed the pre- and post- attitudinal survey.

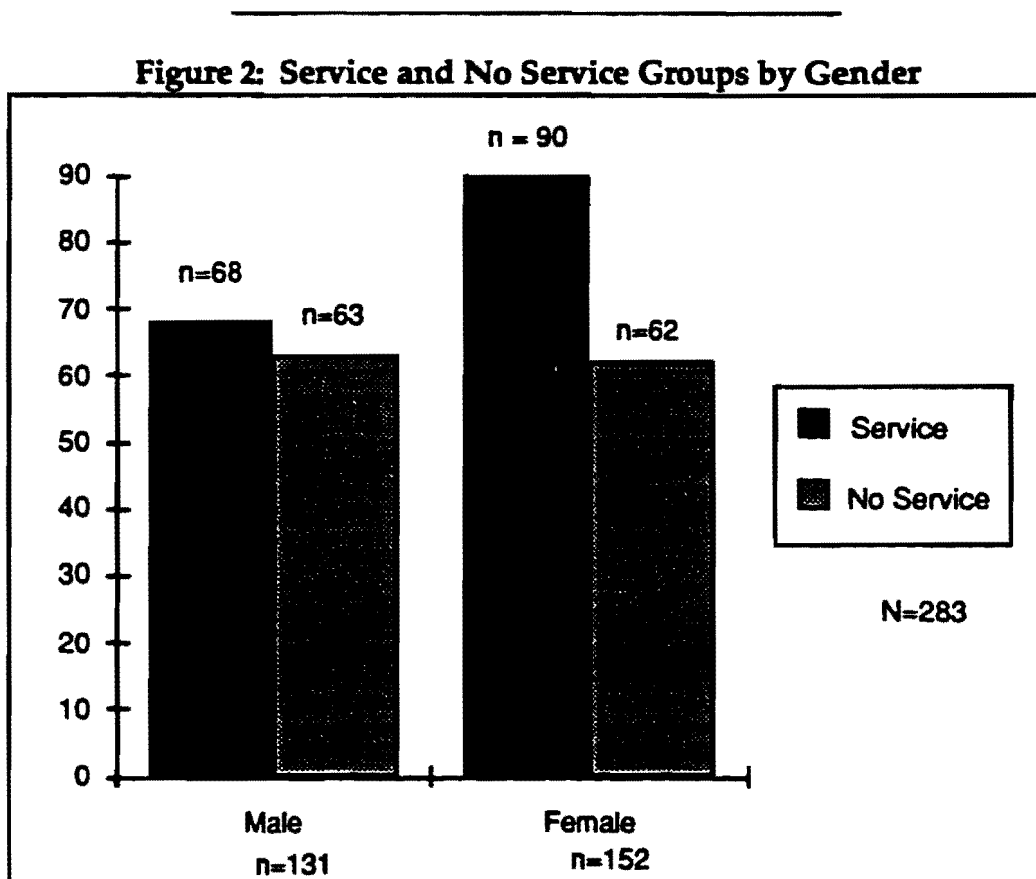
Because the overall findings of the study are based on data from 529 students, interpreting demographic data based on only selected portions of the student sample is not wise. However, some information about the demographics of the students, albeit incomplete, are helpful in shedding some light on the nature of the students who were studied. A review of three characteristics — gender, ethnicity, and grade level — of students who completed the student survey are detailed below. These three characteristics, along with school site and students' pre-test domain scores, were used in the ANCOVA for each of the six educational domains to control for differences between groups.

Group Demographics

On the student survey, students were asked to supply information about their gender, ethnicity, and grade level. These data are displayed in this section to provide an overall picture of the similarities and differences among the various groups studied.

Comparison of the Service and No Service Groups

The first question of the study was to determine whether or not there is a difference in educational outcomes between students who perform service and those who do not. Based on data provided on students' surveys (n=283), the tables below provide a description of the two groups' gender, ethnic, and grade level breakdowns.

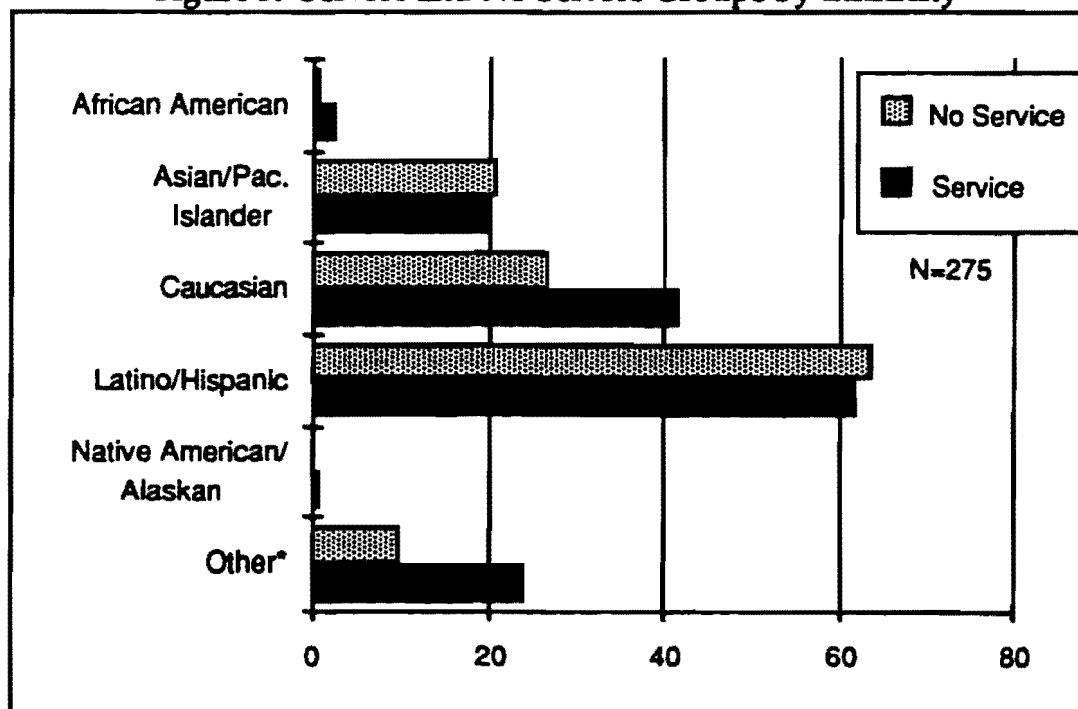


As Figure 2 reveals, the service and no groups were each fairly well-represented in gender. However, it is interesting to find that there was a greater number of females in the service group (based on those who completed the student survey) than in the no service group. Possible gender-related differences

in outcome effects were controlled for in the quantitative analyses. Unfortunately, it could not be determined whether there was an overrepresentation of females among the entire study sample (n=529) since most of the other instruments used in the study (journals, field placement forms, samples of student work) did not ask students to provide information on gender.

For example, each student's journal submission only contained an identification number based on an individual coding system established by each teacher. This coding system allowed the researcher to match students' first journal entry with subsequent ones without breaking the confidentiality of the students. However, it was usually not known whether the journal response was from a male or female student. At times, students would make references to their gender and other aspects about themselves in their journals. However, for the most part, these references were too sporadic and incomplete to be used as control variables in the qualitative analysis.

Figure 3: Service and No Service Groups by Ethnicity



*Other includes students who consider themselves part of more than one ethnic category.

The distribution of students, based on ethnicity is shown in Figure 3. As mentioned earlier, it is unclear to what degree all 529 students participating in this study were representative of the student populations at the two school sites. Nevertheless, ethnicity was one condition that was controlled for in the ANCOVA. Although there has been no research in the service literature that has explored differences in ethnicity and/or race in regards to the educational outcomes of students who do service, the inclusion of ethnicity in this analysis will help test for the potential effect of ethnic differences between the groups on the outcomes.

Figure 4: Service and No Service Groups by Grade Level

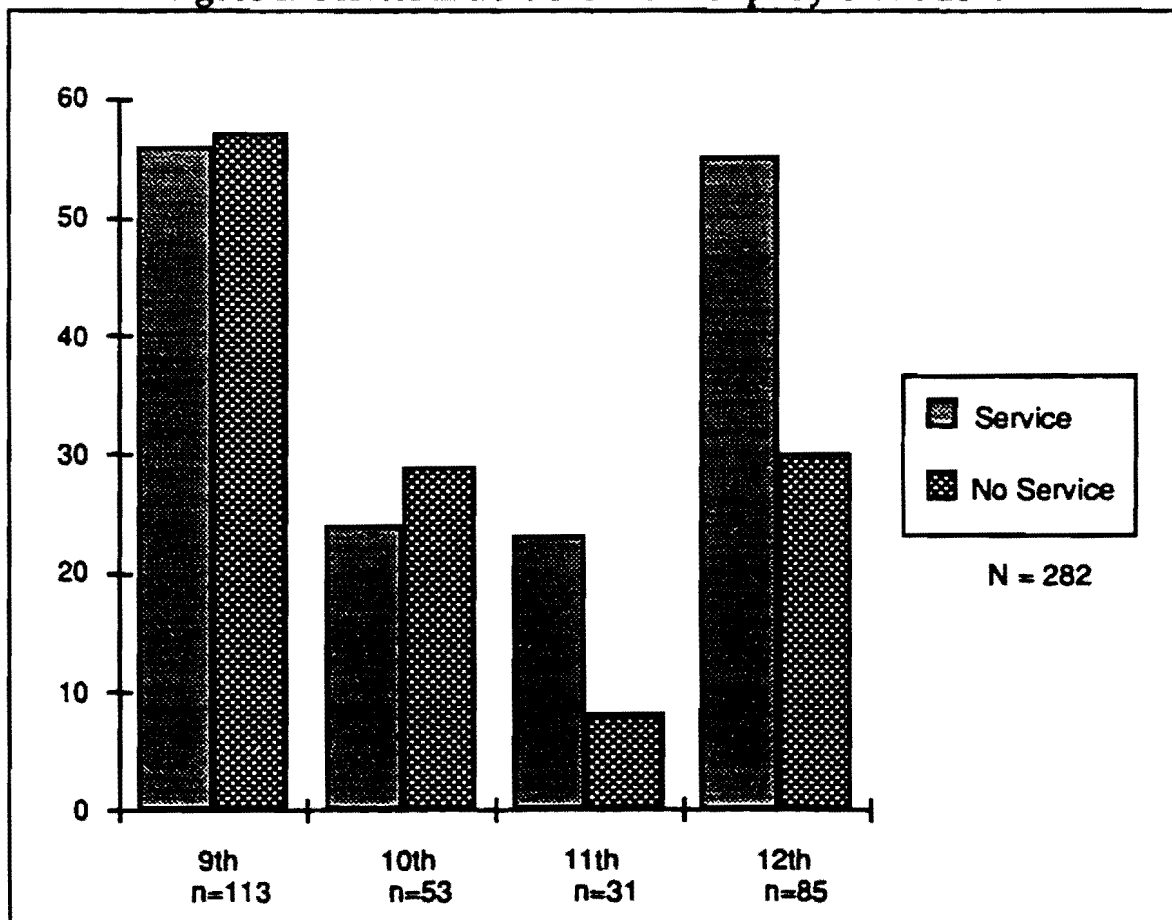
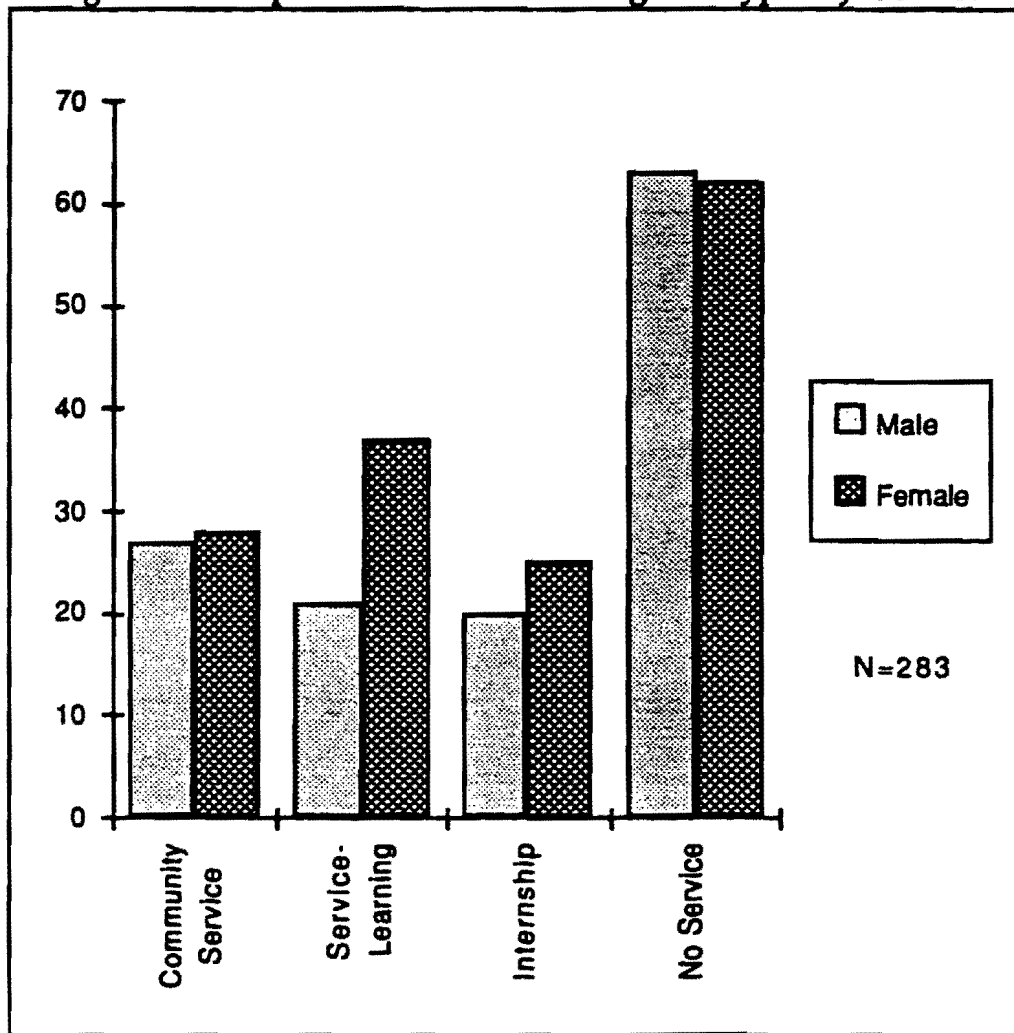


Figure 4 displays the breakdown of students in the service and no service groups by grade level. To control for possible initial differences between groups in their exposure to and experience with service, grade level was used a covariate in the ANCOVA's. The researcher assumed that students in the upper grades might have had more opportunities to engage in service. Indeed, the frequencies in the upper grades for the service group are higher than the frequencies for the no service group. The opposite is true for the lower grades. Although these frequencies are based on a limited set of data (from only those students who completed the survey), and are limited by self-selection sampling bias, controlling for grade level differences might take into account some initial differences between groups in experience levels. The extent to which these variables play a role in shaping students' educational outcomes, as they relate to service programs has not been explored before.

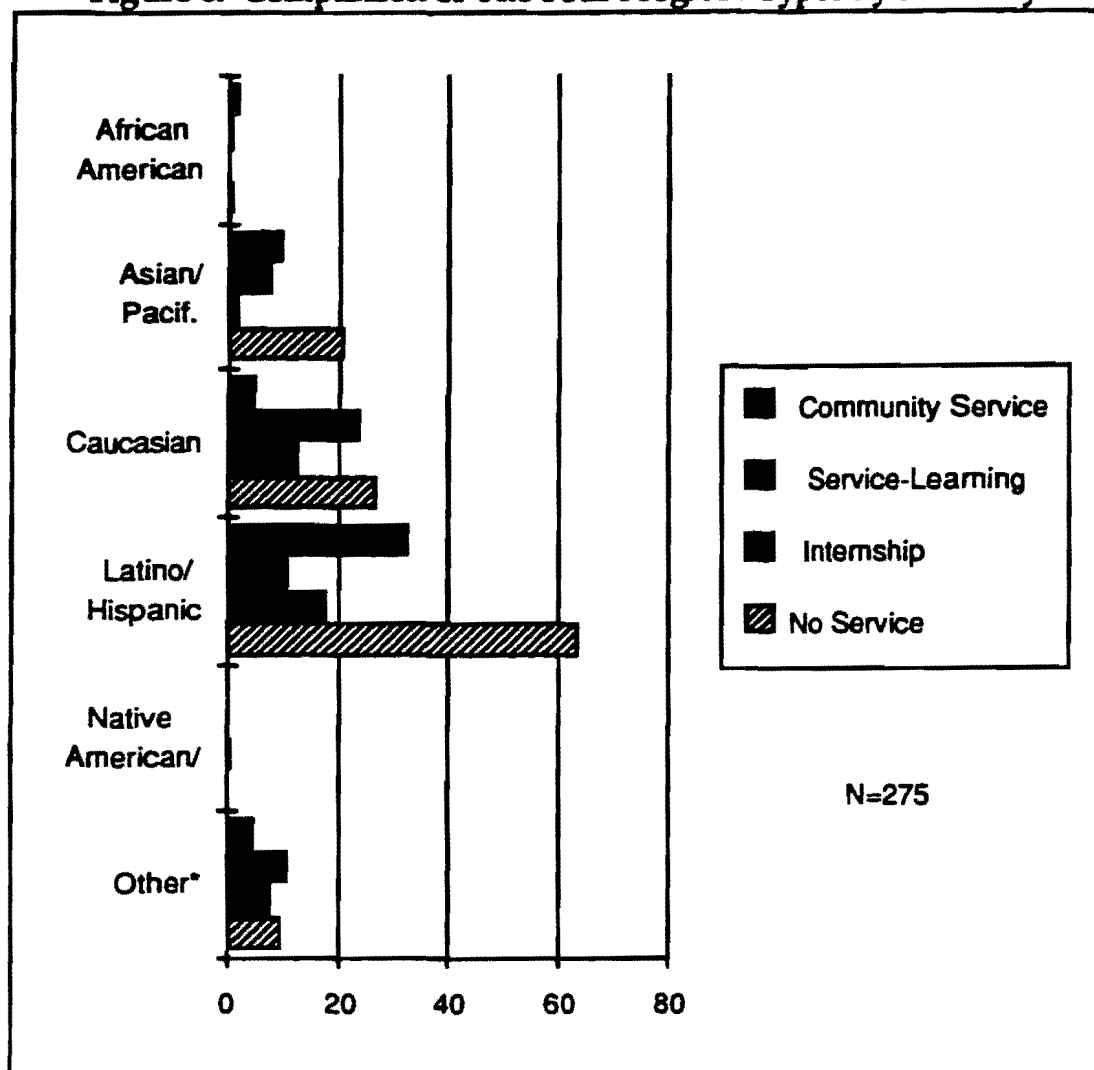
Comparing the Various Service Program Types

The second question of the study investigated whether different types of service programs foster particular outcomes for students. Based on the same student sample used in Figures 2, 3 and 4, the graphs below show the distribution of students by gender, ethnicity, and grade level across the four program types. As Figure 5 reveals, each of the four groups was fairly well-represented by each gender, with the two genders being close to equal in number for the community service, internship, and no service groups.

Figure 5: Comparison of The Four Program Types by Gender

The service-learning group, however, had almost twice as many females as males. As was mentioned earlier, it is likely that this difference is due to the self-selection sampling process used in this study. Nonetheless, to control for possible effects of gender on the outcomes, gender, along with the other variables, was used as a control condition in each of the ANCOVA's.

Figure 6: Comparison of The Four Program Types by Ethnicity



Note: because of missing values (some student did not enter data for ethnicity) N=275 rather than N=283.

In observing students' ethnicity across the four program types (Figure 6), the larger number of Hispanic and Latino students in the *no service* group is likely due the fact that 8 of the 10 classes that served as the comparison group were from South High School, where the overall student Hispanic/Latino population is 59%. (See Table 6).

Figure 7: Comparison of The Four Program Types by Grade

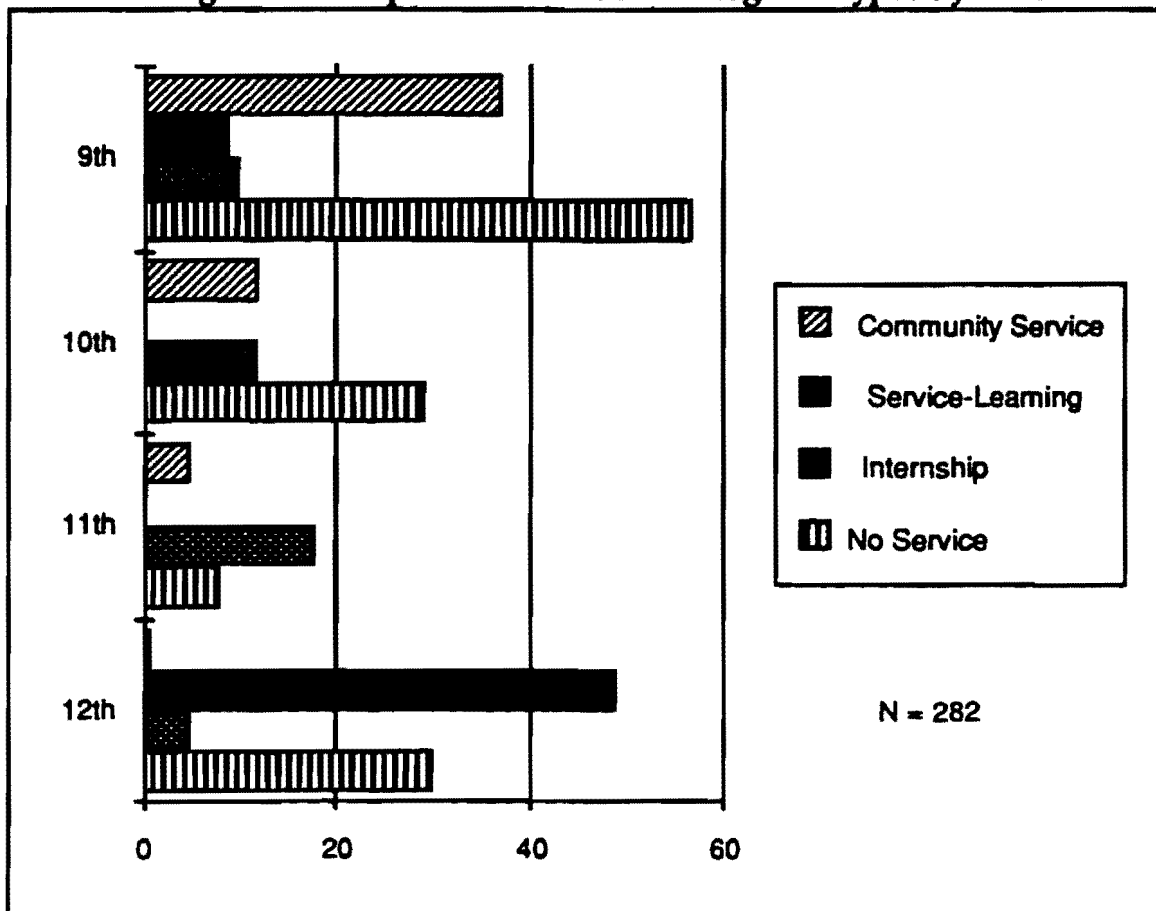


Figure 7 compares the grade level distribution of students for each of the program types. As Figure 7 shows, most community service students were in the lower grades and while most service-learning students were in the upper grades. Internships programs were spread across the grades. The comparison group (no service) was made up by twice as many students in the lower grades than in the upper grades.

As mentioned earlier, it was not possible to select and assign students to particular program types so that the various student demographics could have

been evenly distributed among the various groups studied. The researcher had to contend with the groupings as they occurred naturally. While the qualitative analyses in this study could not assess differences in student outcomes as they related to the aforementioned demographic data, future comparative analyses of service program types may want to explore more fully to what degree, if any, these particular characteristics are correlated with students' participation in service programs.

The Service Experiences

Overall, no two students' service experiences were alike. Some students were engaged in service for part of the year, while others served for the entire year. And regardless of how much time was served, some students served at one placement all year long while others served at several sites throughout the year.

Almost all service students (97%) who completed ESEE's field placement form (N=227) reported that they had an experience serving at a particular *agency* such as homeless shelters, hospitals and health clinics, senior centers, drug rehabilitation centers, juvenile court schools, elementary schools, and park and recreation centers. Approximately (59%) of these students spent some time serving in projects that were not centered at a particular agency but rather, were centered around issues or *causes*: recycling, beach cleaning, school beautification, home renovations, and gardening.

About 35% of the students had previous contacts with the agency at which they served and thus were able to jump right into their assignment; the majority of students spent the first few weeks trying to figure out what they should be doing. Some students served in emotionally intense projects such as reading to children with cancer or assisting AIDS patients; other students served in more physically intense projects such as building wheelchair access ramps and

painting murals. Some of service projects were quite provocative (projects addressing rape prevention, drug abuse, safe sex issues) while others were more traditional (tutoring elementary students, recycling). About 25% of the students participated in projects that could be considered both physically and emotionally taxing. About 50% of the students indicated that their so-called "service" activity entailed doing some clerical work such filing, mailing information flyers, and answering the phone. Only about 20% of the students indicated that their service activity placed them in a leadership role (e.g., leading young kids through conflict resolution sessions).

To what degree the variations among students' service experiences and level of active participation might affect their overall outcomes is unclear. However, as the study progressed and the pieces of the various data were pieced together, some recurring themes began to emerge. These themes suggest that despite tremendous differences among students' individual experiences, "service" provides students with some common outcomes that appear among the various service activities and different service program types, regardless of the program's particular classroom or school circumstances. As will be seen in the next chapter, many of these outcomes were less evident among students in the no service group.

CHAPTER FIVE

FINDINGS OF THE STUDY

"I don't understand why teachers are teaching us stuff I can find on the Internet with a double click."

California 10th grade High School Student

As Miles and Huberman (1984) point out, conducting cross-site analyses, especially when several variables are included, is difficult and cumbersome. The ability to utilize generic instruments across sites is hampered by the idiosyncratic culture and situations of each site. By providing some order and organization to the data collected, relationships among the data can be analyzed, and conclusions about the series of events can be drawn (Miles and Huberman, 1984). Although the quasi-experimental nonequivalent-control-group design of this study could not reveal firm causal relationships between service programs and their impacts on students, this design did help capture recurring patterns of outcomes among the various types of service programs. The emerging patterns discovered in this study go beyond what most other previous studies have attempted to investigate.

The findings are presented here in accordance with the two questions central to the study. Other findings which shed light on valuable new

information about the nature of service programs' outcomes are presented as well.

Outcome Differences between the Service and No Service Groups

As discussed in Chapter Three, quantitative and qualitative analyses were conducted to determine if there were any significant differences between students who engaged in service activities (of any program type) and students who did not. The findings from these analyses revealed significant differences between the service group (combined community service, service-learning, and internship students) and the no service group (students who did not perform service). Differences between the two groups were observed among most of the instruments and data sources used in the study.

Findings from Quantitative Analysis

The analysis of covariance (ANCOVA) was used to determine if there were significant differences in each of the domains between students who participated in a service program (of any type) and students who were not engaged in service during a one year period. After no serious violations of assumptions were found, it was determined that ANCOVA could be used. To control for initial differences between the two groups of students, a set of variables including gender, ethnicity, and school site were used as conditions, with grade level and students' pre-test domain scores as covariates (See Chapter Three). The quantitative findings are based on the results of the ANCOVA for each domain.

The results of the ANCOVA's found that for each of the six domains, the mean of the post-test domain score, adjusted for the covariates, was significantly

larger for the service group than for the no service group at the .05 level of significance (see Table 10).

**Table 10: ANCOVA Results for Student Survey Outcomes:
Service and No Service Groups**

| Variable | Group | n* | Adj. Mean** | F | DF | Prob. | η^2 |
|----------|------------|-----|-------------|-------|----------|-------|----------|
| Acad. | Service | 139 | 3.04 | 13.69 | (1, 246) | .0003 | .053 |
| | No Service | 117 | 2.86 | | | | |
| Career | Service | 136 | 3.21 | 10.96 | (1, 237) | .0011 | .044 |
| | No Service | 112 | 3.06 | | | | |
| Ethical | Service | 143 | 3.05 | 8.66 | (1, 248) | .0036 | .034 |
| | No Service | 116 | 2.90 | | | | |
| Social | Service | 138 | 2.93 | 10.44 | (1, 240) | .0014 | .042 |
| | No Service | 112 | 2.81 | | | | |
| Personal | Service | 113 | 2.91 | 6.67 | (1, 197) | .0105 | .033 |
| | No Service | 95 | 2.82 | | | | |
| Civic | Service | 142 | 3.02 | 5.58 | (1, 246) | .0190 | .022 |
| | No Service | 115 | 2.91 | | | | |

* The sample size of each group varies in each domain because of missing values (e.g., some students did not respond to certain survey items).

** Adj. Mean = mean of post-test domain scores, adjusted for the covariates.

When compared to students in the no service group, the students who engaged in service over the course of the year showed significantly higher gains in developing more positive attitudes towards school, themselves, others, the future, and their community, as measured by the student survey (See Chapter Three for a list of constructs measured within each domain). These results were significant at the .05 level of significance for each of the six educational domains measured by the survey. While it is unknown what *caused* these differences, there is some indication that the engagement of these students in some form of

service provided them with positive academic, career, ethical, social, personal, and civic outcomes. These results are encouraging given that they are based on a fairly large sample size and, for the most part, are consistent with the results which emerged from the qualitative data analyses.

Despite these encouraging results, these findings, in and of themselves, should not be considered definitive. First of all, the effect size for each domain was small. Having significant findings when the effect size is small may be because the relatively large sample size raised the statistical power to the point where very small differences between the two groups could be detected. Moreover, because the survey's domain reliabilities were fair, at best (see Chapter Three), it is not certain that the survey fully measured the constructs of each domain. Better measurement of the constructs might have increased the size of the measured differences between the service and no service groups.

The fact that the findings were significant across all six domains is interesting, especially since the domain outcomes were analyzed independently. This finding might suggest that perhaps the outcomes of particular service programs are not confined to one domain, but rather are manifested across domains, possibly fostering outcomes beyond their primary intended educational purposes. This issue is explored further in the analyses of the study's second question and in Chapter Six. Based solely on the student survey data, the conclusion that can be made is that while the differences between the two groups were found to be significant across the six educational domains at the .05 significance level, the magnitudes of these differences were small.

The central interest of the researcher was to examine the main effects of service on the educational outcomes of students when controlling for gender, grade level, school site, ethnicity, and differences in pre-test domain scores. However, the researcher thought it might be interesting also to examine whether

or not the interaction of the group variable (service, no service) and the other variables have a significant effect on students' educational outcomes. To investigate this interaction effect, a second set of ANCOVA's was conducted for the six domains. In particular, this second set of ANCOVA's attempted to determine if the interaction of gender, school site, and/or group influenced the post-test domain scores.

Gender and school were selected for interaction analyses because their cell sizes allowed for meaningful results to be produced. While it would have been interesting to have included ethnicity and grade level as independent variables in this analysis, the researcher determined that several existing small individual cell sizes ($n < 10$) would not permit the use of these variables to examine meaningful interaction effects.³ Two-way and three-way interactions analyses were conducted for each domain, using gender, school site and group as independent variables. Grade level and ethnicity, along with students' pre-test domain scores, were used as covariates.

The results of the interaction analyses revealed that the three-way interaction effect of group, school site, and gender were significant at the .05 level of significance for the academic ($F(1, 242) = 4.37, p = .038, \eta^2 = .02$) and ethical ($F(1, 244) = 4.27, p = .040, \eta^2 = .02$) domains. To determine the pairs that were significantly different from each other, Tukey tests were conducted for both domains. For the academic domain, the Tukey test found that the adjusted mean of the post-test domain score of the male students of North High School's no

³ While some of the smaller sized ethnicity categories could have been collapsed to produce a larger category, the researcher determined that this approach would be inappropriate and would not produce a result that would be complete. However, it is acknowledged that race and/or ethnicity may have potentially significant influences over the nature of student involvement in service programs and students' overall educational outcomes. While ethnicity could not be employed fully in the analysis of this study, it is recommended that future research studies account more fully for this variable.

service group (Adj. M = 2.63) was significantly smaller than the adjusted means of all the service groups (both male and female) at both North and South High School (Adj. Ms = 3.00 - 3.15), at the .05 level of significance. For the ethical domain, the Tukey test found that the adjusted mean of the post-test domain score of the male students of North High School's no service group (Adj. M = 2.68) was significantly smaller than adjusted mean of the female students of North High School's service group (Adj. M = 3.13).

The results of these ANCOVA's and Tukey tests might suggest that the significant findings in the academic and ethical domains from the first set of ANCOVA's may have been partially due to the effects of the three-way interaction of gender, school site, and group. It is especially interesting that in both cases, the adjusted means for the males in the no service group at North High School were significantly lower than for some of the other groups. It is unknown why these differences were found in the academic and ethical domains and not in other domains. Future researchers of service programs may want to further explore the possible interaction effects of gender, school site, and school, especially in regards to their effects on students' academic and ethical domains, under more experimentally sound conditions.

Findings from Qualitative Analysis

As with the quantitative findings, the qualitative results revealed significant differences in outcomes between the service and no service groups. While the ANCOVA's found these differences to be slight, the quantitative analyses detected some more robust differences between the two groups. Consistently, among all the instruments and data sources, the findings from qualitative data analysis suggest that the service group contained more elaborate and profound discussions about student development across the six educational

domains than did data from the no service group. Data from the service group tended to include overt links to how the service programs helped students work more effectively with others, develop their personal leadership skills, define their career goals, gain a better appreciation for their academic work, stand up for what is right, and develop a spirit for involving themselves in the community. In contrast, the no service group data included only casual reference to the influences of the classes on students' educational development. In addition, most of the no service group's outcomes appeared to be more closely aligned to students' academic and career development, with little reference to the other domains.

Content analyses of the meta-matrix cells revealed a general difference in tone between the data of the two groups studied. While the service students' experiences were typically described by students, teachers, and community agency members in a passionate and positive tone, data from the no service group tended to have a less enthusiastic and a more detached tone. The depth and profundity of the service group's data were a sharp contrast from the weaker, more superficial data of the no service group. Comments made by students during the student interviews, for example, revealed especially marked differences between the two groups. The selected sample of interview responses shown below reveals how the students in the service group believed their service programs helped them in many ways, while the no service students were less inclined to say positive things about how their classroom activities affected them.

Excerpts from the ten students' responses to three of the focus group interview questions are contrasted in Table 11.

**Table 11: Contrast of Students' Responses to Focus Group Questions #2, #3, & #9:
Service and No Service Groups***

| <u>Interview Question #2:</u> <i>What did you hope to learn or achieve through participation in this class or program?</i> | Service Students | No Service Students |
|---|--|---|
| | <p>Student FG#4: At first, I didn't think I'd get much out of the community service, but I was wrong.</p> | <p>Student FG#50: I wanted to get an A in English so that I could get into the AP class next year.</p> |
| | <p>Student FG#12: I took the [internship] class because I wanted to learn something useful. Everything we do in class is so boring. I wanted to learn how to be a doctor because that's what I want to do.</p> | <p>Student FG#54: Not much. I guess we had to take English, so I took it.</p> |
| | <p>Student FG#20: I hoped that I would learn something useful, something related to, you know, life.... My friends took Mrs. [Jones'] [service-learning] class last year and they said it was fun. They all said that it's really hard work, but you learn a lot and its really fun.</p> | <p>Student FG#58: I like Biology because I'm interested in how things work. I wanted to learn about animals and bugs and how they live. I think that's interesting. But, Mr. [Smith], our science teacher, is so boring. All he does is talk. And we just sit there and listen.</p> |
| | <p>Student FG#28: [My counselor] told the internship program would be great for me because I got a lot of talent with my hands. I build things and stuff and [my counselor] said I could do that in [the internship] program.</p> | <p>Student FG#62: I hoped to learn things so that I could go to college. I plan on going to Berkeley or Stanford and have to get straight A's. I can't goof off like a lot of people do here.</p> |
| | <p>Student FG#36: I had to get my [community service] hours in before I graduate. That's why I enrolled in [Ms. Lincoln's] community service projects class.</p> | <p>Student FG#66: I didn't expect much from this class. Music was the only class I ever liked but they cut the program because [Mr. Washington] left. I had to take this [math] class to graduate.</p> |

*The data in this table represent a random sample of interview responses provided by 10 students (5 students represent the service groups and 5 represent the no service group). The full data set includes data from 64 students (service group n=32, no service group, n=32).

Table 11 (continued): Contrast of Students' Responses to Focus Group Questions #2, #3, #9: Service and No Service Groups

| <u>Interview Question #3:</u> <i>Did you accomplish these goals? Please explain.</i> | Service Students | No Service Students |
|---|---|--|
| | <p>Student FG#4: This [service-learning class] was the best program. Going into the community and helping out the people who need it was great. I wish all the classes were like this.</p> <p>Student FG#12: Yeah. I know now that I can really do something useful if I put my mind to it. Before my internship, I didn't think I could anything, but now I feel I can do everything. ...I'm going to be okay.</p> <p>Student FG#20: I learned so much about math, the American act for people in wheelchairs and about handicapped people, and so much about me. I want to work with handicapped, I mean, disabled people now. I didn't realize how great this [service-learning] class would be.</p> <p>Student FG#28: I got to build so many things. I actually made a shed for one of the senior citizens in the neighborhood. They had a story in the paper and everything. Yeah, my internship is cool.</p> <p>Student FG#36: The community service I did was the best experience I ever had. My reason for doing it was to get my community service hours done. But I learned so much. ...about myself and about how I can make difference if I really want to.</p> | <p>Student FG#50: I think I'll get an A. I better, or else I'm gonna be pissed.</p> <p>Student FG#54: It was as boring as I expected it to be.</p> <p>Student FG#58: No. We only spent a few days on stuff I liked. The rest of it was just reading out of the book and taking tests.</p> <p>Student FG#62: Yes. This is a challenging course. I'm the only one who has gotten an A on every test so far. Oh, there [John] who got A's too. But that's because his father is a Science teacher.</p> <p>Student FG#66: Yeah. It's okay. A little boring but I think I'll be able to get a B this semester and graduate.</p> |

Table 11 (continued):

Contrast of Students' Responses to Focus Group Questions #2, #3, & #9: Service and No Service Groups

| | Service Students | No Service Students |
|---|---|--|
| Interview Question #9: <i>Has participation in this class or program impacted or changed your life? If so, how?</i> | Student FG#4: I think everyone should give something to the community. I never felt that way before. But this class made me realize that we all can give something to other people, and we should. | Student FG#50: Not really except that without this class I wouldn't be able to get into AP English. |
| | Student FG#12: I feel better about myself. I like school more too. I used to cut out a lot. I still cut out of some classes like [Mr. Samuel's], but I never miss my internship. | Student FG#54: No. |
| | Student FG#20: Absolutely. I see handicapped, I mean, disabled people—I learned that we shouldn't say handicapped--disabled people in a positive light. They are so strong and keep smiling even though they can't walk or see. It's great. I tell people not the whine when they don't like the way they look. | Student FG#58: [Laugh]. ...That's really funny. Mr. [Smith's] class? No way. |
| | Student FG#28: I wasn't a good student in school or nothing. But the internship showed me that I'm good at lots of things and that I can make things other people can't. I feel good about that. | Student FG#62: I wouldn't say it has changed my life but I've definitely learned a lot about Science. I think everybody needs to know all the science because then we know how the world works, and what life's about. |
| | Student FG#36: Like I said, I feel I can make a difference now. I used to feel things were out of my control. Now I feel like I can make them good. | Student FG#66: Not really. It's just like any other class. |

The sample represents responses from 10 students (five from each of the two groups), selected at random. As the data set exemplifies, students in service programs generally felt the service experience, or the class which contained a service experience, provided several useful benefits. The five students in the service group indicated positive outcomes in their personal development (7 incidents), academic development (3 incidents), sense of civic responsibility (3 incidents), social development (1 incident), and career development (1 incident). Although the students in the no service group indicated that they did gain some academic development (5 incidents), there was almost no mention of impacts in any of the other educational domains. While it was difficult to determine which type of service program was associated with which changes in students, the analysis of the full data set of interview responses (N=64) suggest that the service programs (not specific to type) were associated with gains across all educational six domains. And when the service group data is compared to the no service group, the service group identifies more positive and pronounced outcomes than those reported by the no service group.

In analyzing all other data collected from students — samples of student work, student journals, observation notes, etc.— the service students' response data were generally more positive, more personal, and more philosophical than were those from the no service group. One noted difference came in the *focus* of students' comments and attitudes. The majority (approximately 75%) of the service group's responses focused on issues outside of school. For example, many students in the service group discussed how they could "improve the world", "make the world a better place", "make life better for my family", and "make a difference in the lives of others". In contrast, the no service students' responses tended to focus on college, academic grades, and other school-related issues: "This class will determine if I get a 4.0 or not", "this class will prepare me

for college", and "I like this class...I learn a lot...It has taught me good study skills." This findings suggests that service experiences potentially provide opportunities for students to expand their awareness of issues beyond the school walls.

The service experiences also appear to tap into students' personal abilities and interests, allowing students to explore their interests or explore new terrain. This was evident especially in the data from service students' journals:

I always wanted to be a vet and this [internship] made me realize how hard being a vet is.

I've been drawing stuff since I was four and it was great to paint the mural.

My grandmother died this summer and I really miss her. I could tell her everything. ...When I visit [Betty] at the [senior center], I remember my grandmother. [Betty] has made me feel better and she's my new friend.

I never thought I would like working with small kids, but I love it.

Even from the teachers' perspectives, which were captured through a questionnaire and face-to-face interviews, the outcomes among students in service programs appear to be more magnanimous than those from no service students. For example, during their participation in focus group interviews, five teachers of service classes discussed the way they feel their classes have affected students (See ESEE, Focus Group Question #4):

Teacher #1

In my class, I've seen the shyest students develop a sense of strength as they work on their service projects.

Teacher #2

Students first complain about my class, especially about the community service-learning activities. Most of them find them difficult because they have to really think. ...There are no answers

in the back of the book. ...But when it's over, they think differently. They approach situations with a more analytic kind of approach. They don't just jump in to try to find the right answer. Rather they strategize, looking for ways to think about a best approach that will get the job done in the quickest way. ...Much of this approach they then apply to their school work, their personal relationships, everything.

Teacher #3

Most of the students in my class come to school with no idea of what they want to do in the future. ...For many of them, college is not even on their radar screen. You know, they want to be rap stars, models, or star athletes. It's great to dream, but....But when they go out and start to work on their community service projects, they suddenly realize that there are so many other possibilities for them, that they are capable of making a difference. ...It's amazing how at the end of the year, most of the students in my class develop the ambition to go to college or pursue a more realistic career, even kids who I wouldn't expect it from. I think some of it is maturity, but I also think a great deal of it is the exposure and the autonomy students get from doing community service. They take on more responsible, adult-like roles and somehow begin to act more like adults.

Teacher #4

Most students [at the school] think about the here and now and are not worried about their futures. Most of their thinking focuses on them and their needs. But my [internship] class helps them think about the future and the world around them. ...Doing work in the community does different things for different students. ...Well for [Maria], it has made her realize that she is charismatic and is very good with people. So now she's looking at a career in marketing. ...For [Ann], who wields a lot of power among her peers, working in the community has frustrated her. She used to think she knew everything and now she's out there alone and she's scared to death. It has been a difficult experience for her and I think she'll quit the program. But, in the long run, she'll look back on the experience and realize how much it taught her about being tough on the outside but weak on the inside. ...I don't think she realizes that now. ...For lots of the kids, the [internship] experiences help them get a glimpse of the world they have never seen before. They get to venture out on their own. Something a lot of these kids never really do.

Teacher #5

The way students have been able to rally around common issues of interest and work together. Two of my kids who used to fight like cats and dogs now work together on fighting child abuse. They both found themselves serving at the same agency [that fights child abuse] one day. They began to talk about how important the issue is to them. And now they're working together, and are actually becoming good friends. ...It's finding the common ground, rather than highlighting our differences, that makes the community learning projects great for the kids.

As the sample of quotes above reveal, teachers of the service group relayed numerous ways in which their classes affected students across the six domains central to this study. In particular, the comments for the service teachers appeared generally more attuned with students' personal, social, civic and career needs. Ironically, academic development appeared to be mentioned less often.

In contrast, responses to the same focus group question from teachers of the students in the no service group, focused more on students' academic goals and personal well-being, with little emphasis on students' future career, civic, or ethical development:

Teacher #1:

I am very strict with my students and they know that they cannot get away with anything in my class. Therefore, for my students, I provide structure and discipline. ...They learn that the importance of doing all their work, turning it in on time, and not slacking off. These are indices of success for students who will go on to college, which is the majority of my class.

Teacher #2:

My students have received a greater awareness of Biology through the cooperative learning activities in my class. The students work in small groups on various units. They teach each other the material until the entire group has mastered it. It's a good technique because not only do the students learning Biology better, but they learn how to work as part of a team and get along with each other.

Teacher #3:

Because I use an interdisciplinary approach to my teaching, I think my students learn how English is important in all aspects of their education. They write about their science work, or their math activities. Students enjoy this because it allows them to work through the writing of a report with the assistance of the English class. ...For many students, it builds their confidence as writers and it makes writing the paper more enjoyable for them.

Teacher #4:

The students in my class are real low level. I try to provide them with one-on-one support in helping them develop their language skills, but with 34 students in the class, it's very difficult. I just wish the students would take the class a bit more seriously and behave themselves more. ...I've gotten to the point where I just try to worry about the ones who are going to succeed and concentrate on helping them. I hate to say it, but I can't teach someone who doesn't want to learn. So you asked what changes I've seen in students. I would say the only changes have been with those students who have applied themselves. Those that don't, don't achieve much.

Teacher #5

Several students in my class have improved dramatically in my [math] class. I think it's because they have formed a study group that meets at someone's house and they work together on their homework. ...I don't think that's cheating because if they can work together and explain difficult concepts to each and understand them, then that is what counts. For these students, their scores have gone way up. I'm encouraging all students in my classes to form these study groups.

The data from the teachers of no service students suggest that students' outcomes are concentrated primarily in the academic realm, with little focus on the other domains. Outcomes in any of the other domains are rarely mentioned. Overall, when comparing the service and no service groups with each other, evidence from the various data sources suggests that the students who engage in service, regardless of program type, were affected in meaningful ways across the six

domains. These outcomes appeared to be much less pronounced among students in the no service group.

Outcome Differences Among Service Program Types

The researcher relied on a quantitative statistical approach and an inductive qualitative approach to determine whether there are differences in the outcomes in each of the six educational domains between the four groups studied (community service, service-learning, internship, no service).

Quantitative Findings

The analysis of covariance (ANCOVA) was used to determine if the various types of programs differed significantly in the outcomes they foster for students. After no serious violations of assumptions were found, it was determined that the ANCOVA could be used. An ANCOVA was conducted for each domain, controlling for some initial differences among the four program groups. As with the ANCOVA's conducted for the study's first question, gender, ethnicity, and school site were used as conditions to control for initial differences among the groups, with grade level and students' pre-test domain scores as covariates (See Chapter Three). These ANCOVA's used the same survey data that were employed in the quantitative analyses of the study's first question.

As described in Chapter Three, the ANCOVA sought to test the following hypotheses for each of the six educational domains:

$$H_0: \mu_{cs} = \mu_{sl} = \mu_i = \mu_{ns}$$

H₁: the means of the program types are not all equal

The ANCOVA revealed the results shown in Table 12:

**Table 12: ANCOVA Results for Student Survey
Four Program Types by Educational Domain:**

| Variable | Group* | n** | Adj. Mean*** | F | DF | Prob. | η^2 |
|----------|--------|-----|--------------|------|----------|-------|----------|
| Acad. | CS | 53 | 3.05 | | | | |
| | SL | 48 | 3.06 | | | | |
| | IN | 38 | 3.01 | | | | |
| | NS | 117 | 2.86 | 4.64 | (3, 244) | .004 | .05 |
| Career | CS | 48 | 3.22**** | | | | |
| | SL | 48 | 3.22**** | | | | |
| | IN | 40 | 3.20 | | | | |
| | NS | 112 | 3.07 | 3.67 | (3, 235) | .013 | .04 |
| Ethical | CS | 53 | 3.08 | | | | |
| | SL | 49 | 3.02 | | | | |
| | IN | 41 | 3.04 | | | | |
| | NS | 116 | 2.90 | 3.05 | (3, 246) | .029 | .04 |
| Social | CS | 53 | 2.95 | | | | |
| | SL | 47 | 2.93 | | | | |
| | IN | 38 | 2.90 | | | | |
| | NS | 112 | 2.81 | 3.66 | (3, 238) | .013 | .04 |
| Personal | CS | 28 | 2.91 | | | | |
| | SL | 46 | 2.91 | | | | |
| | IN | 39 | 2.90 | | | | |
| | NS | 95 | 2.82 | 2.21 | (3, 195) | .088 | .03 |
| Civic | CS | 48 | 2.98 | | | | |
| | SL | 52 | 3.00 | | | | |
| | IN | 42 | 3.08 | | | | |
| | NS | 115 | 2.90 | 2.46 | (3, 244) | .064 | .03 |

* CS= community service, SL=service-learning, IN=internship, NS=no service

** The sample size of each group varies in each domain because of missing values (e.g., some students did not respond to certain survey items).

*** Adj. Mean = mean of post-test domain score, adjusted for the covariates.

**** The community service and service-learning adjusted means appear to be the same in the career (and personal) domains due to the rounding off of means to two decimal points. However, the only significant difference from Tukey in the career domain was between the community service and no service groups.

The ANCOVA's found significant differences between program types at the .05 level of significance in four of the six domains: academic, career, ethical, and social. To determine the pairs that were significantly different from each other, the Tukey test was performed (significant if $p < .05$) for each of these four domains.

For the academic domain, the Tukey test revealed significant differences between the community service and no service groups and also between the service-learning and no service groups. The finding that the service-learning group's academic domain adjusted mean was significantly higher than the no service group's adjusted mean is interesting to note, especially given the fact that enhancing students' academic development is usually an intended purpose of service-learning programs. However, the fact that the community service group's adjusted mean was significantly higher than the no service group's adjusted mean in the academic domain is surprising since, by the definition used in this study, the community service programs were not connected to any particular academic curriculum (while the no service group was connected to academic curricula). It is issues like these that should be investigated more fully in future research studies of service programs.

For the career domain, the significant difference was found to be between the community service and no service groups. This finding suggests that perhaps community service programs are an effective way to provide students with opportunities to explore career options and develop career awareness. Interestingly enough, no significant differences were found between the internship group and the other program types, even though the primary intended purpose of internship programs is to foster career development.

The adjusted post-test domain means were also found to be significantly higher for the community service group than for the no service group in the

ethical domain. This is one outcome that was expected since community service programs are typically intended to foster students' civic responsibility and ethical development. However, it is surprising that community service adjusted mean for civic responsibility was not significantly higher than for any of the other program types, including the no service group. Some might argue that aspects of the ethical development items included in the pre- and post-tests may be related to civic participation (indeed two survey items were found to be measures of the *civic and ethical domains*; See Appendix B). However, the fact that the survey items deemed to directly measure civic development showed no significant difference, while the ethical domain items that were possibly related to civic development did show a significant difference, is a bit perplexing.

Despite the low reliability of the survey's social domain, the ANCOVA also found significant differences between groups in this domain. The significant differences in this domain were between the community service and no service group whereby the community service group's adjusted mean was found to be significantly higher than the no service group's adjusted mean. According to Kendall and Associates (1990), social and personal development are considered to be secondary outcomes that accompany the primary intended educational purposes of various types of service programs (See Chapter One). If this is true, then the results in the social domain should have shown significantly higher outcomes not only for the community service group, but also for the service-learning and internship groups. In addition, the ANCOVA for the personal domain found no significant differences in adjusted means among the four groups studied at the .05 level of significance. These results question the suggestion by some service program proponents that social and personal development are significant secondary outcomes fostered by all types of service programs (Conrad & Hedin, 1980).

Overall, despite significant ANCOVA findings for the academic, career, ethical, and social domains, the overall effect sizes were small. Therefore, all the significant findings of these ANCOVA's should not be considered definitive. Instead, these findings should be used in future research as a basis to more fully explore the educational outcomes of service programs.

As was done with the analysis of the study's first question, the researcher thought it might be interesting to use the four group context to examine whether or not the interaction of the group variable (community service, service-learning, internship, no service) and other variables have a significant effect on students' educational outcomes. To investigate this interaction effect, a second set of ANCOVA's was conducted for the six domains. However, because the cell sizes in some cases were small ($n < 10$), no three-way interaction effect analysis could be conducted. After considering the various possible combinations for meaningfully exploring two-way interaction effects, one two-way interaction effect analysis could be performed. This analysis involved determining if the interaction of group and gender influenced the post-test domain scores. The results of this analysis for each of the six domains revealed no significant interaction effects of group and gender on the post-test domain scores at the .05 level of significance.

Qualitative Findings

In conducting content analyses of the qualitative data within each program type, no discernible differences in outcomes, as were found by the Tukey Test, were noted between the community service and the no service group for the academic, career, ethical, and social domains. In addition, no differences were noted between the service-learning group and the no service group in the academic domain. Overall, the qualitative analysis found no identifiable domain

patterns (outcomes relating to a particular domain) within any program type. All four groups studied — community service, service-learning, internship, no service — had examples of positive educational outcomes in all six of the educational domains.

This finding somewhat dispels the notion that civic responsibility and ethical development are primary outcomes of community service programs while career and academic development are primary outcomes of internship programs, and academic and civic development are primary outcomes of service-learning programs (see Chapter Two). Although the overall responses of the service group generally were stronger and occurred more often than they did for the no service group, there is no evidence that one type of service program dominates a particular domain or that one domain predominates within a particular type of program. Instead, the qualitative data analysis findings suggest that the outcomes of service programs are defined more by the nature of the participating student than by the intended educational goals of the service program.

For example, evidence of academic development were found in all four program groups (See Table 13). Data about student development in the other educational domains were also found among all program types. Again, no discernible differences among the program types could be detected. However, as mentioned in the previous section, the data from the service group tended to reveal stronger and more pronounced outcomes for students ("Doing community service has helped me realized that it's important to help others"; "I now know what I want to do in the future"; "I've made so many great friends"; "I didn't know I could be good at teaching kids") while student outcomes for the no service group tended to be less specific and less focused ("I am learning a lot", "This class has helped me", "[Ms. Jones] is a cool teacher...She's taught me a lot").

Table 13: Samples of Academic Development Across Program Types

| | STUDENT JOURNALS | STUDENT FOCUS GROUP INTERVIEWS |
|--------------------------|---|--|
| COMMUNITY SERVICE | <p>I'm getting more into my classes now? They seem to have more meaning.</p> <p>I'm learning alot. I use math alot because my project makes me figure things out so that we don't get cheated on the materials we buy.</p> <p>The service project was scary because I had to learn about all these chemicals and their long names. If I screwed up, I could of killed someone because they could of gotten the wrong medicine...I like chemistry more now because of my work at the hospital.</p> | <p>Yeah. I was forced to think. I used a lot of math at my placement because we have had to calculated a lot of things.</p> <p>My placement has helped me become a better writer I think because what I write now is real, it's not just an assignment for a class. People are actually going to read what I write, and use it. So it has to be good, no mistakes.</p> |
| SERVICE-LEARNING | <p>My senior project is definitely worthwhile to me. ..I am composing a concept piece for the senior center. The piece is a small ensemble including at least piano and flute. My music teacher said she was really impressed with the piece and that I should consider studying music in college.</p> <p>School is cool because we get to go into the real world and see how things work. I never liked English before, but I want to take this [English] class again.</p> | <p>I like History because we can look at how people used to be treated and how they are treated today. I get to work with handicapped kids. Before [in previous times], they were not treated nice and were sometimes tortured or killed because they were considered a curse. Now we have laws to protect them and I tell them that when I visit them.</p> <p>I just finished my community project for history calls. Sure, it's worthwhile. I learned new things about different cultures. We read about cultures in class, but it's not the same as when you're actually working with different people.</p> |

TABLE 13 (continued) Samples of Academic Development Across Program Types

| | STUDENT JOURNALS | STUDENT FOCUS GROUP INTERVIEWS |
|------------|---|---|
| INTERNSHIP | <p>I hated school until I started my internship at the [sic] center. It is so fun to watch how excited the kids get when they actually could touch and feel stuff. I probably would not come to school if I couldn't go to the center.</p> <p>School is so boring for me It's so easy. I already know everything that the teachers cover. ...My internship challenges me and makes me learn new and exciting things that will help me do better in college.</p> | <p>My internship has taught me a lot and it has helped me to better in school.....I feel I have a reason for learning new things because I will need to know them when I get a job.</p> <p>I like computers more now because of my placement. I'm learning graphic design and I am developing a brochure for the school that includes safety tips. I will be writing it in different languages so that our parents can read them.</p> |
| NO SERVICE | <p>This [history] class teaches me alot about things that have happened in our country and why we should be proud of our freedom and democracy.</p> <p>I love animals. Mr. [Jones] spends time showing us how many parts of our bodies are like animals. That teaches us so much about how our bodies work.</p> | <p>School can be boring but I'm learning a lot. I really like science. I've also loved science, especially astronomy. I'm learning a lot there.</p> <p>School's fine. I think I'm learning a lot in all my classes. ...I think what I'm learning will be useful for college.</p> <p>I love my drama class. My teacher is real cool and I want to be an actor. I am learning a lot about different ways to act and am learning music so that I can sing my part in the show.</p> |

Note: The statements are written as they appeared in the journal or were spoken during the focus group interviews. Misspelled words and grammatically incorrect phrases have been keep intact so that students' intended wording or phrasing is not misrepresented.

Overall, the findings reveal that there were significantly different outcomes between students in the service group and students who did not perform service. However, the findings suggest that there are no discernible differences in outcomes between the various types of service programs. In comparing data within and across the meta-matrix cells, it appears that service programs, regardless of type, all contain some characteristics that enhance students' development across the six educational domains. In investigating what these characteristics might be, the researcher discovered a set of common themes across the service program types that can provide the service field with a further understanding of how service programs affect students' educational development. As will be described, these characteristics are manifestations of experiential education theories at play.

Emerging Themes Across Service Program Types

In analyzing the outcomes of the various types of service programs, a set of themes emerged. These themes suggest that all types of service programs have some common core elements which appear to have a significant influence on student outcomes. These core elements may provide further understanding of service programs and their overall impact on students. In addition, they can help identify some new questions for researchers to investigate. Each of the identified themes is described below.

The Individualized Nature of Service Programs

As the quantitative and qualitative data results revealed, there were no definitive outcomes for particular *types* of service programs (community service, service-learning, etc.). Even when the researcher focused the analysis on student

outcomes within a classroom, no consistent patterns among the student participants emerged. In other words, not all students who participated in the same classroom program were affected in the same way. In one history class, for example, 23 students all worked on a service-learning project that involved an analysis of violent crime in their neighborhood. Divided into small working groups, the class compiled the latest neighborhood crime statistics, presented their findings to local community agencies, discussed the findings with students at neighboring junior high schools, and put together a comprehensive crime trends report with recommendations, which was given to the local city council. Subsequently, the city council members sent the students a letter stating that the students' report was impressive and that the council would seriously consider the students' recommendations. In the class, students utilized their service experience to better understand the historical context of the changes in modern western society.

In analyzing the educational outcomes of this program for the students in the class, it was difficult to find specific, common outcomes among the students. In interviews, journals, and samples of student work, some students in this class discussed how they gained a better appreciation of history (*academic development*) as the crime rate in their neighborhood had risen steadily for the last 20 years. "We must go back in time and look at how things used to be and how things are now", one student wrote. "We can learn so much about who we are today by knowing what's been going on in our community over the years", stated another. Their and others' comments indicated how by taking a historical look at an issue, one can gain a better understanding of why things occur and why community situations, such as a rising crime rate, exist.

However, other students, in the same class, focused their discussions and writings on how the service-learning class allowed them to explore potential

careers in the criminal justice system (*career development*). Other students focused on how the class helped them have a better appreciation for *civic responsibility*. As one student in the class summed it up during a focus group interview, "I always felt like things like this were always out of my control. But I know I can make a difference now, especially in my own community. I just need to have a plan and do it. All of us can make our neighborhood better. All of us need to."

In attempting to characterize the outcomes of this service class specifically, and service-learning more broadly, it quickly became obvious that the outcomes of service vary from student to student, even when the students work on the same project. The individuality of student outcomes is exemplified in the quotes below, which represent samples of five service-learning students' responses to the following journal entry: *Has participating in this course or program made a difference in your life? Please describe how or how not* (ESEE Journal Entry #7). The students in this sample were all part of the same history service-learning class and worked collaboratively on the same violence prevention service project (described above).

STUDENT #39: Discussed how the class has empowered him/her and has made school more enjoyable:

Yes it has made a difference in a way that we can do anything we feel as long as we put our minds to it. And it also made a difference in a way that it's a lot of fun to do these kinds of projects. *Schools* more fun and I never liked history.

STUDENT #42: Discussed how the class has helped his/her social development:

This program has affected myself. It made me feel more *acquainted* and relaxed with people I don't know.

STUDENT #49: Discussed how the class helped in broadening his/her perspective:

I think it has made a difference in my life because I look differently on things about life. I learned how to handle hard situations in life.

STUDENT #50: Discussed how the class has given him/her hope and has affected his/her social development.

Yes because it has *stoped* me from giving up on everything that I'm having problems with. I think I have *learn* how to work with other people.

STUDENT #52: Discussed how the class helped develop his/her empathy for others and a better awareness of existing violence.

Yes, It has. I have though of doing stuff to people like *tacking* them or hurting them. But this course made me think how other people feel. Before this course, I would just do anything I felt like. I wouldn't think twice. But now I know that I will hurt someone by doing it. There's just *to* much violence around.

As the five journal samples above exemplify, one service activity affected different students in very different ways. Such ranges in outcomes among students in this class were also evident in students' interview responses, in samples of their work, as well as in observation notes taken by the researcher during site visits. In looking at the other 8 service-learning classes included in study, similar "within class" variations in students' responses were also found. As expected, within service programs where students worked on different service projects (each student served at a different agency), the outcomes among students were even more varied. The largest variations in outcomes were noted for community service and internship programs. Because these service program types tend to involve students in more individualized projects — different

students work on different service projects at different community sites — the nature of the outcomes for students are greatly dependent on not only what they bring to the project, but what opportunities and challenges the individual project provides them. Consequently, within-program analyses of community service and internship programs reveal that the outcomes for individual students are quite varied and that for some students, the outcomes span across the six educational domains.

Because of the greater variation among service placement for students in community service or internship programs, the level of satisfaction among students in these programs appeared to have a greater variation than it did for the service-learning students. While approximately 8 out of every 10 service-learning students included at least one positive comment about their service-learning class in the various data sources they supplied, approximately 7 out of 10 students in community service activities and 6 out of 10 students in internship programs made at least one positive comment about their program's influence on their educational development (in any domain). In contrast, approximately one out of every 10 service-learning student, 2 out of ten community service students, and 3 out of 10 internship students overtly mentioned at least one negative aspect of their program as it related to their educational outcomes.⁴

For example, in response to ESEE Journal Question #4 (Describe your feelings about your community activity. Is it worthwhile? Why or why not? What do you like most about it? What do you wish was different?), a number of students (representing all three service program types) responded negatively. Samples from three students are offered below:

⁴ For the no service (comparison) group, approximately 5 out of every 10 students included positive comments about their classes while 7 out of every 10 students included negative comments.

Student #72 wrote:

I feel it is a big waste of time because I could be in a classroom, getting help with my work. I don't like the work I do there.

Student #167 wrote:

My community service project is exactly what I had expected it to be. Sitting in a room full of first graders telling them to "be nice", "don't pick your nose", etc. I had only one feeling the whole time I ever went to my project, boredom! I didn't learn one thing, and I didn't accomplish one thing. I think it's just a big waste of time. I don't know why we have to do this crap. I told Mr. [Smith] I didn't want to do it but he told me it was a requirement.

Student #297 wrote:

I don't like my community activity. I don't think it is worth my time because I have nothing to do there. I work at a hospital and found that I can't do much because of the lack of a medical education...I want to be able to work with patients, answer more phone calls, and just do something. I just do boring paper work.

For some students, the negative comments centered around being "required" to do service or to engage in activities for which they had no interest. These students' dislike of their service activities appear to be a result of a mismatch between their personal interests and skills and the activities they engage in at their placement. Therefore, what each student brings to the project in terms of interest, ability, enthusiasm, and prior experience all appear to play critical roles in the satisfaction students will have with their service experience. This suggests that the outcomes service fosters for students are dependent upon the students being involved in an experience that is appropriate for their knowledge, skills, and interests. This appeared especially true when the issue of service requirements arose in one focus group interview. (All students at South High School and students in three of the five communities at North High School are required to engage in service activities prior to graduation).

One student's comment exemplified the reaction of most students to their service requirements: "It really bugs me that we are being forced to volunteer. I do a lot of work at my church but the school won't count that. Only the stupid projects they come up with count. That's really dumb." However, the same group of students responded positively when one student offered this suggestion:

Student #22:

I think if they allowed us to design our community service projects, then we would like them better. They [the teachers] think they know what's best for us. But, I think we could come up with some really neat projects that would really teach us about life, about our communities. Right now, most of us just follow orders from the adults at the agencies. That's not right.

Given this comment and the variety of data that points to this notion, service projects appear to be most rewarding to students when students feel invested in the project. Often, this involves allowing the student to have a say in the design of the service project or providing opportunities for students to take on adult roles. This leads us to the second emerging theme.

Empowering Students through Meaningful Service Experiences

The students who were most profoundly influenced by their service experience were engaged in meaningful service activities in which they had some responsibility, some interest, and/or were challenged to some degree. The strongest, most positive statements about service experiences tended to come from students who felt that they were being "treated like an adult" or were being "treated with respect". When the service activity provided students with opportunities to take on adult-like roles, students appeared to feel more empowered by writing more about gaining their self-respect and being able to make a difference in the world. The following student journal and interview

comments, representing all three service program types, suggest that student empowerment played an important role in the degree to which a service program affected students' educational development:

Student #117 wrote:

I really enjoyed my community learning experience at the hospital. I learned that I had something to offer. The nurses I worked with made me feel like they were glad I was there. I got to do a lot of fun things like help them on their rounds and talk to people in the waiting room while they waited for their relatives to get out of surgery. Everyone treated me like I worked there and it is so sad to leave them. I plan on serving there during the summer.

Student #301 wrote:

I think that my internship was great fun. Mrs. [Teacher] allowed me to teach the [elementary school] kids about health issues, like why it is important to get shots and why they should eat right. The kids really like me and they call me Miss [Smith]. One time Mrs. Johnson had to leave the room and she left me with the kids, all by myself. I taught them from their reading books and all the kids behaved. I felt like a real teacher. I want to teach in the future. I really like kids.

Student #469 wrote

I enjoyed doing my senior project because I could finally do a project that I really enjoyed. Mrs. [Teacher] said we need to define a topic and then select a service activity that would interest us. I *choose* to help the homeless people because they need help. I worked at the homeless shelter on [Main] street. They gave me important responsibilities like helping to check in people at the door and counting the beds to make sure we had enough. ...I hated turning people away but we had to. I told them that we could fit in more beds and I showed them how. They told me they were so proud of me and that I helped them out so much. That made me feel really good. I think everyone should do this. ...I got an A on my [senior] project.

Similarly, teachers recounted how the service projects empowered some students:

Teacher #10:

The transformations among some of the kids is amazing. [Sally] served at the pet hospital where she assisted the doctor in organizing materials for him. Every time she would serve there she would come and tell me all the things the doctor allowed her to do. ..I think she felt, you know, special in that she was being allowed to do all these things neat things. ...Just the way she starting carrying herself after she started the project changed. [Sally] was never a confident girl. Suddenly, she's showing a confidence and maturity. I really think the internship made all the difference for her. I think it made a difference for most of the students.

Teacher #12:

Some students love it [doing service], others hate it. The students who hate it are the ones who think they know it all and then suddenly they are given some responsibility and they can't handle it. The students who love being in the community projects are the ones who are itching to be treated as grown ups. They want to grow up so fast, you know. ...They love being able to make decisions and being part of adult processes. ...The service projects provide them with opportunities to create and design something that will really make a difference to something that matters to them. That's the key to the success of these programs.

Teacher #23:

It's amazing what these kids can do when we just let them work on things that they really care about. And when the topics are serious, like AIDS or sexually transmitted diseases, even the goof balls pay attention and want to be involved. ...The leadership skills the community service program has given them is amazing. ...The kids are learning to take control of their lives, to make difficult decisions about important matters, and to understand the responsibilities that come along with being an adult.

These comments suggest that when the students were challenged to take on adult roles, they were eager to meet that challenge and prove to their teachers, their service partners, their peers, and most importantly themselves, that they could get the job done and do it well. While the empowerment students gain from service appears to influence students' personal development the most, there is some indication that it also may lead to students taking more interest in school and their community (academic and civic development), as well as a means to

take on leadership roles among peer groups (social development), often to the pleasant surprise of many. As two community agency members revealed, they were "surprised to see such a young child take on so many responsibilities with such finesse and determination" and how they "never imagined high school students could do so much."

The most negative comments from students about their service experiences were from students who were disappointed with their community placements. When students indicated that they performed service which they described as "useless", "meaningless", "boring", or "pointless", the level of empowerment these students had on their projects was very low. In most of these cases, students either followed orders given by adult supervisors or were left to fend for themselves in an unstructured, non-nurturing atmosphere. It is interesting that the degree of satisfaction and overall influence on the students were lowest when the service activities provided students with few opportunities to take on leadership roles. It is likely that when students are engaged in service activities where they "have some control" and are "really making a difference", the overall educational outcomes of the service projects will be greater and more positive, in all domains.

Believing in the Cause

Another theme, related to the empowerment theme, that emerged among the data revolved around students' belief in the cause which their service activity attempted to address. Since the purpose of service programs is to benefit someone (the service provider, the service recipient, or both), a reason for engaging in the service activity must be present. The fiercest complaints about students' service experiences focused on "requiring" service. A number of students, as indicated earlier, resented being forced to engage in service activities

for which they had no interest in the cause. However, when students were engaged in projects in which they addressed an issue of great, personal concern — violence, child abuse, homelessness, immigrant bashing, etc. — the potential for positive responses by students appeared to rise dramatically.

Several aspects of the data suggest that the "cause" surrounding the service activity is often the determining factor as to whether the students will engage themselves fully in the activity. Data from teachers during their focus group interviews revealed that service projects seem to fail most often when the service activities are not intriguing or interesting to the students:

Teacher #8:

"Last year I tried to get my students to do a project with the [local] symphony, which really needed some assistance. The musicians there were so eager to work with our students. But there was a lukewarm response from the students when I mentioned it. ...I played it up and all. They would get free tickets to concerts and get to meet with the musicians, and things, which I thought were quite nice. Some musicians even offered free music lessons to the students who would volunteer. Imagine! But only one student volunteered. I urged several other to volunteer there. They showed up a few times and then requested to have another placement. They just weren't interested. I thought it was a real shame.

Teacher #14:

I give my students a three week window to change their service placements....They have to like the placement, believe in the issue that they're working on. Otherwise, it's just another assignment for them. I want them to really get something out of it.

Observations of students engaged in their projects revealed similar findings. In many cases, students would hold passionate discussions with their fellow students about the particular *cause* they were addressing at their service activity. This was especially true among those students who were serving in agencies that addressed social causes (e.g., homelessness, drug abuse, violence,

recycling, health awareness, etc.). Students who served in more industry-related organizations (e.g., media centers, hospitals, schools) tended to be less inclined to argue for or actively promote their causes. Nevertheless, the students who indicated a positive service experience tended to have some affinity to the issues they addressed in their placements.

During one classroom observation, the researcher was privy to a debate between a student and his classmates. The student was being adamant in his quest to ensure that everyone of his classmates recycle all recyclables "to reduce waste" and "save the environment from further destruction". The students classmates were debating him, trying to shed light on the realities of recycling. These students were stating: "It's a pain"; "I don't want to have to carry these aluminum cans around until I find a recycling bin"; and "If you want to recycle, go for it. I don't think we should be forced to." The passion and authority with which the recycling advocate led the debate was interesting to watch. He presented statistical facts about how the environment is deteriorating, used projective examples ("by the year 2005") to make his point. And he listened respectfully to comments from his unconvinced and seemingly unappreciative peers. For this one student, the combination of his interest in the health of the environment and his service in the school's recycling program was a good match. If this student had engaged in another service project, perhaps the educational outcomes of that project may not have been as profound for him. It was obvious that this student's passion for the cause made a difference in the approach, attitude, and enthusiasm with which he approached the project.

When students served in placements for which they had little interest, their experience tended to be less rewarding overall. One student's comment epitomized the sentiments felt by many students who were not satisfied with their service placement:

Student #399:

I really didn't want to do my service at the homeless shelter but I had to because there were no more tutoring spots. I wanted to tutor the kids at [the elementary] school but Mrs. Jones said no. I finished my service, but I really didn't care about the homeless people. ...I would of gotten more out of it if I got to tutor. I hope I can tutor next year.

Sentiments such as this suggests that serious consideration needs to be given to students' interests before service placements are decided upon. A good match between student interest and student placement may well determine whether or not the service program will have a positive outcomes on students' educational development.

The Culture of Service

Another theme that emerged had to do with the way service is viewed by the students, the schools, and the community. As was mentioned earlier, issues surrounding service "requirements" were the most contested components of the service programs. Service requirements create a culture of subservience whereby students are disempowered to engage in service activities for which they have true passion (Levison, 1986). Consequently, the nature of service requirements may ultimately affect how students view service and how they approach their service experience.

The data from the study suggest that the culture surrounding the service program (e.g., in which department or program at the school the program is housed) has a bearing on how students view service. At North High School especially, students in the two houses that do not engage in community service viewed the other three houses as being less academically rigorous, and generally "less than" on all accounts. To these non-service students, service is seen as something the "non-academic" students do; it is not something they should

engage in. As several students in these two non-service communities stated during their focus group interview:

I don't have to do community learning. I'm in AP classes.

I think the people who select the communities that do community learning do it because they don't want to be in the AP classes. They rather work in a hospital or something.

I was thinking about joining one of the community learning program communities. But my mother said that it's for those kids who can't do the school work and need an alternative program.

While the community learning program is described by the school's teachers and administrators as a "rigorous" and "challenging" program, some students view the program and its service activities as an "alternative", "vocational" and "non-academic". This sentiment, which is especially pervasive among the students who are not in the community learning program, has a strong bearing on how the students in the community learning program view their service activities and themselves:

I've heard kids in the [other] communities say we're in [this] community because we not as smart as them. I think they're just jealous that we get to do fun stuff in the community and they just get to do boring book work.

My best friend [Susan] is in the [non-community learning] community and she's always saying her community is better. I think we're the best. Even though she says her community is the best, she hates it. I love mine."

The implications of this rivalry on the students' educational development is not clear. However, it is possible that students at North High School who may have benefited from participating in a community learning experience are not enrolling in the appropriate community because they believe the community learning program is inferior. In addition, it is possible that for students in the

community learning program, the stigma of being in the "lesser" community may explain some students' aversions to their service activities.

These data may also suggest that if service programs, like traditional vocational education programs, have a stigma of being less academically rigorous, then perhaps there is some self-selection issues to consider. It may be that students who do not participate in service programs are more academically inclined while students who do participate are less academically inclined. While the academic inclinations and abilities of the students participating in this study could not be fully determined due to the researchers' inaccessibility to students' official academic information (e.g., test scores, report cards, etc.), researchers may want to explore further the degree to which group or "cultural" attitudes towards service affect students' program participation and the ultimate outcomes the programs have on students.

The Fostering of Collaborative Units

One final theme that emerged from the data was the way the service programs fostered collaborative units among students, between students and teachers, and between students and their community agency supervisors. Many of the service programs, especially the service-learning classes, engaged students in groups in which students of multi-cultural, multi-racial, and multi-ethnic backgrounds worked together on a common issue. The study findings suggest that the mixed groupings did not create tension among the students in the groups, even when such tensions were reported by several teachers to have existed prior to the start of the service activities. As one teacher stated:

Students who I never thought would work together are now buddying up on a service project. When I asked them about this, they said they both care enough about the issue at hand

to put their differences aside. I found this to be an extremely mature move on their part, much to my own surprise.

Evidence of this was also noted in data presented earlier in this chapter.

Although there were some disagreements among some of the groups, the disagreements were mostly about individual's contributions (or lack thereof) and not about students' personal backgrounds. As was suggested earlier by one teacher, when students all rally around an issue they care about or feel passionate about, the work they must do to address that issue fully transcends any differences those students might have. By understanding issues such as this, one can seek out ways of designing service activities that can produce the most effective outcomes for students.

The development of various types of collegial bonds, working relationships, and friendships formed as a result of the engagement in a service experience, were evident among several data sources. Students, teachers, and community agency representatives provided several indications that the service experiences helped students feel like they belonged to a group and provided students opportunities to establish new friendships and personal relationships. Students stated:

I've made such great friends.

It was hard working on a group project a first. But now we all get along and it's great fun.

My [agency] supervisor is like a mother to me. She is someone I can talk to about anything.

Teachers stated:

Working on the violence project has brought us all together. There have been lots of tears, especially when the students have shared stories about their personal experiences. It's a real bonding experience.

This was one of the best classes I've ever had. I think it's because we all felt close to one another, like a family.

Community Agency Supervisors stated:

I am sad to see [Michael] go. He is such a good worker and such a nice kid. I kept telling him I'd adopt him as my son, but he wouldn't agree to that.

What a great bunch of kids. They were so enthusiastic about working at the hospital. ...They cheered all of us up every time they were here. It won't be the same without them.

Along with the evidence above, several students indicated in their interviews and journals, that they "love" the people with whom they worked and they will "never forget all the things" their community learning supervisors did for them. About 30% of the students indicated that next year, they would return to their current service placement. Whether or not this actually occurred could not be determined.

While the degree to which the fostering of collaborative units played a role in affecting students' educational development is unclear, it is probable that the formation of such units created a more pleasant and comfortable experience for the students, leading to their overall satisfaction with the service experience. The ability of service programs to foster strong bonds among students, teachers, and community representatives likely have some bearing on the outcomes of service activities on students' educational development. This implication should be explored further in future research studies.

CHAPTER SIX

DISCUSSION OF THE FINDINGS AND CONCLUSIONS

Schools tend to function as though they were the educational center of the universe, rather than a part of the learning experiences of people as they journey through life. School programs can do much to help students understand living, but they are not life itself. The educational process should help young people make connections with the world in which they live, and help them understand how to learn from experience.

Robert Shumer, 1987, p. 16

Summary of the Findings

The purpose of this study was to examine previously unaddressed issues regarding the educational outcomes of various types of service programs for high school students. The study examined whether or not there were substantial differences in educational outcomes between a group of students who performed service (n=344) and a group of students who did not (n=185). The study also explored differences in educational outcomes among students in four program groups — community service, service-learning, internship, and no service. To capture the educational outcomes of the programs, the study employed a variety of instruments and protocols designed to measure high school students' development in six educational domains: academic, career, ethical, social, personal, and civic development. A series of quantitative and qualitative analyses were conducted in each of these domains to determine if differences in outcomes exist between the three service groups and the no service group.

Based on the results from both quantitative and qualitative data analyses, the study found that there were substantial, discernible differences between the

students who performed service and the students who did not. Differences between the service and no service group were observed in all six of the educational domains. However, the study found only minimal differences in outcomes between the different types of service programs for the six domains.

In investigating the differences in outcomes between the service and no service groups, an ANCOVA was conducted for each of the six domains, based on students' response to an attitudinal survey. In addition, a set of qualitative analyses was conducted which involved reducing and placing qualitative data (from journals, interviews, observations, etc.) into a meta-matrix to facilitate the identification of recurring patterns and themes.

Each ANCOVA result found that the mean of the post-test domain score of the service group, adjusted for initial differences in gender, grade level, ethnicity, school site and students' pre-test domain scores was significantly higher than the no service group's post-test domain score at the .05 level of significance. However, for all six domains, the effect sizes were small. In addition, two-way and three-way interaction analyses were conducted for each domain, using gender, school site, and group (service, no service) as independent variables. Controlling for ethnicity, grade level and students' pre-test domain scores were used as covariates. The three-way interaction analysis found that the interaction of effect of group, school site, and gender was significant at the .05 level of significance for the academic and ethical domains. The significant results were submitted to Tukey tests which revealed that for the ethical domain, the adjusted means of the North High School males in the no service group were significantly lower than the adjusted means of the service groups (both male and female) at North and South High School, at the .05 level of significance. For the ethical domain, the adjusted means of the North High School males in the no service group were significantly lower than the adjusted means of the North

High School females in the service group, at the .05 level of significance. Few valuable interpretations could be derived from the interaction analysis findings.

The qualitative analysis of student interviews, journals, school work, and other data sources revealed additional differences between the service and no-service groups across all six educational domains. In particular, findings from the analysis revealed that for each of the six domains, the service group tended to contain more elaborate and profound discussions about student development than did the no service group.

Quantitative (ANCOVA) and qualitative analyses were also conducted to determine if there are significant differences in educational outcomes among the four student groups studied (community service, service-learning, internship, and no service). While the ANCOVA for each domain found significant differences between groups at the .05 level of significance for four of the domains, the qualitative analysis did not find any discernible differences in outcomes between the groups. The ANCOVA did find a significant difference ($p < .05$) between the community service and the no service group in the academic and ethical domains. However, the Tukey tests revealed that this difference was not significant at .05 level of significance. Overall, the qualitative analysis found no identifiable domain patterns (outcomes relating to a particular domain) within any program type. All four groups studied — community service, service-learning, internship, no service — had examples of positive educational outcomes in all six of the educational domains. Although the service group's responses generally were stronger and occurred more often than they did for the no service group, there was no evidence that one type of service program dominated a particular domain or that one domain predominated within a particular type of program.

In addition to these findings, several themes emerged that provide insights into the nature of service programs' outcomes for students. One theme focused on the individualized nature of service program outcomes. The study found that not all students who participated in the same service activity received the same benefits. It appears that the educational outcomes students receive from a program are dependent upon the knowledge, skills, talent, and interests individual students bring to the service activity. In addition, the study found that one service activity can affect students in more than one domain. These findings suggest that service program outcomes are student specific and are very difficult to predict at the start of a program.

The findings also revealed that, in some cases, service programs empower students by providing them with opportunities to take on leadership and adult roles. The students who were most positive about service activities felt like they were being taken seriously and treated with respect by adults. Evidence of this was noted across all three service program types. Little evidence of student empowerment was found in the no service group.

The study findings also suggested that student outcomes are likely to be greater when there is a good match between students' interests and the service activity. When students lacked interest in the cause upon which the service activity was based, the outcomes of the service program seemed less rewarding for the students. Evidence of this was noted across all three service program types studied.

Another study finding revealed that school and peer culture may have some influence on how students view their service program and ultimately approach their service activities. The study provided some evidence that academically inclined students were less inclined to participate in service activities if the service programs or service classes had a reputation for being less

academically rigorous than other programs. In contrast, the students in the service programs tended to believe that their service activities were more challenging and interesting than were their classroom activities not related to service.

Finally, the study found that service programs often provide students with opportunities to bond with adults and peers, and to form new friendships and relationships. Because of the formation of these new relationships, students reported that they felt more needed, more wanted and part of a group. The study found less evidence of this level of bonding among students in the no service group.

Limitations of the Study

Although the study was designed to provide a more comprehensive approach to studying the various outcomes of service programs, it has several limitations.

Design of the Study

Perhaps the most serious limitations are rooted in the design of the study. Specifically, the study did not employ a design that could fully explore the non-equivalence of the student groups. The sampling of the study was one of convenience whereby the researcher had no control over the makeup of the student groups or the actual experiences students encountered inside (and outside) their classrooms. Consequently, although some significant differences were found between students in the service group(s) and students in the no service group, these findings might have been due to unexamined initial differences between the groups. For example, the student groups may initially

have been different in characteristics such as grade point averages, religious backgrounds, and/or overall school attendance rates, none of which the study took into account.

The study also did not take into account many other demographic and environmental factors between groups such as individual classroom set ups, differences in individuals teachers' experience and effectiveness, differences in times of the day when classes and programs were being held, all of which may have affected the outcomes of the study. And since the study findings are based on students' participation in over 200 different service projects, the lack of a full account of differences in duration of service projects and level of project difficulty make the findings of the study subject to many possible alternative explanations.

Unfortunately, the limited access the researcher had to the students and the classrooms did not allow for the further exploration of potentially informative data about the students and the programs. Future studies of service programs should consider more sophisticated designs in order that important differences between groups can be more fully accounted for in the analysis.

Selection Bias

A purpose of this study was to compare the outcomes of three different types of service programs (in comparison to a group of students not in a service programs) to determine if different types of service programs foster different outcomes. To do this, the researcher searched for schools which concurrently operate community service, service-learning, internship programs and which could also identify a group of students who were not participating in any of the school's service programs. The researcher was able to locate only six schools in

California that fit this description. In the end, only two of these schools participated in the study.

Given this scenario, it is very possible that researcher selection biases might have influenced the results of the study. For example, the six schools that were initially identified for participation were recommended for their outstanding service programs by experts in the service field. The two schools which did participate in the study each considered the engagement of students in the community as an important part of the school's overall mission (See Chapter Four). And the classrooms which were studied within these schools were taught by teachers who were described by their site administrators or service coordinators as "fantastic", "wonderful with the kids", "the best", "very cooperative", and "last year's Teacher of the Year." Therefore, it is possible that the significant differences found between the service and no service groups were due to the fact that the most of the service programs studied were recognized, effective model service programs taught by effective and well-respected teachers. The results might have turned out differently if the service programs studied had been less recognized and had been taught by less able or less experienced teachers. This is one issue that researchers who replicate this study certainly should consider seriously.

Another limitation of the study was its questionable representativeness of the study's student sample. A study is most likely to have a representative sample when all members of the population have an equal chance of being selected in the sample (Babbie, 1975). However, in this study, members of the schools' student bodies did not have an equal chance of being selected. Based on the researcher's criteria for student groupings, the principals and/or service coordinators decided which teachers at the school would have the opportunity to participate. Beyond this, teachers decided which of their classes would be

permitted to participate. And finally, students and their parents chose whether or not the students would participate in the study. Therefore, the study's sample is based primarily on self-selection at various levels of the design. This is important to note since this selection bias may have produced results which misrepresent service programs' potential educational outcomes for students.

Independence of Educational Domains

Another limitation of the study is in its assumptions about the independence of the six educational domains. The study conducted an ANCOVA for each domain and categorized the qualitative data into the meta matrix by domain. The results of each domain were considered individually without much regard to the interrelationship between and among the domains. Findings from the qualitative analysis suggest that perhaps there is some interdependence among the domains. The study found that, at times, outcomes for individual students spanned across domains. Perhaps future researchers may want to investigate the interdependence of these domains by designing a study that employs MANOVA or other appropriate analysis techniques.

Limitations of Measures and Protocols

The greatest criticism of this study is likely to come from those who will question whether participant self-reports and researcher observations, in and of themselves, can sufficiently ascertain students' development in each of the educational domains central to this study. In other words: Can the measures and data sources used in ESEE truly determine whether or not students have had significant development in academic achievement, career development, and/or any of the educational domains?

The extent to which individual students' educational development could be assessed remains in question. For the most part, the data upon which the results are based are from self-reports provided by students, teachers, and community agency representatives. This information was supplemented by data about students provided by teachers and others. While the researcher did conduct some observations and reviewed samples of student work, these data, in and of themselves, were insufficient to be able to draw any firm conclusions. Academic development was especially difficult to capture. For the most part, inferences regarding the outcomes of service on students' academic achievement had to be made primarily based on students' own accounts of their degree of learning, overall content mastery, and attitudes toward school.

Unfortunately, in order to maintain confidentiality, the researcher was not granted permission to observe particular students throughout the day or review individual students' school records or scores on standardized tests. This imposed serious limitations on the researcher's ability to capture some important hard evidence about students' outcomes and/or further explore issues that were perceived by the researcher to be interesting or informative.

Strengthening the weak scientific nature of this kind of research continues to be a challenge to education researchers, as well as other social science researchers. Social science researcher Earl Babbie (1975) writes, "The criticism that given generalizations from social science research are subject to disconfirmation in specific cases is not a sufficient challenge to the scientific character of the inquiry. ...Physical science is not exempt from this challenge. ...The fact remains that social norms do exist, and the social scientist can observe those norms" (pp. 27-29). Thus, in line with Babbie's thinking, this kind of study is less able to determine cause and effect, but rather could help to capture the

norms that develop among the various types of high school service programs as they relate to particular aspects of students' educational development.

While measurement of attitude is frequently challenged as unscientific, it does provide insights into the character of social norms (Babbie, 1975). For this study, the assessment of student attitudes through written pre-tests and post-tests, journal questions, and other sources of data allowed the researcher to determine if the nature of the service program influence students' attitudes in significant ways. Perhaps with further study of service programs that employs a comparative, cross program design, norms of educational development within specific types of service programs can begin to be established.

The use of multiple measures and instruments in a study such as this is essential since, as Farnham-Diggory (1990) points out, not every aspect of student development can be measured by paper-and-pencil tests. In her criticism of the overuse of paper-and-pencil tests to assess student learning, Farnham-Diggory (1990) states that paper-and-pencil tests "can tap only declarative knowledge — not procedural, conceptual, analogical, or logical knowledge. ...Children therefore grow up through the school system expecting to be told exactly what they are supposed to learn for written tests, writing it down, and learning it more or less adequately. This type of instruction is convenient to fractionate and easy to dispense to groups. It all works out quite well, except, perhaps for the human race" (pp. 157-58).

According to Farnham-Diggory, there are no simple easy-to-administer, paper and pencil tests that can fully measure a child's ability to meet the real challenges of adult life. Instead, a combination of measures that may include a content analysis of classroom observations, student and teacher interviews, student interactions, and other non-written data sources, in addition to more traditional paper-and-pencil assessment tools, can provide researchers with a

foundation for a more comprehensive data analysis and greater opportunities to more scientifically justify the results. In this way, the results can withstand greater methodological scrutiny and ultimately be considered more valid. The design of ESEE, was based on this premise.

Implications of the Study Findings

The significant differences between the service and no service groups found in the study can be used to think about how educators might begin to make a case for adopting service activities in high schools. Given that the group differences were evident across all six domains suggests that service programs have the potential of helping schools meet each of Goodlad's K-12 educational goals. But beyond simply highlighting the potential outcomes of service programs, the findings of this study have several implications for better understanding *how* service programs affect students. In addition, the findings provide insights for developing more effective means of researching the outcomes of service programs on students' educational development.

Unintended Outcomes of Service Programs

One implication of the study findings is that service programs outcomes go beyond their intended educational goals. In many cases, the outcomes are amorphous and unpredictable. While it can be assumed that most school-sponsored service programs operate with particular educational goals in mind, the ultimate outcomes of the programs seem to be more dependent upon the unique interactions among the student, the service activity, the community, and a host of other influences than on any predicted or predetermined goal.

An intended educational goal of a history service-learning class, for example, may be to enhance students' understanding of history; indeed, this goal may be realized by some students. It is also likely that for other students in the class, the service-learning activities may enhance their personal development, contribute to their career development, and/or advance their social development, without doing anything for their understanding of history. If academic development (greater understanding of history) is the only aspect of the program that is deemed to be important for this service-learning class, then one can say that this class was a failure for a number of the participating students, even though the students may have found the service-learning experience to be very rewarding in other respects.

If researchers base their outcome measures only on expected or predetermined outcomes, then it is likely that much information about the outcomes and impacts of service programs will be lost. Designs of future studies of service program outcomes should be able to cast a net that is wide enough to ensure that the unintended outcomes of programs are captured. The utilization of only a limited set of measures is likely only to capture a small snapshot of a broad and lush landscape.

The Universality of Service Programs

In this study, data were collected from students from different backgrounds, at different grade levels, with a broad range interests, and with varying degrees of ability and talent. As was determined through their journal responses and student work samples, participants of the study included gifted students, special education students, Limited English Proficient (LEP) students, migrant education students, and "at-risk" students, as well as some students who highlighted the fact that they were not part of any of these categorical programs.

While some of the students were shy loners who preferred to work independently, others appeared to be confident and popular students who relished group work.

Given the broad range of individual differences among the students participating in the study, the significant findings of the study, especially the differences that were found between the service and no service groups, suggest that service program outcomes likely transcend age, ability, and ambition. Indeed, service programs can be adapted to most educational settings. In California alone, successful K-12 service programs can be found at every grade level, in every academic discipline, and in virtually every type of community (urban/rural, wealthy/poor, homogenous/diverse). Therefore, service programs are unlike many other federally funded educational programs (e.g., gifted and talented education, bilingual education, special education, migrant education) which target particular student populations. Instead, service programs have the potential to produce positive educational benefits to all students, not just a particular group or a select few. All students potentially can participate in service, even students with severe physical or physical limitations. Consequently, every student can *potentially* benefit educationally in some way from engaging in a meaningful service activity. Of course, as the study findings imply, certain conditions must be present (e.g., matching service activities with students interests) in order for the service activity to produce meaningful educational benefits for students.

As some of the study findings revealed, when a service program is perceived as one that is geared for particular groups of students (e.g., the students who are less academically inclined), it begins to lose its universal appeal. Very little has been written about this issue as it relates to K-12 students. Having a better understanding of how a universal approach affects different students in

different settings can play a pivotal role in implementing service initiatives such as California's public education Challenge Initiative (See Chapter One).

Individual Student Contributions

Although an appropriate service project potentially can be developed for every student, every student is not likely to benefit from the service project in the same way. One of the emerging themes of the study implies that the individuality of the student should be taken into account when investigating the outcomes of service programs for students. The interplay of a student's prior service experience, motivation to do service, enthusiasm for particular service activities, and personal interests and talents appear to have a strong influence on the outcomes the student achieves. The importance of accounting for this was noted by Conrad (1980) who in his study found that experiential education program outcomes are predominantly based on students' individual experiences.

Most service program research to date has been preoccupied with trying to show positive outcomes and has not dealt with the deeper issues of what causes those outcomes to manifest. As K-12 service research matures, deeper investigation of the educational *impacts* of service programs will likely provide a better understanding of which personal aspects have the greatest predictive value for outcomes in the various domains. This information will be helpful to educators in designing the most appropriate and effective service opportunities for students.

Clarifying Program Definitions

In order that a rationale can be established for developing specific *types* of service programs, this study sought to determine which type of service program tend to foster which outcome(s). According to the National and Community

Service Trust Act, service-learning programs integrate service into the academic curriculum so that students can enhance their academic development and civic participation. And many schools develop service-learning activities for these educational purposes, just as internship programs are typically established to enhance students' career and academic development, and community service programs are typically established to enhance students' civic responsibility and ethical development.

However, while there are several distinctions among these three types of service programs, there only appear to be slight differences among certain groups in certain domains, as the quantitative analysis revealed; no discernible differences in outcomes were observed among program types in the qualitative analyses. One reason that no strong distinctions in outcomes were found among program types may be that the terms used to define the programs types are not always used consistently. Terms such as volunteerism, community service, service-learning, internships, field education, field studies, community-based education, and community service learning are sometimes used interchangeably (Stanton, 1987). In reviewing the literature on service program studies, the definitions for the terms used to label the programs under investigation were not consistent across the studies. One researcher's definition of internship would be another researcher's definition of service-learning.

Even among the students and teachers who participated in this study, the same program had many labels. During one classroom observation conducted by the researcher, one student commented "I'm doing my service-learning internship tomorrow", to which his classmate replied, "I'm all done with my community service." While the researcher of this study had divided the 24 service classrooms and program into the three program groups according to pre-determined definitions of different types of service programs (see Chapter Two),

the distinctions among these program types were not always obvious to the students and, in some cases, to the teachers. Perhaps the inconsistencies in the way service programs are labeled may have some influence on how students approach the program and perhaps may also influence the ways in which student outcomes are fostered.

Researchers studying service programs should clearly define what type of service program(s) they are studying. In describing the difficulty of finding a definition just for service-learning, Timothy Stanton (1987) writes, "Finding a single, firm, universally acceptable definition of service learning is like navigating through a fog" (p. 2). He goes on to ask, "How do we distinguish service learning from cooperative education, internship programs, field study and other forms of experiential education?" (p.2). A better understanding of the similarities and differences among the various types of service programs must be explored further so that a common, more universally accepted set of understandings about the various service programs types and their educational outcomes for students can be developed.

Employing Comprehensive Research Methodologies

This findings of the study also have implications for future research methodologies that should be employed when conducting service research. The use of quantitative and qualitative approaches in conducting this research appeared to be a valuable aspect of the study. While the quantitative data were able to show statistically significant results, the qualitative analysis was able to capture the subtleties and idiosyncrasies of individual students and programs. While service program researchers are under increasing pressure to produce quantitative data on service program impacts, quantitative data analyses should be complemented with qualitative approaches. If this study had included only a

quantitative analysis, the findings of the study would have been significant, but many of the emerging themes likely would not have been identified.

In addition to employing quantitative and qualitative analyses, service program researchers also need to employ more comprehensive and methodologically sophisticated research designs. The findings of this study confirm existing beliefs that service programs are complex enterprises that are defined by the nature of service activities, the individuals who serve in them, the school environment within which the programs operates, and the community in which the service activities take place (Kendall & Associates, 1990). Therefore, service program research must move beyond using a pre-/post survey and/or a journal reflection essay as the primary means for assessing student outcomes. Service research designs must be comprehensive enough to take into account many of the program variations that exist, such as the length of the service activity, the degree to which students reflect on their service experiences, the varying intensities of the service projects (reading to a child who is dying of cancer versus painting a mural as part of a graffiti abatement program), the nature of the students' working groups (individual service activities versus small or large group service projects), the degree of choice students have in selecting their project, and a host of other variables. Even within a small service program, there are numerous variables for which there must be some account.

Although it is impossible to control for all the variables that potentially can influence student development, the research designs must be able to capture the multitude of anticipated and unanticipated outcomes of service activities across a broad range of classrooms, schools, communities and student populations. While the comprehensive, multi-dimensional design of ESEE was a first step in moving closer toward this goal, the system was still inadequate for determining *causal* relationships between a service activity and its educational

impact on students. At best, the study was only able to ascertain that there are significant differences in outcomes between students who perform service and students who do not. The reasons *why* these differences are present and *what* aspects of the service activity cause the differences in outcomes remain unexplained.

These causal links may be determined with more sophisticated research designs. Hierarchical linear modeling and some of the other more sophisticated approaches can be useful in measuring a variety of service program impacts by incorporating various units of analysis (students, classrooms, programs types, schools) across a variety of sites. However, the service field still has a long way to go before the utilization of such designs become standard. The field still needs to solidify its definition of service and develop a formal theory for how service programs impact students' educational development.

A Theory for School-Sponsored Service Programs

The findings of the study have implications for developing a theory for explaining the educational outcomes of school-sponsored service programs. These implications are described in this section.

Common Service Outcomes Amidst Idiosyncrasy

Despite the idiosyncratic nature of the 24 service classrooms studied, and the individual nature of service programs in general, the emerging themes identified in the study reveal some interesting characteristics about how service programs affect students. The study found evidence across all three types of service programs included in the study (community service, service-learning, and internship) that service can help students:

- feel empowered as they take on leadership and adult-like roles;
- engage in service activities that allow them to further explore interests and talents;
- engage in collaborative work that is centered around a cause of mutual interest;
- form new collaborations, friendships, and relationships; and
- feel a sense of ownership and pride for their service activity.

These themes did not emerge from among the 10 "no service" classes studied. The fact that these common elements were found despite the service programs' idiosyncrasies suggest that perhaps these themes (and possibly others that were not captured in this study) are potential core service program elements that have a bearing on students' development in the six domains.

The presence of these themes also support the notion presented earlier that service programs are universal and potentially transcend artificially imposed classifications such as grade level, academic discipline, and program labels. The aspects of the themes — leadership, empowerment, relationships, collaboration, exploration of individual talent and interests, developing a sense of ownership and pride — are all fairly natural aspects of the human condition. In his book, *The Call of Service*, Robert Coles suggests that individuals who engage in service receive a set of satisfactions which include: getting something done so that one feels something has been reached; developing a personal "moral purpose"; developing "personal affirmation"; building "stoic endurance"; and feeling that one has been provided with "a boost to success" (1993, pp. 68-94). Even though Coles's book is not primarily about *students* who engage in service, the correlation of the study's emerging themes with Coles' set of satisfactions suggest that the service experience potentially has a common set of manifestations that

reveal themselves based on the needs of the individual who engages in the service activity.

Perhaps there is a set of common core elements that are inherent in all service activities. It is possible that as students engage in service activities, these common elements are shaped by the individual characteristics of those who serve, the nature of the service activity, the result of the service that is provided, among other factors, ultimately producing individual outcomes. Research on service programs should perhaps move away from trying to find *direct* links between students' participation in service programs and outcomes in the six domains and move more toward investigating how students proceed and progress through these core elements to ultimately arrive at their outcomes in the six domains.

Having a better understanding of these intermediate conditions, one might be able to better predict how certain students will be impacted by particular types of service programs. As was true of this study, the hypotheses that have been tested in previous studies of K-12 service programs have focused primarily on investigating the direct links between students' participation in service and outcomes in the six educational domains. However, testing a hypothesis that assumes direct links between a service activity and educational outcome (academic, career, etc.) appears to disregard some important intermediate conditions that may very well play a role in affecting student outcomes. Perhaps these intermediate conditions provide valuable information about student development in one or more of the six domains. Or, perhaps there is an essential interplay of these conditions (and possibly others) that create a particular environment that ultimately cause students to be affected in different ways. This perhaps may be a key to the development of an impact theory for youth service.

Establishing a Theory for K-12 Service Programs

A major hindrance to the widespread legitimization of school-sponsored service programs has been the lack of a well-tested theory that explains the ways in which service impacts students' educational development (Shumer, 1994). Rather than testing *theories* about service program impacts, most service researchers have had to contend with testing *assumptions* about service outcomes, most of which have originated from anecdotal data. A theory that explains how service programs impact students would help provide the field with a scientifically acceptable set of principles that could be tested under a variety of program situations. Albeit a complicated feat, this theory would move the field closer to defining the causal links between students' service activities and students' educational development.

To do this, some new hypotheses about how service programs impact students need to be considered. Although most of the hypotheses tested thus far have tried to find out if there are some significant differences in educational outcomes between students who do service and students who do not, the literature has not defined identifiable patterns between a specific type of service activity and its educational impact on a particular student. Consequently, without any identifiable patterns in place, service program outcomes continue to appear unpredictable, amorphous, and serendipitous. Before service programs will be seen as a legitimate approach to educate K-12 students, there will need to be a better understanding of *how* service programs affect students.

Some service program experts might say that the outcomes seen among students in service programs can be explained by the well-established experiential education and constructivist teaching theories espoused by Dewey, Piaget, Bruner, Kolb, Kohlberg, and others. As was described in Chapter Two, elements of experiential education and constructivist teaching approaches are

evident in most types of service programs. However, unlike other types of experiential education approaches (e.g., project-based learning, apprenticeships, etc.), service programs involve an intentional act to do something beneficial for others. Giving, serving, and meeting the needs of others are the common defining aspects of service programs which set service programs apart from other forms of experiential learning (Boyer, 1987). Since these aspects likely play pivotal roles in the fostering of meaningful educational outcomes for students, it is therefore not enough to look at experiential education theories alone to explain why service programs have certain positive effects for particular students.

What the K-12 service field needs is a theory that focuses specifically on service and its implications for student educational development. This theory should be founded upon experiential education theories, be supported by previous service research, and be applicable to all types of service programs. Specifically, the theory should help explain how the interplay of the core conditions that are common to all service programs have a bearing on students' educational outcomes in the six domains.

This theory might be based on stages of service development that delineates a cycle of change that students undergo as they engage in service. This theory could be patterned after a theory like Kolb's learning theory which established a four stage cycle whereby learners move from concrete experiences, to reflective observation, to abstract conceptualization, to active experimentation (Kolb, 1984). For example, a possible theory for service programs might explain how the service experience first provides students an opportunity to explore their interests (personal development) and helps them form relationships with their peers as they develop their projects (social development). This then leads to a greater sense of belonging and group affinity (social development). As the students engage in their service projects, they begin to develop a sense of

contributing something to society (civic and ethical development) while learning some new knowledge and skills (academic and career development). This then leads to a feeling of empowerment and greater self-esteem, which in turn increases students' motivation to learn. Finally, with the improved self-esteem and motivation, students' academic work improves, further boosting their self-esteem.

While this cycle is purely hypothetical and speculative, it exemplifies the kind of theory that needs to be developed so that the field can move closer to better understanding how all types of service programs impact students. While the establishment of such a theory is still far off in the future, it will be needed as more K-12 schools incorporate service programs at their sites.

Conclusion

As more K-12 schools encourage their students to engage in service activities, the findings of these and other studies will provide some insights into the merits and benefits of service programs. Although the study findings suggest that community service, service-learning, and internship activities can potentially enhance students' academic, career, social, personal, ethical, and civic development, it remains unclear as to which domains are enhanced by which service programs or activities. It appears that the educational outcomes for students who engage in service are possibly influenced by several intermediate components. These intermediary outcomes may include the opportunity for students to take on leadership roles, develop new friendships, explore their interests and talents, form affinities with others who share the same interests, and develop a sense of pride.

The findings and subsequent emergent themes of this study suggest that what is needed in the field is a theory that can explain how service impacts students. Without such a theory, it will be difficult to determine from individual study findings how particular service programs impact students across the educational domains. The idiosyncratic nature on service activities, coupled by the individual personalities students bring to those activities, both of which are influenced by the local circumstances that surround the nature and culture of the service projects, make the quest for determining the impacts of service programs on student development a very difficult and complicated process. Future research studies of service programs need to employ more comprehensive methodologies that can adequately account for the complexities of these programs.

To some degree, the findings of this study support the beliefs of service program proponents who contend that service programs have positive educational benefits for students. However, beyond this, the study findings suggest that service programs may be universal, allowing any student to perform and benefit from service, regardless of age, ambition, or ability. If this is so, then service potentially can be an appropriate educational activity for any student, making Dr. King's statement, "Everyone can be great because *anyone* can serve" ring ever so true.

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APPENDIX

APPENDIX A

Instruments, Measures, and Protocols for the Evaluation System for Experiential Education (ESEE)*

- A.1a & 1b Researcher-designed student pre-test/post-test survey instruments
- A.2 8 student journal questions
- A.3 Student focus group interview protocol
- A.4 Student field placement questionnaire
- A.5 Program goals and objectives
- A.6 Teacher focus group interview protocol
- A.7 Teacher questionnaire
- A.8 Community-based organization phone interview protocol
- A.9 Community-based organization questionnaire

**In addition to the above surveys, interviews, and protocols, the ESEE process also included observation of students (classroom and service sites), informal interviews with administrators, and content analysis of samples of student work.*

APPENDIX A.1a Student Pre-Survey

This survey is designed to measure students' general attitudes towards their communities, their schooling and themselves. We would like to know your current feelings about the items presented in this survey. This information will be useful in helping us know how you feel about certain items so that we can improve your classes and time at school.

Your responses will be treated with complete confidentiality. Your name will not be used in any way. You may only take this survey if you have submitted a Parental Permission Form. (Please ask your teacher if you are not sure!).

DIRECTIONS:

- Please respond as honestly as possible
- Answer each question according to how you are feeling at this moment
- Don't spend too much time on each question
- If you are not sure what is being asked, please raise your hand and your teacher can assist you
- Complete all parts of the survey

SECTION I

Student Code: _____

Enter the anonymous student code you have selected

(You will need this code for the survey at the end of the term).

Date: _____ Grade: (circle one) 8 9 10 11 12

Your Gender: _____ Female _____ Male

Your Ethnicity [OPTIONAL]: *Please check all that apply*

- _____ African American
- _____ Asian American/Pacific Islander (e.g., Chinese, Vietnamese, Filipino, Korean, Japanese, Indian, Pakistani, etc.)
- _____ Caucasian (non-Latino, non-Latina)
- _____ Latino/Latina, Hispanic
- _____ Native American/Alaskan Native
- _____ Other (please specify) _____

APPENDIX A.1a (continued)

Your grades (so far) in school:

| | | | |
|-------|-----------------------|-------|-----------------------|
| _____ | Mostly A | _____ | Mostly C |
| _____ | About half A & half B | _____ | About half C & half D |
| _____ | Mostly B | _____ | Mostly D |
| _____ | About half B & half C | _____ | Mostly below D |

1. Approximately, how many hours PER WEEK are you currently involved in the following:

a) In a paying job: _____ hrs. per week

b) In non-academic school-related activities (e.g., sports, band, choir, newspaper, student government, clubs, etc.):

_____ hrs. per week

c) In out of school activities (e.g., church groups, scouts, political organizations, community service not sponsored by school). Do NOT include employment.

_____ hrs. per week

2. At this point in time, what do you plan to do right after finishing high school?

_____ Go to a four year college or university
 _____ Go to a two year community college
 _____ Work
 _____ Join the military
 _____ Other: Please specify: _____

3. Have you decided on which career you plan to pursue? (e.g., doctor, teacher, artist, architect, actor, lawyer, etc.)?

_____ No _____ Yes
 If yes, which career? _____

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APPENDIX A.1a (continued)

Section II

Please indicate how important the following are to you personally (1=not important, 2=somewhat important, 3=important, 4=essential). Circle only one number for each statement.

| | not important | somewhat important | important | essential |
|--|------------------|-----------------------|-----------|-----------|
| 1. becoming involved in a program to improve my community | 1 | 2 | 3 | 4 |
| 2. working toward equal opportunity (e.g., social, political, vocational) for all people | 1 | 2 | 3 | 4 |
| 3. volunteering my time helping people in need | 1 | 2 | 3 | 4 |
| 4. giving some of my income to help those in need | 1 | 2 | 3 | 4 |
| 5. finding a career that is helpful to others and useful to society | 1 | 2 | 3 | 4 |

Section III

Please indicate how strongly you agree or disagree with each statement. Circle the number that best describes your response (1=strongly disagree, 2=disagree, 3=agree, 4=strongly agree).
Circle only one number for each statement.

| | strongly disagree | disagree | agree | strongly agree |
|--|----------------------|----------|-------|-------------------|
| 1. I have a good understanding of the needs and problems facing the community in which I live. | 1 | 2 | 3 | 4 |
| 2. I feel comfortable around people from different racial and ethnic groups. | 1 | 2 | 3 | 4 |
| 3. I am not concerned about the impression that I make on other people. | 1 | 2 | 3 | 4 |
| 4. I am motivated by classes that contain hands on applications of theories to real life situations. | 1 | 2 | 3 | 4 |
| 5. Everyone should find time to contribute to their community. | 1 | 2 | 3 | 4 |

APPENDIX A.1a (continued)

| | strongly disagree | disagree | agree | strongly agree |
|---|----------------------|----------|-------|-------------------|
| 6. I feel uncomfortable presenting/speaking in front of a group of individuals in positions of authority. | 1 | 2 | 3 | 4 |
| 7. I feel that I can have a positive impact on the community in which I live. | 1 | 2 | 3 | 4 |
| 8. Working on group projects is more rewarding than working on individual projects. | 1 | 2 | 3 | 4 |
| 9. I have a realistic understanding of the daily responsibilities involved in the jobs (careers) in which I am interested. | 1 | 2 | 3 | 4 |
| 10. I learn best from classes when the information is connected to real situations in my life. | 1 | 2 | 3 | 4 |
| 11. People's jobs are much harder than they look. | 1 | 2 | 3 | 4 |
| 12. I have very little influence over the things that happen to me. | 1 | 2 | 3 | 4 |
| 13. I believe in standing up for what is right, regardless of what other people think. | 1 | 2 | 3 | 4 |
| 14. I feel that I can have a positive impact on local social problems. | 1 | 2 | 3 | 4 |
| 15. I feel I possess the necessary personal qualities (e.g., responsibility, manners, etc.) to be a successful in a career. | 1 | 2 | 3 | 4 |
| 16. When a class is relevant to my life, I learn more. | 1 | 2 | 3 | 4 |
| 17. I can't do much to affect other people's racial prejudices. | 1 | 2 | 3 | 4 |
| 18. On the whole, I am satisfied with myself (e.g., academic performance, personality, looks). | 1 | 2 | 3 | 4 |

APPENDIX A.1a (continued)

| | strongly disagree | disagree | agree | strongly agree |
|---|------------------------------|-----------------|--------------|---------------------------|
| 19. While working on a group project, I can easily accept others' criticism of my work. | 1 | 2 | 3 | 4 |
| 20. When I see something wrong or unfair happening to someone else, I usually try to do something about it. | 1 | 2 | 3 | 4 |
| 21. I usually feel uncomfortable starting conversations with people I do not know. | 1 | 2 | 3 | 4 |
| 22. The things I learn in my classes are useful in my life. | 1 | 2 | 3 | 4 |
| 23. Performing community service in my local community is easy. | 1 | 2 | 3 | 4 |
| 24. I know how to approach a supervisor or boss to discuss an important matter. | 1 | 2 | 3 | 4 |
| 25. I think the community in which I live feels that young people do not have much to offer. | 1 | 2 | 3 | 4 |
| 26. I believe that if everyone works together, many of society's problems can be solved. | 1 | 2 | 3 | 4 |
| 27. For a job, having good personal skills (e.g., promptness, responsibility, integrity, etc.) is just as important as having good job-specific skills. | 1 | 2 | 3 | 4 |
| 28. I can learn something new from people of a different ethnic group. | 1 | 2 | 3 | 4 |
| 29. I do not feel well prepared for the world after high school. | 1 | 2 | 3 | 4 |
| 30. Most misfortunes that occur to people are often the result of circumstances beyond their control. | 1 | 2 | 3 | 4 |

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APPENDIX A.1a (continued)

Section IVa.

Please indicate how strongly you agree or disagree with each statement. Circle the number that best describes your response (1=strongly disagree, 2=disagree, 3=agree, 4=strongly agree).

| | strongly disagree | disagree | agree | strongly agree |
|---|----------------------|----------|-------|-------------------|
| 1. In general, my classes at school are preparing me well for a future career. | 1 | 2 | 3 | 4 |
| 2. In general, my classes at school provide the necessary work-related skills to be a successful career person. | 1 | 2 | 3 | 4 |
| 3. In general, my classes at school should do a better job at preparing me for my future career. | 1 | 2 | 3 | 4 |

Section IVb.

Please respond to the following questions (1=never, 2=sometimes, 3=usually, 4=always).

| | never | sometimes | usually | always |
|---|-------|-----------|---------|--------|
| 1. How often does what you learn in your classes relate to your life outside of school? | 1 | 2 | 3 | 4 |
| 2. How often do your classes make you think about things in new ways? | 1 | 2 | 3 | 4 |
| 3. How often do you discuss with your friends the information taught in your classes? | 1 | 2 | 3 | 4 |
| 4. Complete the following sentence by checking only <u>ONE</u> answer: | | | | |

I LEARN BEST BY

- seeing, reading, and/or visualizing information. (visual learner)
 hearing information. (auditory learner)
 verbalizing and/or repeating information aloud. (verbal learner)
 touching and/or manipulating objects. (tactile learner)
 moving and/or physically walking through scenarios. (kinesthetic)
 doing and experiencing (experiential learner)
 other (Please specify): _____

END OF QUESTIONNAIRE

APPENDIX A.1b

Student Post-Survey

This survey is designed to measure students' general attitudes towards their communities, their schooling and themselves. We would like to know your current feelings about the items presented in this survey. This information will be useful in helping us know how you feel about certain items so that we can improve your classes and time at school.

Your responses will be treated with complete confidentiality. Your name will not be used in any way. You may only take this survey if you have submitted a Parental Permission Form. (Please ask your teacher if you are not sure!).

DIRECTIONS:

- Please respond as honestly as possible
- Answer each question according to how you are feeling at this moment
- Don't spend too much time on each question
- If you are not sure what is being asked, please raise your hand and your teacher can assist you
- Complete all parts of the survey

SECTION I.

Student Code: _____

Enter the same anonymous student code you used for the first survey.

Date: _____ **Grade:** (circle one) 8 9 10 11 12

Your Gender: _____ Female _____ Male

Your Ethnicity [OPTIONAL]: *Please check all that apply*

- _____ African American
- _____ Asian American/Pacific Islander (e.g., Chinese, Vietnamese, Filipino, Korean, Japanese, Indian, Pakistani, etc.)
- _____ Caucasian (non-Latino, non-Latina)
- _____ Latino/Latina, Hispanic
- _____ Native American/Alaskan Native
- _____ Other (please specify) _____

APPENDIX A.1b (continued)

Your grades (so far) in school:

| | | | |
|-------|-----------------------|-------|-----------------------|
| _____ | Mostly A | _____ | Mostly C |
| _____ | About half A & half B | _____ | About half C & half D |
| _____ | Mostly B | _____ | Mostly D |
| _____ | About half B & half C | _____ | Mostly below D |

1. At this point in time, what do you plan to do right after finishing high school?

| | |
|-------|---|
| _____ | Go to a four year college or university |
| _____ | Go to a two year community college |
| _____ | Work |
| _____ | Join the military |
| _____ | Other: Please specify: _____ |

2. Have you decided on what career or job you plan to pursue? (Have you decided on what you want to be?)

| | | | |
|-------|----|-------|-----------------------------|
| _____ | No | _____ | Yes |
| | | | If yes, which career? _____ |

3. In your opinion, what was the best thing about this class?

GO TO THE NEXT PAGE



APPENDIX A.1b (continued)

Section II

Please indicate how important the following are to you personally (1=not important, 2=somewhat important, 3=important, 4=essential). Circle only one number for each statement.

| | not important | somewhat important | important | essential |
|--|------------------|-----------------------|-----------|-----------|
| 1. becoming involved in a program to improve my community | 1 | 2 | 3 | 4 |
| 2. working toward equal opportunity (e.g., social, political, vocational) for all people | 1 | 2 | 3 | 4 |
| 3. volunteering my time helping people in need | 1 | 2 | 3 | 4 |
| 4. giving some of my income to help those in need | 1 | 2 | 3 | 4 |
| 5. finding a career that is helpful to others and useful to society | 1 | 2 | 3 | 4 |

Section III

Please indicate how strongly you agree or disagree with each statement. Circle the number that best describes your response (1=strongly disagree, 2=disagree, 3=agree, 4=strongly agree). Circle only one number for each statement.

| | strongly disagree | disagree | agree | strongly agree |
|--|----------------------|----------|-------|-------------------|
| 1. I have a good understanding of the needs and problems facing the community in which I live. | 1 | 2 | 3 | 4 |
| 2. I feel comfortable around people from different racial and ethnic groups. | 1 | 2 | 3 | 4 |
| 3. I am not concerned about the impression that I make on other people. | 1 | 2 | 3 | 4 |
| 4. I am motivated by classes that contain hands on applications of theories to real life situations. | 1 | 2 | 3 | 4 |
| 5. Everyone should find time to contribute to their community. | 1 | 2 | 3 | 4 |

APPENDIX A.1b (continued)

| | strongly disagree | disagree | agree | strongly agree |
|---|----------------------|----------|-------|-------------------|
| 6. I feel uncomfortable presenting/speaking in front of a group of individuals in positions of authority. | 1 | 2 | 3 | 4 |
| 7. I feel that I can have a positive impact on the community in which I live. | 1 | 2 | 3 | 4 |
| 8. Working on group projects is more rewarding than working on individual projects. | 1 | 2 | 3 | 4 |
| 9. I have a realistic understanding of the daily responsibilities involved in the jobs (careers) in which I am interested. | 1 | 2 | 3 | 4 |
| 10. I learn best from classes when the information is connected to real situations in my life. | 1 | 2 | 3 | 4 |
| 11. People's jobs are much harder than they look. | 1 | 2 | 3 | 4 |
| 12. I have very little influence over the things that happen to me. | 1 | 2 | 3 | 4 |
| 13. I believe in standing up for what is right, regardless of what other people think. | 1 | 2 | 3 | 4 |
| 14. I feel that I can have a positive impact on local social problems. | 1 | 2 | 3 | 4 |
| 15. I feel I possess the necessary personal qualities (e.g., responsibility, manners, etc.) to be a successful in a career. | 1 | 2 | 3 | 4 |
| 16. When a class is relevant to my life, I learn more. | 1 | 2 | 3 | 4 |
| 17. I can't do much to affect other people's racial prejudices. | 1 | 2 | 3 | 4 |
| 18. On the whole, I am satisfied with myself (e.g., academic performance, personality, looks). | 1 | 2 | 3 | 4 |

APPENDIX A.1b (continued)

| | strongly disagree | disagree | agree | strongly agree |
|---|----------------------|----------|-------|-------------------|
| 19. While working on a group project, I can easily accept others' criticism of my work. | 1 | 2 | 3 | 4 |
| 20. When I see something wrong or unfair happening to someone else, I usually try to do something about it. | 1 | 2 | 3 | 4 |
| 21. I usually feel uncomfortable starting conversations with people I do not know. | 1 | 2 | 3 | 4 |
| 22. The things I learn in my classes are useful in my life. | 1 | 2 | 3 | 4 |
| 23. Performing community service in my local community is easy. | 1 | 2 | 3 | 4 |
| 24. I know how to approach a supervisor or boss to discuss an important matter. | 1 | 2 | 3 | 4 |
| 25. I think the community in which I live feels that young people do not have much to offer. | 1 | 2 | 3 | 4 |
| 26. I believe that if everyone works together, many of society's problems can be solved. | 1 | 2 | 3 | 4 |
| 27. For a job, having good personal skills (e.g., promptness, responsibility, integrity, etc.) is just as important as having good job-specific skills. | 1 | 2 | 3 | 4 |
| 28. I can learn something new from people of a different ethnic group. | 1 | 2 | 3 | 4 |
| 29. I do not feel well prepared for the world after high school. | 1 | 2 | 3 | 4 |
| 30. Most misfortunes that occur to people are often the result of circumstances beyond their control. | 1 | 2 | 3 | 4 |

GO TO THE NEXT PAGE



APPENDIX A.1b (continued)

Section IVa.

Please indicate how strongly you agree or disagree with each statement. Circle the number that best describes your response (1=strongly disagree, 2=disagree, 3=agree, 4=strongly agree).

| | strongly disagree | disagree | agree | strongly agree |
|--|----------------------|----------|-------|-------------------|
| 1. In general, this class prepared me well for a future career. | 1 | 2 | 3 | 4 |
| 2. In general, this class provided me with the necessary work-related skills to be a successful career person. | 1 | 2 | 3 | 4 |
| 3. In general, this class should do a better job at preparing me for my future career. | 1 | 2 | 3 | 4 |

Section IVb.

Please respond to the following questions (1=never, 2=sometimes, 3=usually, 4=always).

| | never | sometimes | usually | always |
|---|-------|-----------|---------|--------|
| 1. How often did the information in this class relate to your life outside of school? | 1 | 2 | 3 | 4 |
| 2. How often did this class make you think about things in new ways? | 1 | 2 | 3 | 4 |
| 3. How often did you discuss with your friends the information taught in this class? | 1 | 2 | 3 | 4 |

Section IVc.

For the next question, circle one number for row A and one number for row B.

In comparison to the your other classes at school, the class you are currently in was:

| | | | |
|----|----------------------------|---------------------|-----------------------|
| A) | Much Less Interesting 1 | About the Same 2 | More Interesting 3 |
| B) | Much Less Useful 1 | About the Same 2 | Much More Useful 3 |

GO TO THE NEXT PAGE



APPENDIX A.1b (continued)

Section V

Please indicate how strongly you agree or disagree with each statement. (1=strongly disagree, 2=disagree, 3=agree, 4=strongly agree).

Begin each sentence with:

THE FIELD OR COMMUNITY SERVICE COMPONENT OF THIS CLASS:

| | strongly disagree | disagree | agree | strongly agree |
|---|----------------------|----------|-------|-------------------|
| 1. helped me better understand people from backgrounds different than my own. | 1 | 2 | 3 | 4 |
| 2. provided me with the skills to get a good job. | 1 | 2 | 3 | 4 |
| 3. helped me decide what I want do as a career. | 1 | 2 | 3 | 4 |
| 4. made me feel worse about myself. | 1 | 2 | 3 | 4 |
| 5. helped me like school more. | 1 | 2 | 3 | 4 |
| 6. made me feel included, as though I belong to the group. | 1 | 2 | 3 | 4 |
| 7. helped me feel like I can make a difference in the world. | 1 | 2 | 3 | 4 |
| 8. helped me learn more about myself. | 1 | 2 | 3 | 4 |
| 9. made me want to learn more. | 1 | 2 | 3 | 4 |
| 10. improved my relationships with adults. | 1 | 2 | 3 | 4 |
| 11. made me more afraid of my future. | 1 | 2 | 3 | 4 |
| 12. helped me better learn the various subjects I have to take in school. | 1 | 2 | 3 | 4 |
| 13. made me feel more in control of my future. | 1 | 2 | 3 | 4 |
| 14. made learning more interesting. | 1 | 2 | 3 | 4 |
| 15. made me want to take better care of others. | 1 | 2 | 3 | 4 |

END OF QUESTIONNAIRE

APPENDIX A.2

STUDENT JOURNAL QUESTIONSQUESTION #1

Describe why you enrolled in this class or program. What do you hope to get out of the program and what do you hope to accomplish?

QUESTION #2*

Describe the first week of your community activity. Was it like what you expected it to be? Describe the feelings you had as you performed your community activity.

QUESTION #3*

Describe how well prepared the community or business partners are in providing you with interesting and rewarding community or field experiences. Is there anything you wish they would do differently?

QUESTION #4

Describe your feelings about your community activity (or this *class*, if you are not engaged in a field placement or community service activity). Is it worthwhile? Why or why not? What do you like most about it? What do you wish was different?

QUESTION #5*

Discuss the working relationship you have with your community or business contact(s). Is it a close relationship, or is it more distant? Do you feel like you are working with a friend or more like working for a supervisor? What do you like most about the relationship? What do you wish was different?

QUESTION #6

What advice might you give to another student who would like to engage in a class or program similar to this one?

QUESTION #7

Has participating in this course or program made a difference in your life? Please describe how or how not.

QUESTION #8

Describe this course in comparison to your other courses (or programs). What did you like/not like about this course (program)? What would you change? Were your expectations for the course met? In what ways were they met or not met?

**Because these journal questions focused specifically on students' service placements, they were not administered to the students in the comparison (no service) group.*

APPENDIX A.3 STUDENT FOCUS GROUP INTERVIEW PROTOCOL

These questions (some or all) will be asked by the researcher at some time near the end of the school year (or semester). A group of students from the program will be asked to attend a group meeting where these questions will be asked. Each question will be asked to the group as a whole; individual students will have the option of responding or not responding to the question. Students' responses will be recorded anonymously in a "list of responses" for each question. No responses will be attributed to any student or connected with any teacher. In the event any names of persons or programs are mentioned in a response, those names will be deleted from the record and will be assigned an arbitrary letter (e.g., Friend G told me he enjoyed the program, Teacher R liked my work, etc.).

Date: _____ School: _____

Survey Group: _____

Number of Students Interviewed: _____

REFLECTION ON EXPERIENCE AND IMPACT OF PROGRAM:

1. Why did you become involved in this class or program?
2. What did you hope to learn or achieve through participation in the class or program?
3. Did you accomplish these goals? Please explain.
4. What have you learned about yourself since becoming involved in the program?
5. What have you learned about others (the community, other people, etc.)?
6. What have you learned about school and your academic subjects?
7. Did the experience have any effect on your future plans? For example, did it have an effect on your choice of major, career, or decision to attend grad school? (*Has it helped you clarify your decision or made you change your mind?*)
8. Please describe your experience working as a team (small group or entire class). What have you learned from the team/group experience?
9. Has participation in this class or program impacted or changed your life? If so, how?

REFLECTION ON PROCESS:

10. Were any situations/activities that you felt were too difficult to handle?
11. Was there enough assistance, training, and supervision for your placement?
12. What have been some of the highlights/low lights of this program?
13. What are some barriers or problems that you have experienced while in the program?
14. How would you improve the program in the future?
15. Would you recommend the program to your friends? Why or why not?
16. Would you do the program again? If so, what might you do differently, what might you do the same?
17. Do you have any additional comments or reflections on your experience that you would like to add?

APPENDIX A.4 STUDENT FIELD PLACEMENT QUESTIONNAIRE

STUDENT FIELD PLACEMENT FORM

Your Student Code: _____

Type of Agency where you are placed: (e.g., hospital, homeless shelter, elementary school)

How many hours per week do you work or serve at this site?

_____ hrs. per week For how many weeks? _____ weeks

DESCRIBE WHAT YOU DO DURING YOUR FIELD ACTIVITIES? WHAT SERVICE OR WORK DO YOU PROVIDE?

MOST OF THE TIME, I PERFORM MY FIELD ACTIVITY (Check only ONE response):

- _____ alone, with no other classmates or friends
- _____ in a pair, with one other classmate or friend
- _____ in a small group, with 3 - 10 other classmates or friends
- _____ in a large group, with 11 or more students (but not the entire class)
- _____ with the entire class

WHAT CHALLENGES HAVE YOU CONFRONTED AT THIS PLACEMENT, IF ANY (you may check more than one response):

- ___ I do not feel fully prepared to take on the tasks I am asked to perform
- ___ Transportation to and from community placement is difficult or inconvenient
- ___ I don't have enough time in my schedule to complete the hours necessary for my community placement
- ___ I don't get along well with my placement supervisor (or other people at the agency or placement site)
- ___ Other (Please explain): _____

APPENDIX A.5 PROGRAM GOALS AND OBJECTIVES

School: _____

Teacher/Coordinator: _____

Classroom: _____

I. Program Goals and Objectives

- A. What is my program trying to accomplish? For students?
- B. For the community?
- C. For teachers?
- D. For the school?

II. Learning Activities

What do we expect students to learn through their engagement in this program?

III. Service Activities

- A. What kinds of activities will students be performing?
- B. What impacts do we expect these activities to have on the community?

IV. Integrating Service and Learning

How will the service activities and the learning components be integrated?

V. Data Sources

What data sources will be available to document program development?

APPENDIX A.6 TEACHER FOCUS GROUP INTERVIEW PROTOCOL

School: _____

Programs Represented: _____

Date: _____ Number of Teachers Interviewed: _____

At the end of the year (or semester), the research will invite a group of teachers to sit down and discuss their class(es). The interview responses will be recorded anonymously, with no attributions to specific individuals. While teachers that teach a service-learning, community service, or internship may be asked any of these 12 questions, non-experiential education teachers will be asked only those questions in italics.

Experiential Education As A Pedagogy

1. What were your reasons and inspirations for teaching a class that involved an experiential education component? (e.g., service-learning, work-based activities, etc.)?
2. To what extent were you aware of experiential learning as a pedagogy prior to teaching this course?

Assessment And Evaluation Of Student Performance

3*. *How do you plan to assess what students have learned from the class (and have gained from their service/experiential education experience)?*

Incorporation Of Service Into Academic Curriculum And Its Effects On Students

- 4*. *Have you observed any "changes" in any of your students since they began your course (or their experiential education projects)? Please explain.*
5. How do you incorporate the experiential education/service component into the course readings and assignments?
 6. What are the major concerns that students have regarding their service/experiential learning projects?

APPENDIX A.6 (continued) TEACHER FOCUS GROUP INTERVIEW PROTOCOL

7. Is it difficult to give each individual student or groups of students working on different projects the necessary guidance and attention?
8. Has the experiential education/service component enhanced your teaching skills in any way? (organizational, curricular, etc.)
9. Would you teach another experiential education/service course in the future?
10. Would you recommend the experience to other faculty members?
- 11*. *In comparison to past courses that you have taught, how does this one rate in terms of*
 - a) *student learning*
 - b) *your relationship with students*
 - c) *students' interest level (motivation, engagement, etc.)*
 - d) *motivation*

Suggestions For Future

- 12*. *Do you have any suggestions on how to improve the program in the future?*

Teacher: _____ School: _____

Class/Program: _____

*Please provide a brief response to each of the following questions:**

1. In regards to the class mentioned above, what would you say were the most valuable learning experiences for students this term.
2. Please select one student in your class whom you feel has shown the greatest improvement over the course of the year. Please describe the ways in which that student has improved and describe which learning activities have contributed to that improvement? (*Please do not use students' real names*).
3. Have you noticed any common outcomes among your students (e.g., most students have decided which college to attend next year)? To what educational activities do you attribute those outcomes? (Attributions may be based in your class or in other activities in which students are engaged).
4. Were there any students in your class that seemed particularly frustrated, unmotivated, or underachieving? To what factors do you attribute this too?
5. Please provide any further relevant information that highlights the progress of students in your class.

THANK YOU FOR YOUR TIME

**If preferred, responses may also be provided by phone.*

**APPENDIX A.8 COMMUNITY-BASED ORGANIZATION
PHONE INTERVIEW PROTOCOL**

Date: _____ **Agency Interviewed:** _____

School at which service program resides: _____

The nine questions and their subquestions are suggested questions. Some or all of these questions may be asked. Additional questions may be asked as needed.

No responses will be attributed to any individual or community agency. In the event names or persons, courses, or agencies are mentioned in a response, those names will be deleted from the record and will be assigned an arbitrary letter (e.g., "Student X and I were able to build a rapport", "Teacher T said (s)he wanted students to be more interactive in my agency", etc.).

1. Agency Structure/Organization:

How long has your agency been in existence? What types of service does it provide (e.g., health-related, senior care, etc.).

2. General Activities:

Describe some of the activities the students are engaged in?, How many people are involved in the students' projects?, How long is the service or work activity,?, What is the average number of hours per student?

3. Student Volunteers:

With what level of interest do students approach the tasks at hand? Do they seem to enjoy their service activity? Do they seem prepared and capable of the tasks at hand? How effective are the student volunteers in comparison to other service providers?

4. Clients (when applicable, e.g., tutees, mentees, seniors):

Have you noticed any changes in your clients as a result of their interaction with the students? Please explain.

5. Agency Impact:

What has been the impact of the students' work on your agency? (e.g., for a tutoring/mentoring program, have you noticed any changes in tutee/mentees' attitudes, behaviors, skills or achievement?)

Appendix A.8 (continued)

COMMUNITY-BASED ORGANIZATION PHONE INTERVIEW PROTOCOL**6. Agency Impact Follow Up:**

How many of these impacts (listed above) would have been accomplished without the students?

7. Student Impact:

What do the students seem to be learning, if anything?

8. Client Impact:

What are clients getting out of the activities? Are there any other benefits you notice?

9. Program Improvement:

In your opinion, how might the program (service or work program) be improved?

**APPENDIX A.9 COMMUNITY-BASED ORGANIZATION
QUESTIONNAIRE**

School/Program: _____

Community Agency Survey

Agency: _____ Date _____

Title/Position: _____

Please indicate the category to which your agency belongs (check all that apply):

- _____ AIDS
- _____ ANIMALS
- _____ ARTS & MUSEUMS
- _____ CRIMINAL JUSTICE
- _____ CULTURAL/ETHNIC
- _____ DISABILITY
- _____ ENVIRONMENT
- _____ GOVERNMENT & POLITICS
- _____ HEALTH
- _____ HOMELESSNESS & HUNGER
- _____ INTERNATIONAL
- _____ LEGAL
- _____ MENTAL HEALTH
- _____ SENIORS
- _____ TUTORING/MENTORING
- _____ WOMEN
- _____ YOUTH
- _____ OTHER _____

APPENDIX A.9 (continued) COMMUNITY-BASED ORGANIZATION
QUESTIONNAIRE

1. Since September, 1995, how many students from this school have been placed at your agency? _____

2. How would you characterize your interaction with the students from this school program volunteering at your agency? Circle one response.

| | | | |
|--------------------|--------------------|--------------------|--------------------|
| <u>No</u> | <u>Minimal</u> | <u>Some</u> | <u>Much</u> |
| <u>interaction</u> | <u>interaction</u> | <u>interaction</u> | <u>interaction</u> |
| 1 | 2 | 3 | 4 |

3a. To what extent did these students help meet the needs of your agency?

| | | | | |
|-------------------|---|-----------------------|---|--------------------------|
| <u>Not at all</u> | | <u>To some extent</u> | | <u>To a great extent</u> |
| 1 | 2 | 3 | 4 | 5 |

3b. Please give at least 3 specific examples of the service provided or work completed by students from this program.

4. In your opinion, what was the impact of the volunteer service/work provided by the students on the students themselves? (*e.g., for a tutoring/mentoring program, did you notice any changes in the tutor's attitudes, behavior, skills or achievement?*)

APPENDIX A.9 (continued) COMMUNITY-BASED ORGANIZATION
QUESTIONNAIRE

5. In your opinion, how prepared were the students for the service or work they provided (e.g., ability to take on new challenges, ability to work in a group setting, etc.)?

| | | | |
|--------------------------------------|------------------------------------|-----------------|-------------------------------------|
| <u>Not at all</u> <u>prepared</u> | <u>Somewhat</u> <u>prepared</u> | <u>Prepared</u> | <u>Extremely</u> <u>prepared</u> |
| 1 | 2 | 3 | 4 |

6. How effective are students in this program in comparison to other service providers at your agency?

| | | |
|-----------------------|---------------------|-----------------------|
| <u>Less effective</u> | <u>As effective</u> | <u>More effective</u> |
| 1 | 2 | 3 |

7. How satisfied are you with your experience with students from this program?

| | | | |
|---------------------------------------|-------------------------------------|------------------|--------------------------------------|
| <u>Not at all</u> <u>satisfied</u> | <u>Somewhat</u> <u>satisfied</u> | <u>Satisfied</u> | <u>Extremely</u> <u>satisfied</u> |
| 1 | 2 | 3 | 4 |

8. Do the students give back enough to make the time you spend with them worthwhile? Please explain.

9. What problems, if any, did you encounter with the students (e.g., some students were too shy some students did not follow through, etc.).

10. What suggestions do you have for improving our program in the future?

THANK YOU FOR YOUR TIME!

Please return completed survey to:

**APPENDIX B: STUDENT SURVEY ITEMS WITH OVERLAPPING
DOMAINS**

| SURVEY ITEM | EDUC. DOMAINS | ANALYSIS STATUS |
|--|--------------------------------|--------------------------------------|
| II.3 volunteering my time to help people in need. | Ethical Civic | Included Included |
| II.5 finding a career that is helpful to others and useful to society. | Career Ethical | Included Included |
| III.3 I am not concerned about the impression that I make on other people. | Social Personal | Eliminated Eliminated |
| III.5 Everyone should find time to contribute to their community. | Ethical Civic | Included Included |
| III.7 I feel that I can have a positive impact on the community in which I live. | Personal Civic | Included Included |
| III.13 I believe in standing up for what is right, regardless of what other people think. | Ethical Personal | Included Included |
| III.15 I feel I possess the necessary personal qualities (e.g., responsibility, manners, etc.) to be a successful career person. | Career Personal | Included Included |
| III.17 I cant' do much to affect other people's racial prejudices. | Ethical Social Personal | Eliminated Included Included |
| III.19 While working on a group project I can easily accept others' criticism of my work. | Ethical Personal | Included Included |
| III.20 When I see something wrong or unfair happening to someone else, I usually try to do something about it. | Social Personal | Included Included |
| III.21 I usually feel uncomfortable starting conversations with people I don't know. | Social Personal | Included Included |
| III.28 I can learn something new from people of a different ethnic group. | Academic Social | Included Included |
| III.29 I do not feel well prepared for the world after high school. | Career Personal Academic | Eliminated Included Eliminated |
| IVb.3 How often did you discuss with your friends the information taught in this class? | Academic Social | Included Included |

APPENDIX C:

LIST OF ORIGINAL AND FINAL ANALYSIS ITEMS FROM STUDENT SURVEY

| DOMAIN | ORIGINAL ITEMS | ITEMS USED IN FINAL DATA ANALYSIS |
|----------|---|---|
| Academic | III.4, 10, 16, 22, 28, 29 ; IV.b.1, 2, 3 | III.4, 10, 16, 22, 28; IV.b.1, 2, 3 |
| Career | II.5 III.9, 11, 15, 24, 27, 29 ; IV.a.1, 2, 3 | II.5 III.9, 11, 15, 24, 27; IV.a.1, 2, 3 |
| Ethical | II.2, 3, 4, 5; III.5, 13, <u>17</u> , 20 | II.2, 3, 4, 5; III.5, 13, 20 |
| Social | III.2, <u>3</u> , 8, 17, 19, 21, 26, 28; IV.b.3 | III.2, 8, 17, 19, 21, 26, 28; IV.b.3 |
| Personal | III. <u>3</u> , 6, 7, 12, 13, 14, 15, 17, 18, 19, 20, 21, 29, 30 | III.6, 7, 12, 13, 14, 15, 17, 18, 19, 20, 21, 29, 30 |
| Civic | II.1, 3; III.1, 5, 7, 23, 25 | II.1, 3; III.1, 5, 7, 23 |

Roman numeral denotes survey section.

Arabic numeral denotes survey item number within the section.

Bold and underlined items denotes original item with poor domain reliability; the gain score of this item was not included in the data analysis.

APPENDIX D

HUMAN SUBJECTS PROTOCOL LETTERS



GRADUATE SCHOOL OF EDUCATION
SERVICE-LEARNING RESEARCH & DEVELOPMENT CENTER

2225 FULTON STREET, FOURTH FLOOR
BERKELEY, CALIFORNIA 94720
(510) 642-3199 FAX: (510) 642-6105

DATE

TEACHER/COORDINATOR AGREEMENT FORM

Study of the Impacts of Youth Service on High School Students

My name is Andrew Furco. I am a graduate student in a doctoral program in the Graduate School of Education at the University of California at Berkeley. Prior to coming to Berkeley, I worked five years as a public school teacher and two years as a school site administrator. I am currently conducting a dissertation study of three high schools in California to determine what benefits, if any, community service programs have on high school students. I would like to invite you and your class to take part in my dissertation research project.

To participate in this study, you will be asked to administer two questionnaires, one at the beginning of the school semester and one at the end, during your class period. You will also be asked to administer eight journal questions as part of students' reflection process. The first questionnaire is attached to this consent form. Each questionnaire will take between 20-30 minutes to complete. The questionnaires will ask general questions about your students' attitudes toward school, their community and friends, and themselves. The purpose of the study is to determine if students in classes that do community service feel differently about school, the community, etc. than do students who do not perform community service. In addition, four students from each class may be selected to participate in a one-time 30 minute group interview where I will ask students (four students at a time) some questions about their school experiences. With their permission, I may record these interviews on a tape recorder and ask to have copies of samples of your students' writings which might relate to the topic of this research. I will pay for all duplication costs. During the course of the year, I also plan to conduct at least one 15-20 minute interview with you to gain a better sense of your program and the types of activities in which your students are engaged. And to gain some information about students from the community agencies at which students serve, I will be administering a short survey to those agencies.

Your or your students' names will not be used in the project. Although the procedures in this study involve no foreseeable risks or discomforts to you or your students, I want to ensure that no student feels uncomfortable during their participation in the study. Therefore, I feel it is essential that the project is conducted under your supervision. Students will be asked to return a parental consent form which indicates whether or not they may participate in the study.

This study will have no substantial benefit to you or your students. I hope that the research will benefit educators, practitioners, researchers, and parents who are interested in determining how the engagement of students in service programs impacts students' educational development.

All the information that I obtain from you and your students during the research will be kept confidential. I will store audiotapes of interview, notes, and any drawings or writing samples from your students in a locked cabinet in my home. I will use code numbers and names to identify your students and any people mentioned in all tapes, notes, and documents. The key to all code names will be available only to me; these codes will be kept separate from the data. As you know, your site administrator has agreed to waive your right to access the code names. I will not use any names

(other than the school's) in any written reports of my research, and will conceal your students' names in all drawing or writing samples I may use. After this research is completed, I may save the audiotapes, my notes, and drawing and writing samples for future research by myself or others. However, the same confidentiality guarantees given here will apply to future storage and use of materials.

Both your and your students' participation in this research is voluntary. Any student may refuse to take part, and may refuse to answer any questions, or may stop taking part at any time. Whether or not your students' participate in the study should in no way affect their standing at school, nor should it affect any other activities with which your students are associated.

If you have any questions about the research, or about your and your students' participation in this project, you may call me, Andrew Furco, at (510) 642-3299 or (510) 525-8417. I also will be more than happy to discuss this research and findings with you as well as provide you with ongoing update and materials during the course of the study.

Your agreement to participate in this study will be greatly appreciated.

If you agree for your class to take part in this research, please complete and return one signed copy of this form to me by at the above address by _____, 1995. You may keep the other copy for your future reference. Thank you for your time and consideration. I look forward to working with you this semester.

I UNDERSTAND THE NATURE OF THE RESEARCH AND MY RIGHTS AS THEY RELATE TO THE PROJECT AND I AGREE TO TAKE PART IN THE STUDY.

Teacher's Signature

Date



GRADUATE SCHOOL OF EDUCATION
SERVICE-LEARNING RESEARCH & DEVELOPMENT CENTER

225 FULTON STREET, FOURTH FLOOR
BERKELEY, CALIFORNIA 94720
(510) 642-3199 FAX: (510) 642-6105

September 30, 1995

PARENT/STUDENT CONSENT FORM

Study of the Impacts of Youth Service on High School Students

My name is Andrew Furco. I am a graduate student in a doctoral program at the University of California at Berkeley. Prior to coming to Berkeley, I worked five years as a public school teacher and two years as a school site administrator. I am currently conducting a dissertation study of three high schools in California to determine what benefits, if any, youth service programs have on high school students. I would like your child to take part in my dissertation research project.

To participate in this study, your child will be asked to complete two questionnaires, one at the beginning of the school semester and one at the end and a set of eight journal essays that will be administered throughout the year. The questionnaire will ask general questions about your child's attitudes toward school, his/her community and friends, and himself/herself. The purpose of the study is to determine if students in classes that do community service feel differently about school, the community, etc. than do students who do not perform community service. Each questionnaire will take between 20-30 minutes to complete. It will be reviewed by your child's teacher and will be administered during class time. The journal questions will ask your child to provide feedback on their classroom experiences. In addition, your child may be selected to participate in a one-time 30 minute group interview where I will ask students (eight students at a time) some questions about their school experiences. With permission, I may record these interviews on a tape recorder and ask to have copies of samples of your child's writings which might relate to the topic of this research. I will pay for all duplication costs.

Your child's name will not be used in the project. Even though I am a certified public school teacher and administrator, the project will be conducted under the supervision of your child's teacher. The procedures in this study involve no foreseeable risks or discomforts to you, your child, or your child's teacher.

There is no substantial benefit to you, your child, or your child's teacher from the research. I hope that the research will benefit educators, practitioners, researchers, and parents who are interested in determining how the engagement of students in service programs impacts students' educational development.

All the information that I obtain from your child during the research will be kept confidential. I will store audiotapes of interview, notes, and any drawings or writing samples from your child in a locked cabinet in my office. I will use code names to identify your child and any people your child mentions in all tapes, notes, and documents. The key to all code names will only be available to me and will be kept separate from the data. I will not use any names (other than the school) in any written reports of my research, and will conceal your child's name in all drawing or writing samples I may use. After this research is completed, I may save the audiotapes, my notes, drawing and writing samples for future research by myself or others. However, the same confidentiality guarantees given here will apply to future storage and use of materials.

Your child's participation in this research is voluntary. Your child may refuse to take part, may refuse to answer any questions, or may stop taking part at any time. Whether or not your child participates in

this study will in no way affect his/her standing at school, nor will it affect any other activities with which your child is associated.

If you have any questions about the research, or about the rights of your child to participate in this project, you may call me, Andrew Furco, at (510) 642-3299 or (510) 525-8417. I also will be more than happy to discuss this research and findings with you as well as provide you with a copy of the questionnaire and interview questions at the end of the study.

Your permission to allow your child to participate will be appreciated. I want to reiterate that this study has been approved by your child's school. Unless this consent form is affirmed, signed, AND returned to the teacher, your child will NOT be asked to participate in this study.

PLEASE CHECK ONE:

I have read the consent form and AGREE to allow my child to take part in the proposed research

I have read the consent form and DO NOT AGREE to allow my child to take part in the proposed research

Parent or Guardian's Signature

Date

Student's Signature

Date

Please complete and return one signed copy of this form to your child's sponsoring teacher by October 15, 1995. You may keep the other copy for your future reference.

