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Alternative Upper Secondary Education in Honduras: Assessment and Recommendations

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Table of Contents

EXECUTIVE SUMMARYError! Bookmark not defined.

I. Introduction 3

II. Context of Secondary Education in Honduras 4

**III. Analysis of Demands for and Constraints to Secondary Schooling among the
Target Populations..... 16**

IV. Evaluation of Honduras' Existing Alternative Upper Secondary Programs..... 33

**V. Recommendations for a Large-Scale Upper Secondary Alternative Education
Program 54**

Alternative Upper Secondary Education in Honduras: Assessment and Recommendations

I. Introduction

This study is an examination of alternative upper secondary education in Honduras and the potential for a large-scale alternative education program for the upper secondary level in the country. The study is large, taking on a series of interrelated research questions.

The first research question simply asks: What is the social context of secondary education in Honduras as it relates to a large-scale upper secondary alternative education program? This section of the paper presents the background of secondary education in Honduras, and argues that there is an urgent need for an alternative upper secondary education program. This need stems from a convergence of factors, including a social and economic need for greater national development and productivity, the extreme and continued low enrollment in upper secondary education in the country, and the large numbers of Hondurans who have no access to traditional upper secondary schools. This section also describes the research methods used in this study.

The second research question examines the demand for and constraints to secondary education among the target population for an alternative upper secondary school program. Using a nationally representative sample, this section of the paper finds that there is enormous demand for such a program and explores specific information about what the target population is looking for in a program, what would motivate them to participate in such a program, and what the obstacles to schooling are for them.

The third research question then turns to analyze the existing alternative secondary education programs in Honduras. Based on extensive field work and interviews, this section provides a detailed description of the policies, organization, curriculum, instruction, costs, and efficiency of these programs and presents a comparative analysis of the strengths and weaknesses of the programs.

The final, and most important, research question addressed in this study brings together the previous three. It asks: Given our understanding of the context of secondary education, demand for such a program, and existing alternatives, what are the characteristics of a viable large-scale upper secondary alternative education program in Honduras? Furthermore, this section looks at which, if any, among the existing programs in Honduras best fits these characteristics and provides a good base from which to adapt and scale-up. Finally, this section estimates the cost involved in taking the recommended program(s), adapting them, and making them accessible to the Honduran population.

II. Context of Secondary Education in Honduras

Secondary education is of critical importance today in Honduras and throughout the developing world. As the education level that both equips youth with the skills and knowledge to enter the workforce and prepares youth for advanced studies at the university level, secondary education is fundamental to national growth and competitiveness (di Gropello, 2006). Secondary education in Honduras is comprised of a lower secondary cycle, grades 7-9, which is part of mandatory basic education, and an upper secondary cycle, grades 10 and 11 in the academic stream and 10-12 in the vocational stream. The economic importance of the upper secondary education level in Honduras is underscored by the fact that private rates of return to schooling are highest at the upper secondary level, above even the returns to university schooling (World Bank, 2006).

Honduras is unlikely to meet its Poverty Reduction Strategy (PRS) and Education for All (EFA) goals for secondary education if it continues on the current path. These goals include reaching 70 percent net enrollment in lower secondary by 2015 and 50 percent completion in upper secondary by 2015 (Government of Honduras, 2001). Honduras has been commended for increasing government spending to education in recent years; at the same time, the growing school-age population, the relatively small government budget, and the high number of poor and extreme poor, has caused Honduras to fall off track towards meeting many of its goals (PREAL, 2005). Although Honduras devoted 45 percent of its Poverty Reduction Strategy spending to education in 2004, Table 1 shows that progress towards PRS and EFA goals has been slow (Government of Honduras, 2005).

Table 1: Joint Secondary Education Poverty Reduction Strategy and Education for All -- Goals and Progress

PRS and EFA Goals	1999	2001	2002	2003	2004	2015 Goal
70% Net enrollment in lower secondary education by 2015	24.2	31.0	30.9	31.2	38.2	70
50% Completion of upper secondary education in emerging population by 2015	12.4	12.0	17.4	18.9	21.3	50

Sources: PRSP (GoH, 2001), 2005 Poverty Assessment (World Bank, 2005), PRSP Report (GoH, 2005)

The Government of Honduras is aware of the critical role alternative education programs will need to play to meet these goals. One of four policy actions the Government has laid out for expanding educational coverage in the PRS is to “strengthen and promote alternative forms of education service delivery, both for the formal school system as well as for youth and adults excluded from it” (Government of Honduras, 2001). Unfortunately, between 2001 and 2004 only 1.7 percent of educational funding was devoted to these alternative education forms (Government of Honduras, 2005).

Challenges in Honduran Secondary Education

Secondary education in Honduras faces multiple challenges. First, access to secondary schools must be improved. While more than 11,000 public primary schools operate nationally in Honduras, there are only about 900 upper secondary schools.

According to 2006 figures, the net enrollment rate for upper secondary in Honduras is 24 percent. This means that only one in four youth age 16 to 18 is enrolled in upper secondary school. In addition, there are large inequities between urban and rural areas. Most secondary schools offering the upper secondary grades are located in urban areas, severely limiting access to schooling for those living in rural areas. The corresponding net enrollment rate in rural areas for the upper secondary cycle is 12 percent, even though more than half of the Honduran secondary school age population resides in the rural areas (see Table 2).

Net enrollment rates are higher for girls (28%) than for boys (21%) both nationally and within urban and rural areas. Fewer than one in 10 of boys aged 16-18 years old in rural areas is enrolled in an upper secondary education program.

Table 2: Net Enrollment Rate in Upper Secondary, 2006

	Population	Population Enrolled	Net Enrollment rate
Total	550,796	132,593	24.1%
Urban	259,601	96,822	37.3%
Female	136,986	54,219	39.6%
Male	122,615	42,604	34.8%
Rural	291,195	35,771	12.3%
Female	136,186	20,867	15.3%
Male	155,009	14,905	9.6%

INE, Encuesta de Hogares, May 2006

Upper secondary enrollment also varies across Honduras' 18 departments. Lempira, Ocotepeque, Intibucá, Gracias a Dios, El Paraíso, and Santa Barbara have the lowest rates of coverage, in part because approximately half of the municipalities in these departments have no upper secondary education schools. In Ocotepeque, three of every four municipalities report zero enrollment in upper secondary education. Youth from these departments who wish to attend upper secondary school must move or travel to the largest urban centers to find a functioning school.

The situation for upper secondary education completion is even bleaker. The May 2006 household survey indicates that only 18 percent of adults over age 25 have completed upper secondary education, and only 15 percent of the poor and less than 4 percent of the extreme poor have done so.

Secondary education began in Honduras in 1959 with the creation of the lower and upper secondary cycles. In 1978 the National Development Plan made a strong push for technical and vocational education, resulting in the creation of the technical/vocational upper secondary education degree. In the 1990s an explosion of technical/vocational

upper secondary tracks reached a staggering 61 state-certified upper secondary education degrees by 2001 (Moncada, et. al., 2004). This situation in Honduran upper secondary education has been coined “curricular anarchy.”

There is a clear preference for the technical/vocational stream in Honduras, with 82 percent of upper secondary students in a technical track. The most popular tracks are *Perito Mercantil* (“Mercantile Expert”) with 33 percent of students, Public Accounting with 21 percent, the academic track called Sciences and Letters with 18 percent, Business Administration with 8 percent, and Computing with 2 percent. These five tracks serve more than 80 percent of upper secondary students. The other 18 percent of students are divided among some 56 other technical tracks.

Adding to this “curricular anarchy” is the absence of a systematic or national vision for secondary education. Rather, secondary education in Honduras has grown without substantive long-term planning (Alas, 2007). For example, there is no established measure of student learning at the upper secondary level.

More needs to be learned about the quality of upper secondary education in Honduras, although education quality in Honduras generally has been found to be low (LLECE 2001, PRSP 2001, PREAL 2005). In the UNESCO LLECE study of third and fourth grade learning in 13 Latin American countries, Honduras came in last in both math and language (LLECE 2001). In 2005 the National Education Council funded a study on academic achievement in upper secondary schools. The study evaluated the learning outcomes of some 1,400 students in 23 schools around the country. The results were sobering, with students answering less than 41 percent of math questions correctly. The study reported that “the knowledge levels shown by students are markedly deficient” (p.49).

There is also limited information on student flow at the upper secondary level but estimates suggest a 6 percent repetition rate, 7.4 percent intra-annual dropout, and 17 percent failure (Alas, 2007).

The need for more sufficient learning resources, better infrastructure, and better-prepared human resources present additional challenges to Honduran upper secondary schools. Just over half of Honduras secondary institutes have telephones, four out of 10 need science laboratory space, three of 10 need library space, one-quarter of all desks need repair, and more than three out of every 10 teachers are underqualified to teach at the secondary level (Alas, 2007).

Despite the strong preference for technical/vocational programs among students, consultations with the private sector suggest that upper secondary education technical training is weak. A broad consultation conducted in 1999 with the Honduran private sector, university sector, and national and international education research bodies concluded that “technical education is divorced from the needs of the productive sector. . . .there are marked deficiencies in the formation of ethical, moral, and civil values” and “the private sector does not participate in the planning or elaboration of

education policies.” (Doryan and Chavarria, 1999, p.11). Another 2001 civil and private sector consultation identified the need for secondary graduates to have basic skills including those of reading and writing, adding, multiplying, and measuring (FEREMA, 2001). Finally, a 2005 consultation identified productive work attitudes and values including punctuality, ethics, honesty, responsibility, order, and hygiene, along with written and oral communication skills as the most pressing skills required by workers (FEDECAMARAS, 2005).

Parallel to the curricular disorder in secondary education has been a palpable abandonment of secondary education by the Secretariat of Education. The education budget as well as domestically and internationally financed programs have targeted the primary education level (Alas, 2007).

It is in this context that several initiatives have been proposed to expand access to lower and upper secondary education, including the National Education Action Plan (*Secretaría de Educación* 1992). One of the objectives of this plan is to “expand educational opportunities to youth and adults who prematurely left school through the use of flexible programs, relevant to the needs, characteristics, and interests of these participants, and geared towards improved insertion in the labor market and active citizenship” (p.47). This initiative and the incorporation of lower secondary education into mandatory basic education are the most significant proposals to expand secondary access in recent years along with the creation and expansion of several alternative programs including those we will examine in this study: *Institutos Nocturnos* (1970s), IHER (1989), SEMED (1992), *EDUCATODOS* (1995), SAT (1996), and *TELEBÁSICA* (1996).

Secondary Education Reform in Honduras

The preceding section presented a condensed, and necessarily simplified, picture of the current state of upper secondary education in Honduras, highlighting issues in coverage, equity, “curricular anarchy”, relevance, and quality. This context has resulted in a growing consensus of the need for upper secondary education reform. As a result, the Secretariat of Education, with assistance from the Inter-American Development Bank, undertook in 2003 a process of secondary education evaluation and reform planning.

The resulting reform proposal lays out, for perhaps the first time, a conceptualization of the goals of upper secondary education, as “the educational level following basic education in which the goals are for students to develop positive personality traits, and acquire knowledge and skills that support their social development as educated individuals able to take on social, work, and high education responsibilities.” The reform proposes to maintain the separation of academic and technical/vocational tracks and to develop and approve a number of technical/vocational tracks. Unlike the current system, however, the reform proposes to cut the number of approved tracks to around 16 and to develop a shared curricular structure in technical/vocational programs comprised of a foundational year of academic material, a year of more general competencies, and a final year of specialized technical knowledge and competencies. The foundation of all the upper secondary curricula will be in the new National Basic Curriculum which presents

general learning and competency guidelines for upper secondary although it does not provide specific standards or contents for this level.

Up to this point, secondary education reform has been spearheaded by the SE without a legal foundation. At the time of the writing of this study there is an effort to put the secondary education reform into law in an effort to make it a stronger and more permanent reform.

Nonetheless the secondary education reform process has not adequately addressed the presence of or need for alternatives to the traditional upper secondary education system. The reform has not evaluated existing alternative programs or investigated the need for such programs. The 16 curricular designs created as part of the reform do not include modalities oriented to or adapted for alternative programs. In interviews with SE stakeholders they assert that the current reform process does not intend to “close the door” to alternative upper secondary education programs but rather has prioritized other areas that have technical and financial support.

The Need for Alternative Upper Secondary Education

For the majority of youth in Honduras, upper secondary education is a dream unfulfilled. Many Hondurans, both secondary school-age youth and adults, cannot attend school because there are no programs nearby, their work schedule interferes with their ability to attend school, or they cannot afford the direct costs of schooling.

Honduras demonstrates all the necessary conditions for alternative education: large rural populations with limited access to secondary schools, large populations of working youth, large impoverished populations, and large populations of adults that never completed secondary education. The World Bank’s Rural Distance Learning Toolkit (2005c), quoting Bates (1995), reports that while traditional education systems which have a proven track record should always be the first choice of an education system, alternative delivery modalities can provide good learning results and be cost efficient when certain conditions apply. These conditions include: geographically isolated populations who cannot reach conventional schools, socially or economically isolated populations, the need to reduce per pupil cost by expanding enrollment, a lack of qualified teachers, conventional systems that are unable to meet increasing demand, adults returning to school, the need to educate more people at lower costs, or traditional schools that need quality or relevance enhancement.

According to the 2007 household survey, 54.5 percent of the Honduran population lives in rural areas (May 2007 Household Survey). Most of these communities have no school that offers upper secondary education. Most upper secondary schools are located in urban, municipal capitals and frequently require rural students to travel long and difficult routes to attend.

Forty-six percent of secondary school-age Hondurans (aged 16-22) work -- remarkable when compared to the statistic that only 37 percent of this same age group is in school

(May 2006 Household Survey). Few Hondurans past the age of 15 have the luxury of studying full time. Yet the schedule of traditional upper secondary schools of five hours a day, five days a week does not permit students to also maintain full-time jobs.¹ Less than 10 percent of those secondary school age youth who are in school are also working.

Finally, 60 percent of the Honduran population lives below the poverty line and a full 39 percent of the country lives in extreme poverty (May 2006 Household Survey). For these people not only is the need to work urgent but also the direct and indirect costs of schooling, including tuition fees, the costs of textbooks, and transportation are prohibitive.

Table 3: Distribution of active students, all ages and levels, among education programs, 2006

Type of school or education program	%
Traditional Modality	
Public school	82.3%
Private school	12.9%
PROHECO	1.7%
Outside Honduras	.0%
Doesn't know or doesn't respond	.1%
Total Traditional Modality	97.00%
Alternative Modality	
EDUCATODOS	.6%
PRALEBAH	.1%
Radio-based education	.6%
Distance education in a public school	1.4%
Distance education in a private school	.3%
Total Alternative Modality	3.00%

Source: ENCOVI, May 2006.

In sum, a large percentage of Honduras' secondary school age population – not to mention adults who might also return to school – either work, live in areas where there are no accessible secondary schools, or cannot afford the private costs of traditional secondary education (or all of the above). Therefore, alternative secondary education programs which provide schooling options designed to increase access to nontraditional students by adapting to the needs of these populations (location, time, entry requirements, costs, evaluations, etc) are an important option in Honduras. Indeed, the recent Central American education strategy put forward by the World Bank states that “flexible delivery mechanisms would be particularly advisable in Honduras....” (2005a, p.54).

¹ Honduras has legislation against child labor for individuals under X years of age but, despite this, child labor is common.

Table 4: Estimated 2006 total enrollment in alternative upper secondary education programs

Program	Upper secondary enrollment
SEMED	9,415
IHER	5,829
Inst. <i>Nocturnos</i>	41,183
SAT	443
Total	56,870

Program enrollment figures obtained through program administrations

Currently only three percent of active students in Honduras are studying in alternative education programs. Table 3 presents the distribution of current students among types of education programs in Honduras. As the table shows, few Honduran students study in alternative delivery programs, and they are distributed among a plethora of different programs. At the upper secondary level, gross enrollment is higher, at 10 percent. In total, nearly 57,000 students are enrolled in alternative upper secondary education programs. Net enrollment rates are not appropriate measures of coverage for alternative programs because so much of the target population is overage.

Taken together this suggests a dire problem in Honduras. More than 75 percent of the age-appropriate population is not enrolled in upper secondary. The vast majority of these individuals are rural and working youth who cannot access traditional schools. Alternative education programs offer a means of providing them with a quality education adapted to their unique context and needs yet, to date, alternative programs have not scaled-up sufficiently to serve these populations.

What is Alternative Secondary Education?

The diversity of nontraditional education programs in Honduras and around the world begs the question: What is an alternative delivery education? There are different ways of defining alternative delivery education but within this paper we will follow the definition put forward by Figueredo and Anzalone (2003). They identify four characteristics of alternative programs, particularly at the secondary education level. Importantly, however, they underscore that an alternative delivery program does not need to have all four of these characteristics. A program might just be focused on one of the characteristics while another is characterized by two, three, or four of them. These four program characteristics are:

1. Be organized around policies that favor students who normally could not attend school. These policies often focus on lowering the barriers to secondary schooling, either by lowering entrance qualifications or lowering the direct costs to participants.
2. Use innovative and adaptive organizational arrangements. These organizational arrangements typically are designed to allow participants to study at times and in locations that are accessible to them either according to their schedule – such as working or raising a family – or where they live.

3. Have nontraditional systems of instruction that operate at lower costs than traditional schools. Alternative education systems are frequently employed to lower the unit costs of education when and where the unit costs for traditional schooling are prohibitively high. Frequently, alternative systems achieve lower unit costs by using pre-existing infrastructure, employing teachers with lower pay, and/or substituting some of the instructional time with self-directed learning.
4. Use innovative curriculum, materials, and technologies targeted to the population. While some alternative programs offer the same curriculum as traditional schools – often to reinforce the legitimacy of the program – others adapt and reform traditional curriculum to meet the specific learning needs of the target population. This often takes the shape of curricula focused on work skills, rural development, or social development. The idea behind curriculum adaptation is that the population that will be attending the alternative program is not the same population that attends traditional schools and should therefore have a curriculum that meets their specific needs and realities.

This study provides in-depth examination of six alternative delivery programs that currently exist in Honduras and that include either or both the lower secondary education cycle (grades 6-9) and the upper secondary cycle (grades 10 and 11, or 10-12 depending on the modality). We selected these six programs as the main programs in Honduras offering alternative secondary education because they not only satisfy all or some of the criteria mentioned above, but also because they are the most likely candidates for up-scaling. The six programs are described briefly below. They are described in greater depth later in this study.

EDUCATODOS is a program that currently offers grades 1 to 9. It meets all four of Figueredo and Anzalone's criteria. EDUCATODOS is offered in community settings, such as local schools or churches, offers an accelerated and adapted curriculum, and uses cassettes and textbooks as the primary teaching mechanism supported by volunteer facilitators. Each EDUCATODOS group determines its own schedule to meet the needs of the particular group of students.

IHER (the Honduran Institute for Radio Education) is a church-sponsored distance learning program offering grades 1 to 11. Participants study on their own with the aid of textbooks and a weekly radio program and meet together for a minimal number of hours per week. IHER, like EDUCATODOS, relies on volunteer facilitators, provides an accelerated curriculum, and classes are held in local community locations. It also meets all four of Figueredo and Anzalone's criteria.

SEMED (the Secondary Distance Education System) is a state-run distance learning program that offers lower and upper secondary education (grades 7-12). Like IHER it is organized around the principle of self-study with specially designed textbooks. Students meet with teachers on weekends to ask questions and review the material. SEMED takes place in established secondary schools and uses qualified teachers who are paid an additional sum for teaching both traditional secondary and SEMED. SEMED fits all four alternative education criteria.

Institutos Nocturnos (“night schools”), like SEMED, are state-run, employ qualified teachers, and offer classes Monday through Friday but at night when potential students have finished working. *Institutos Nocturnos* offer lower and upper secondary education using the traditional curriculum, traditional textbooks, and are located in secondary schools. Their only differentiation is that classes occur at night to target working youth. *Institutos Nocturnos* meet only the second of the four criteria -- that of organizational arrangements to make the program accessible to nontraditional students.

SAT, or the Tutorial Learning System, is an NGO-run program based on the Colombian SAT model. It offers lower and upper secondary education with an adapted curriculum focused on rural development. Classes are held in the afternoon so that rural workers can work in the mornings, is taught by qualified, salaried teachers, and is held in local community settings. SAT meets all four criteria of alternative education programs.

Finally, *Telebásica* offers only lower secondary education and is a state-run program modeled after the Mexican *Telesecundaria* model. *Telebásica* is held in some of Honduras’ *Centros Básicos*, rural schools offering grades 1-9, runs during the day like a traditional program, and employs traditional teachers. It differs from conventional schools in that it uses video as a primary learning resource as well as an altered curriculum developed in Mexico. *Telebásica* meets the fourth of the four alternative education criteria.

Methodology

This study benefits from extensive field work and qualitative and quantitative data collection. Data collection activities included open-ended interviews, focus groups, classroom and program observations, and a nationally representative survey of youth in and out of alternative secondary education programs.

Qualitative data collection and analysis

Qualitative data collection consisted of 25 interviews with Secretariat of Education personnel, alternative secondary education program directors and coordinators, and teachers in the alternative programs. In sum, 12 teachers were interviewed, roughly two from each program; all six program directors were interviewed; and seven Secretariat officials and experts were interviewed. In addition, 15 focus groups were held, 10 with students in alternative secondary programs and five with out-of-school secondary school-age youth from different socioeconomic contexts. Of the five out-of-school focus groups, one was held with domestic workers, one with *maquila* (factory) workers, one with incarcerated youth, one with unemployed youth, and one with agricultural workers. Finally, classroom observations were conducted in the alternative secondary programs. The initial plan was to observe two of the six alternative secondary programs examined in this study but unfortunately due to the academic year ending in some of the programs no observations were possible for *Telebásica* and only one was possible for IHER and SAT. Table 5 summarizes the qualitative field work conducted. The instruments used to conduct the interviews, focus groups, and observations also are available in the Annexes.

Table 5: Summary of qualitative research

Method	N
Interviews	25
Focus groups	15
Classroom observations	8

Once the field work was completed the information was transcribed and analyzed, and background papers were written and matrices developed detailing findings from each of the four main organizational areas of the study (as outlined in the introduction).

Quantitative data collection and analysis

The quantitative analyses conducted for this study were integral to our analysis of the second and fourth research questions – the demand for and constraints to upper secondary schooling among the target population and the costs of modifying and scaling-up a national alternative upper secondary program.

We conducted a national survey to analyze the demands for and constraints to schooling among secondary school age youth. The survey was designed to gather information along

a variety of subjects pertaining to these demands and constraints. Aside from collecting background information on each respondent, the survey was divided into the following areas: (1) strengths and weaknesses of existing alternative secondary programs; (2) the value attributed to secondary school; (3) obstacles to secondary schooling; (4) incentives to study at the secondary level; and (5) desired characteristics for an alternative secondary program. A final section also asked respondents financial questions about schooling. This information was used in the evaluation of existing programs and in the costing scenarios of the recommendations put forward in this study.

Three populations were selected for a national random sample: students in alternative secondary education programs, deserters of these programs, and youth that never completed upper secondary education. This sampling methodology was chosen over a more typical national random sample of secondary school-age youth to provide focused information from alternative secondary education students and their surrounding communities.

The sample of 620 was designed to have a confidence level of 95 percent and be representative at a national level of all students in alternative secondary education programs. The selection process first involved the random selection of Honduran municipalities. Then, using lists of all program centers for the six programs, program sites were selected randomly based on the relative enrollment of each program (see Table 6). In total, 62 program sites were selected. Field workers were then trained to conduct a random sample of roughly 10 participants among all enrolled participants once they arrived at the program site.

Table 6: Number of centers selected, by program

	Surveyed program sites
SAT	3
EDUCATODOS	5
IHER	9
<i>Institutos Nocturnos</i>	15
SEMED	22
<i>Telebásica</i>	8
TOTAL	62

For the second population of interest, out-of-school youth, we applied the same sample size of 620 in the surrounding communities of the same 62 centers. The idea was to learn about the demands for and constraints to schooling among out-of-school youth who were familiar with and/or had access to an alternative secondary program. Specifically, this population is defined as youth ages 16-22 living in the neighborhoods surrounding alternative secondary programs that completed grade 9 but did not completed upper-secondary and are not enrolled in any educational program. Out-of-school youth who have no access to secondary school were of less interest than youth who live near alternative programs but are not participating. The field workers were trained to conduct a geographical random selection of homes emanating out from program sites to fill the

quota of 10 out-of-school youth. It is important to note that this sample of 620 was not determined statistically and therefore findings from this population, unlike those for the in-program population, cannot be generalized to the national level.

Finally, we were interested also in the opinions and perceptions of youth (also aged 16-22) who had participated in alternative secondary programs but who had dropped out without completing. For this group it also was difficult to establish a statistical method for selecting a sample because few of the programs collect any viable data on program dropouts. We decided instead to select a sample of 20 percent of the in-program sample, 124 dropouts total. Once at the program site field workers compiled a list of recent program dropouts from program personnel and randomly selected two dropouts per site. Again, it is important to note that while this survey of dropouts gives us important insights into the experiences of alternative program deserters, the sample was not designed to be generalizable to the national population of these deserters.

A five percent non-response rate was built into the sample size calculation. Table 7 shows that the final sample sizes were at least 95 percent for all three groups. For all respondents, field workers conducted individual interviews in which the field worker asked the respondent a series of scripted questions in a private setting and then filled in the respondent's answers. This methodology was chosen to ensure the highest possible quality of data.

Table 7: Final number of valid survey respondents, target, and percent completed

Youth status	N	Target	Percent
In-program	590	620	95%
Deserters	131	124	106%
Out-of-school	596	620	96%
Total	1317	1364	97%

Analysis of the survey data was largely descriptive, identifying trends in the main areas of the survey – existing program assessment, value of secondary schooling, obstacles to secondary schooling, motivation and incentives for secondary schooling, and desired characteristics for secondary schooling – disaggregated by type of youth (in-school, out-of-school, or dropout), gender, urban/rural status, working status, and whether or not the respondent is raising children. T-tests were conducted to determine when there were statistically significant differences between responses among these different groups.

The second quantitative research conducted for this study was a costing exercise. For each of the programs (except IHER because they did not have the data) budget data was collected. This data was then merged with survey responses on students' private costs of schooling. Per student and per graduate costs were calculated for each of the programs. This same data, along with data from international alternative education programs, also was used to make costing projections for the final recommendations of this study.

The study now turns to analysis and major findings.

III. Analysis of Demands for and Constraints to Secondary Schooling among the Target Populations

This first section of analysis seeks to answer the question: What are the demands for and constraints to participation in alternative upper secondary education programs among the target population?

The first section will describe the constraints to schooling faced by the target population. Much of the data presented here is from the national youth survey; however, it is complemented with data from the 15 target population focus groups. Because many of the findings come from the survey we will begin with a brief description of the dataset.

Description of Dataset

As described above, this study included a national survey of participants of alternative secondary education programs, deserters of these programs, and out-of-school youth living in the areas surrounding these alternative programs. The goals of the survey were to improve our understanding of youth perceptions of the strengths and weaknesses of current programs and to understand the demands for and constraints to secondary schooling among the target population for a large-scale alternative secondary education program.

The sample was designed to be statistically significant for program participants, reflecting the ideas and experiences of the entire population of youth age 16-22 who attend alternative secondary education programs (SEMED, EDUCATODOS, SAT, IHER, *Institutos Nocturnos*, and *TELEBÁSICA*) in all of Honduras. The other two groups, program deserters (dropouts) and the out-of-school youth population in areas surrounding alternative programs were not statistically determined but rather calculated to match those of the program participants sample. Therefore, while we believe the responses from these two groups are a fairly good reflection, coming from nearly all of Honduras' departments, from urban and rural areas, from working and non-working youth, and from females and males, they are not designed to be statistically representative at the national level.

The dataset includes 1,317 individuals from 16 of Honduras' 18 departments (two departments were excluded due to remoteness and the high cost of surveying, and because they are the least populated). Forty-five percent of the sample was male and 55 percent female. This over-representation of females reflects the enrollment in most of the alternative secondary programs. Sixty-five percent of the sampled individuals report that they live in an urban area, while 35 percent report that they live in a rural area. This again accurately reflects the circumstances in which only two of the six programs are primarily located in rural areas. The two largest programs, SEMED and *Institutos Nocturnos*, are almost exclusively located in urban centers (although they do serve some rural students who travel to attend classes). The sample consists of 45 percent program participants, 45 percent out-of-school youth in the surrounding communities, and 10 percent individuals who have dropped out of alternative secondary programs (see Table 8). Table 9 shows

the distribution of the sample among the six alternative secondary programs. As explained earlier, this distribution corresponds to the relative enrollment of each of the programs. The largest programs are the Secretariat of Education programs SEMED and *Institutos Nocturnos*, while the smallest are SAT and *TELEBÁSICA*.

Table 8: National youth survey basic statistics – youth type

Youth status	Frequency	Percent	Valid Percent	Cumulative Percent
In-program	590	44.8	44.8	44.8
Deserter	131	9.9	9.9	54.7
Out-of-school	596	45.3	45.3	100.0
Total	1,317	100.0	100.0	

Table 9: National youth survey basic statistics – youth by program

Program	Frequency	Percent	Valid Percent	Cumulative Percent
EDUCATODOS	105	8.0	8.0	8.0
SEMED	419	31.8	31.8	39.8
TELEBÁSICA	45	3.4	3.4	43.2
SAT	45	3.4	3.4	46.6
IHER	213	16.2	16.2	62.8
<i>Institutos Nocturnos</i>	490	37.2	37.2	100.0
Total	1,317	100.0	100.0	

Ninety-six percent of the sample is between 16 and 22 years of age, the main target age group for an alternative secondary education program. The vast majority of the non-target age individuals are over 22, a likely beneficiary group of this type of program. The over-age and under-age program participants were removed from the data set to ensure statistical accuracy.

The population surveyed is a nontraditional population with a large percentage of working youth and youth raising children. Fifty-five percent of the sample worked at the time of the survey. Table 10 shows that the percentage of working youth is higher in the deserter and out-of-school population, and is higher for boys than for girls. Additionally, nearly 30 percent of the surveyed population is raising children. Table 11 shows that the out-of-school and deserter populations are more likely to have children at home than the in-program population, and that the females are much more likely to have children than the males. Nearly half of the deserter and out-of-school female population surveyed are raising children.

Table 10: National youth survey basic statistics - work

<i>Individual works?</i>	Male			Female		
	In-program	Deserter	Out-of-school	In-program	Deserter	Out-of-school
Yes	65.0%	71.0%	71.0%	38.4%	42.4%	50.8%
No	35.0%	29.0%	29.0%	61.6%	57.6%	49.2%

Table 11: National youth survey basic statistics – raising children

<i>Individual has children at home?</i>	Male			Female		
	In-program	Deserter	Out-of-school	In-program	Deserter	Out-of-school
No	88.7%	80.0%	71.5%	79.2%	50.0%	54.9%
Yes	11.3%	20.0%	28.5%	20.8%	50.0%	45.1%

Findings

Constraints to Secondary Schooling

Our survey data suggest that there are multiple constraints to schooling among youth and that these constraints vary according to individual characteristics. The most consistent factor in both the survey and the focus groups and across different characteristics of youth and the different programs is the economic need to work and related scheduling difficulties between work and school. This is supported by international literature on constraints to secondary education and is found in multiple studies of secondary education in Honduras as well, including the Honduran household survey (2004), the World Bank Honduras Poverty Assessment (2006), and a recent evaluation of EDUCATODOS (Marshall, et. al., 2005).

The survey asked respondents to identify whether a battery of possible constraints posed a ‘large,’ ‘small,’ or ‘no’ obstacle to continue schooling or return to schooling. As Table 12 shows, the mean responses to many of these potential factors suggest that they do create obstacles to schooling.

The need to work and the specific work hours are the largest obstacles youth face among nearly all groups of youth. Problems in family life, too many responsibilities, and the private costs of programs are the next three largest reported obstacles to schooling among surveyed youth. Other obstacles also appear to be important, among them the lack of program resources, curricular content, the days and hours that classes occur, teacher absences, teachers’ lack of subject-matter knowledge, safety concerns, the location of the program and the distance of that location from people’s homes, failing classes, difficulty understanding class content, lack of interest in classes, and students’ absences.

Importantly, constraints vary significantly for in-school and out-of-school youth. The constraints for out-of-school youth focus on external factors; the constraints for in-school youth focus on internal program factors. Much of this difference is probably due to the fact that youth who have been out of school for long periods of time are more aware of

the external factors preventing them from studying, while in-school youth are more aware of the obstacles to schooling within the programs themselves. Interestingly, however, the differences remain significant when removing the youth who were never enrolled and comparing the responses of in-school and drop-out populations. The drop-out population is likely to have been in school relatively recently and to be well aware of the program's internal obstacles.

Table 12: Obstacles to secondary education

<i>How much is _____ a problem in terms of you continuing your studies/you studying?</i>	Count	Mean	Standard Deviation
Lack of resources in the classroom, such as books, blackboard, desks, etc.	1317	2.23	.75
The material that is taught	1317	2.30	.76
Class hours	1317	2.29	.77
Class days	1317	2.36	.75
How the teacher treats you	1317	2.51	.69
The teacher's absences	1317	2.40	.73
The knowledge the teacher has of the material	1317	2.43	.75
How classmates treat you	1317	2.54	.69
The lack of safety due to gangs, assaults, etc.	1317	2.32	.82
The distance from your house to the program site	1317	2.25	.79
The place where the program is located	1317	2.38	.76
Program costs	1317	2.18	.79
The need to work and the hours when you need to work	1317	1.95	.85
Failing a class	1317	2.30	.81
Difficulty understanding the material	1317	2.28	.92
Lack of interest in school and studying	1317	2.36	.74
The fact that secondary education isn't worth anything	1317	2.56	.69
Difficulties in your family life	1317	2.15	.81
Your absences from class	1317	2.30	.77
Having too many responsibilities	1317	2.12	.81

1="A lot" 2="A little" & 3="None"

In-school youth are more concerned with the teaching and learning process in the programs. They find the resources level to be a constraint to their studies, as well as the quality of their teachers, including how teachers treat students, teachers' knowledge and preparation, and their absences. Lack of safety, such as exposure to gangs, is more of a concern for in-school students, as is the location of classes.

The obstacles in-school youth rated most grave include the need to work and conflict with work hours, and the lack of resources in their programs. These findings support our

findings from the focus groups. Focus groups with EDUCATODOS, SEMED, IHER, and *Institutos Nocturnos* brought up work-related problems and those with EDUCATODOS and *Institutos Nocturnos* brought up resource shortages. Other obstacles that frequently arose in these focus groups included the private costs of attending these programs (EDUCATODOS, SEMED, IHER, SAT, and *Institutos Nocturnos*) and distance-related difficulties in getting to classes (SEMED, IHER, and *Institutos Nocturnos*).

The ability to get to classes and non-school responsibilities such as work and family are larger obstacles for drop-out and out-of-school populations. These obstacles affect the youth's ability to attend class, another obstacle for these populations. According to the survey, the most urgent obstacles for both the drop-out and the out-of-school populations include: 1) the need to work and work hours; 2) difficulties in family life; and 3) having too many responsibilities. Those who never attended secondary schooling cited costs as another of the greatest obstacles while those that dropped out identified their absences as one of the foremost challenges.

Again these findings are echoed in the focus groups held with out-of-school youth. The clearest obstacles which emerged in all of the focus groups with out-of-school youth were the prohibitive costs of schooling and the need to work. These two reasons are interconnected and several of the focus group participants mentioned this, first that they or their family could not afford to put them through school and that related to this, they had to leave schooling and look for work. As one youth in the agricultural workers focus groups stated: "I imagine that my principal reason (for not being in school) is the same as for the majority of (name of community): the economic problem. Opportunities are few here... and my family is large, we are 12 and it has been very difficult because my father has been sick...and this has led us to work rather than study because we prefer to work because that way we eat, and if we don't work we don't eat, it's that simple."

There are also statistically significant differences in obstacles between young men and young women and between urban and rural youth. Young women are more likely to report the location of the program as a pressing obstacle. This may be due to more difficulty traveling, such as being away from family or safety concerns. For young men, work-related obstacles are more pressing. Youth who live in urban areas face greater obstacles from safety concerns as well as from the content taught in class.

Predictably, working youth also face more obstacles than youth who are not working. For working youth, the hours and days that classes take place, the location of classes, the costs, and the general need to work while having too many responsibilities are the more pressing obstacles. Interestingly, working youth also find class content to be a significantly greater obstacle. This may reflect the fact that the content is difficult for them because they are balancing multiple responsibilities. Youth raising children face many of these same obstacles. They are more likely to report having too many responsibilities, having difficulties at home, and the need to work as pressing obstacles to continued schooling.

If we divide the 20 potential obstacles studied in the survey into two equally sized groups, one of larger obstacles (≤ 2.3) and one of smaller obstacles (> 2.3), difficulty understanding course content and failing classes both fall into the larger obstacles group, suggesting that academic standing and ability to learn and master content are important concerns for youth. Nonetheless, these factors relating to academic standing do not appear to be more pressing obstacles for any one group of youth.

Our findings regarding the most urgent obstacles to secondary schooling in Honduras lend themselves to some clear and reasonable policy responses. First, the current context of high poverty means that youth face extreme pressure and obligation to work. What is more, Honduran youth also balance other large responsibilities, such as caring for their children, siblings, grandparents, and home. Thus, any alternative secondary program needs to take place at times and in locations that allow working youth and youth with multiple responsibilities to attend. Ideally, each program site should be able to choose its own schedule and location to best suit the needs of its participants and programs should be flexible in ways that allow students to study on their own or catch up when they miss class.

Second, the costs borne by program participants need to be kept minimal. This is particularly the case for the extreme poor, a full 39 percent of the Honduran population in 2006. This can be achieved by minimizing or eliminating program costs such as textbooks or enrollment fees, or it can be achieved through some sort of a sliding scale fee system whereby the costs can be forgiven for those students without the means to pay for them. A third way of controlling costs for students is to spread out program sites to local communities so that participants do not need to pay high transportation costs.

Finally, the issue of ensuring that programs have sufficient resources seems to be an important obstacle.

Demand for Alternative Secondary Education

Despite these obstacles, one of the main findings of this study is that demand for secondary education is extremely high across nearly all groups of youth. In our survey, 94 percent of the entire sample expressed a desire to advance their studies. Among in-school youth, nearly all wanted to continue studying, but even among the drop-out and the out-of-school populations, 90 and 91 percent, respectively, expressed interest in continuing their studies. These findings are backed by the results from the focus groups. Among all out-of-school focus groups, youth expressed enthusiasm at the possibility of going back to school. This included unemployed youth, youth working in the agricultural sector, the service sector, and the *maquila* sector, and incarcerated youth. As one boy in the Federal Penitentiary stated, “Yes I would do it (go back to school), of course. I am interested in studying more, now I miss school, maybe if I had studied more I wouldn’t have ended up in this place.”

Value Ascribed to Secondary Education.

Nearly all individuals surveyed had a very positive impression of the value of secondary education. We asked respondents to answer whether they believed that a secondary education would give them much, little, or none of the following things: better salaries, more prestige, more work opportunities, a better life, more happiness, a better opinion of oneself, and more opportunities to study. The mean responses to all these questions were very close to the “much” answer. This was true for respondents across gender, work status, and urban/rural location. There were some statistically significant differences in responses between in-school and out-of-school or deserter youth groups, but even across these groups responses were very positive. The main statistically significant differences were that in-school youth were more likely to respond that a secondary education would give them a “much” better opinion of themselves, while out-of-school and deserter youth were more likely to respond that a secondary education would give them “much” better salaries and work opportunities (see Table 13).

Table 13: Personal value attributed to secondary education

<i>How much do you think a secondary education will bring you _____ ?</i>	In-program		Program deserter		Out-of-school	
	Count	Mean	Count	Mean	Count	Mean
Better salaries	590	1.25	131	1.16	596	1.09
More prestige	590	1.18	131	1.20	596	1.18
More work opportunities	590	1.18	131	1.17	596	1.09
A better life	590	1.17	131	1.13	596	1.14
More happiness	590	1.14	131	1.20	596	1.19
A better opinion of myself	590	1.12	131	1.14	596	1.18
More opportunities to study	590	1.08	131	1.10	596	1.11

1="A lot" 2="A little" & 3="None"

In addition, 98 percent of the sample responded that education is important to them. The responses were a bit lower to the question of whether they liked studying -- 84 percent responded :yes", 14 percent responded “somewhat”, and two percent responded “no”. Responses were statistically different across the three groups of youth. In-school youth liked school more, on average, and thought that education was more important in their lives. They also wanted to complete more years of schooling. The mean response to the question of what level of education individuals wanted to complete was university education for the in-school population, and secondary education for the out-of-school and deserter populations. Interestingly, girls were significantly more likely than boys to respond that they liked being in school. Also, rural respondents were less likely to want to complete higher levels of schooling than urban respondents. Older respondents were just as likely to want to reach higher levels of schooling as younger students despite higher opportunity costs of schooling.

Incentives to Attend Secondary Schooling.

On the survey, we asked the youth a series of questions about how much certain “incentives” motivated them to attend secondary schooling. These incentives included

such things as “the ability to go on to college,” “learn new things,” and “be able to study instead of work.” Respondents could answer that these things motivated them “a lot,” “a little,” or “not at all.”

Of the seven possible incentives posed, three resulted in more than 65 percent of respondents answering “a lot” (see Table 14). These incentives were the ability to learn new things, the possibility of a better life, and the ability to help their children and family members with homework. The first, the ability to learn new things, indicates that the very act of being in class is a motivation to them. The second top motivation, the possibility of a better life, confirms that youth believe that education opens up new doors to them in terms of standard of living, work, and income. The last motivation, helping children and family members with their homework, underscores that many of the individuals likely to be enrolled in an alternative secondary education program have children or are in positions of great responsibility within their families.

For six of the seven options, more than half of the respondents answered that the incentive motivated them “a lot” to study in secondary education. The six options can be seen in Table 14. The highly positive responses suggest that youth have a high regard for secondary schooling, believing that it is both a positive experience and that it helps them in their future lives.

Table 14: Incentives to study upper secondary

<i>How much does motivate you to study upper secondary?</i>	Being with my class- mates	Studying rather than working	Being able to get out of the house	Learning new things	The possibility of a better life	Continuing study in the university	Helping my children and family with their homework
A lot	57.1%	51.7%	38.0%	68.1%	67.7%	62.9%	67.0%
A little	21.8%	28.8%	38.4%	6.7%	5.8%	13.4%	9.2%
Not at all	21.1%	19.4%	23.6%	25.2%	26.5%	23.6%	23.8%

One very interesting phenomenon that occurred in this section of the survey is that the out-of-school population -- those who have never been enrolled in secondary education -- have the most favorable responses regarding the incentives secondary education creates in their lives (see Table 15). This may reflect their longing to return to school as well as, perhaps, a more negative or realistic perception of schooling on the part of those youth who are either in a program or who recently dropped out of one.

Table 15: Incentives to study upper secondary, by youth type

How much does _____ motivate you to study upper secondary?	In- program	Deserter	Out-of- school
Being with my classmates	1.67	1.79	1.57
Studying rather than working	1.73	1.64	1.63
Being able to get out of the house	1.87	1.93	1.82
Learning new things	1.58	1.68	1.53
The possibility of a better life	1.61	1.70	1.53
Continuing study in the university	1.60	1.69	1.59
Helping my children and family with their homework	1.61	1.65	1.50

1="A lot" 2="A little" & 3="Not at all"

There are few statistically significant differences in the perceptions of what motivates youth to continue schooling. Youth raising children at home are less likely to see getting away from the house as a motivation to attend secondary education. This makes sense as these youth are likely to feel a strong need to be at home with their children. Rural youth are more likely to enjoy getting away from home while urban youth are more likely to value learning new things and the possibility of improving their lives.

Focus group results support and deepen these findings. Out-of-school youth, whether working, unemployed, or incarcerated, feel the impact of not having continued their education. They spoke sincerely about their own sense of "failure" in their lives and having "no future." They had a strong perception of school as a way out of their economic and social conditions. One domestic worker said: "For me there are various (implications of finishing secondary): being able to find work. It is easier to find work when one is professional. Meanwhile it is nothing to work in people's houses. I work in people's homes because I can't find work doing anything else because I don't know anything." It is clear from these focus groups that out-of-school youth feel ashamed of their lack of education and believe that secondary schooling would make them feel better about themselves and improve their lives.

In-school focus group participants often expressed their continued efforts to study in alternative programs as an investment and sacrifice. A student from IHER stated: "When one sacrifices like this they hope for some payback. One doesn't go through such efforts just for the fun of it, a person has expectations. Maybe it will be that I feel better about myself, that I have a secondary diploma, that I'll have good work opportunities that pay me better."

This analysis indicates that the demand for secondary education is very high. Across the board the target population for an alternative secondary education program: a) wants to get their secondary education degree; b) has very high expectations of what a secondary education will provide in their life; and c) is motivated to be in school by a number of factors.

The analysis also shows that there are three main reasons why youth have such a high demand for school. The first is economic. Youth believe that a secondary education degree will give them access to better jobs, allow them to earn a better income, and lead a better life. And, as stated earlier in this paper, they are right. The World Bank Honduras Poverty Assessment showed that private returns to schooling are highest at the upper secondary level. The second reason is personal. Youth in alternative programs feel proud and accomplished for the effort and sacrifice they have shown. And out-of-school youth feel that going back to school would help them feel better about themselves, feel more confident, and less like failures in their lives. Finally, youth appear to be very motivated by school's ability to help them serve their families better, not just economically, but by allowing them to help their children with their homework, or serving as role models in their family. These three areas: economic, personal, and familial, are the three main motivations for youth to study. An alternative secondary education program should take advantage of these motivations, ensuring that graduates do indeed benefit in these three ways, and perhaps running public-awareness campaigns highlighting these three areas.

Desired Characteristics of an Alternative Secondary Education Program

The final part of this section on youth demands for and constraints to secondary education examines the characteristics desired by the target populations in an alternative secondary education program. The data comes from the national survey and the focus groups with in-school and out-of-school youth.

The survey asked the youth to imagine a program designed to suit their needs. The idea was to learn what characteristics suit the needs and interests of the target population, both those in school, and those out of school. Similarly, the facilitators of the focus groups of in-school youth asked participants what they liked and did not like about the program they were in. They also were asked about what they would change in their current programs.

One aspect that is clearly important in the design of any alternative program is the days and times when classes would be most convenient and accessible for target students. In terms of days, the survey suggests that roughly half of the target population would prefer having classes five days a week, Monday through Friday (see Table 16). The other half, however, would prefer to have classes less frequently, between one and three times per week. The answers vary significantly for different types of youth along relatively predictable lines. Working youth, youth raising children, and youth who are currently not enrolled in any program are more likely to want to attend classes less frequently. This is very likely due to competing responsibilities. Given this information, programs that seek to incorporate nontraditional students who work or are raising families might be better

adapted by offering classes less than five times a week. Clearly, a balance needs to be found between meeting times that can accommodate nontraditional youth while still meeting frequently enough to cover all the necessary material adequately.

Table 16: Schedule preferences for an alternative upper secondary education program (days)

<i>What schedule is most convenient for you in an alternative secondary program?</i>	All	Individual is enrolled		Individual is currently working		Individual has children at home	
		No	Yes	Yes	No	No	Yes
5 days a week (M-F)	50.2%	39.6%	62.5%	46.3%	54.2%	53.5%	39.5%
Two or three times a week	28.4%	31.2%	25.1%	29.2%	27.7%	28.1%	31.0%
One day a week	19.3%	26.0%	11.5%	22.4%	16.0%	15.9%	28.7%
Half-day per week	2.1%	3.2%	.8%	2.1%	2.1%	2.4%	.9%

In terms of what time classes should take place, 60 percent of the sample thought that night or weekend hours were preferable to morning or afternoon hours. This preference for night and weekend hours is, again, significantly stronger in nontraditional youth groups, including out-of-school youth (65%), working youth (70%), and youth raising children (70%). Again, it seems fairly clear that this preference for nontraditional class hours is due to competing responsibilities.

Table 17: Schedule preferences for an alternative upper secondary education program (hours)

<i>What schedule is most convenient for you for an upper-secondary education program?</i>	Full sample	Individual is enrolled		Individual currently works		Has children at home	
		No	Yes	Yes	No	No	Yes
Morning	25.0%	19.5%	31.4%	19.5%	31.0%	28.9%	13.7%
Afternoon	15.9%	17.5%	14.1%	13.2%	19.4%	15.3%	16.4%
Night	29.0%	28.3%	29.7%	33.8%	23.3%	29.0%	30.1%
Weekend	30.1%	34.7%	24.8%	33.5%	26.2%	26.7%	39.8%

The survey also examined how important it is for current and potential students that the location of classes be close to students' homes. Overall, 65 percent of respondents think that having a program near their home is "very important" and another 14 percent think it is "important". This finding indicates that accessibility is an important concern for both in- and out-of-school youth. Significant differences of opinion are present between urban and rural youth and between youth raising families and those not raising families. Rural youth are less likely to think that having a program nearby is important. This is probably because they are accustomed to traveling to get to school. It also may reflect our sample which, due to enrollment, has more respondents in SEMED and *Institutos Nocturnos*, two programs which are located in urban centers but serve significant numbers of commuting rural youth. Youth who are raising families are more likely to need a program that is close to their homes. Interestingly, there is no significant difference between the responses of males and females for this question despite the fact that females may be less inclined to travel long distances due to safety and family concerns.

Table 18: Distance preferences for an alternative upper secondary education program

<i>How important is it to you to have a program close to your home?</i>	Full Sample	The community where you live is...		Individual has children at home	
		Urban	Rural	No	Yes
Very important	65.4%	68.6%	62.0%	63.7%	70.4%
Important	13.8%	14.6%	11.7%	14.0%	12.9%
Not important	20.8%	16.8%	26.3%	22.2%	16.7%

The next question asked the youth groups where they would most like a program to be located. The vast majority (90%) answered that they would prefer a program be in a school setting. Seventy-five percent would prefer it be specifically in a secondary school setting. This again may reflect the fact that many of the respondents are most familiar with programs being in school settings, but it also might reflect the resources available in a secondary school campus or the added legitimacy of a program housed in a regular secondary school.

There are few differences in responses across youth groups, but Table 19 shows that respondents enrolled in or living near programs that are not housed in secondary schools are less likely to prefer that a program be located in one. This might suggest that youth will adapt to a nontraditional program setting.

It is important to note, however, that very few respondents indicated that they wanted a program to be located in a home, church, or community center, regardless of the program they were familiar with. This preference supports a recent evaluation of EDUCATODOS which showed that programs located in homes and churches are more likely to close than those in a school setting. This also may be tied to students' and teachers' perceptions of where a "serious" or "credible" education program is located.

Table 19: Location preferences for an alternative upper secondary education program

<i>Where would you prefer the program to be located?</i>	Full Sample	Program					
		EDUCA TODOS	SEMED	TELEBÁSICA	SAT	IHER	Institutos Nocturnos
In a school	14.0%	25.7%	13.5%	15.9%	28.9%	24.6%	5.4%
In a secondary school	75.0%	52.4%	75.7%	75.0%	64.4%	61.6%	86.7%
In a house	2.3%	4.8%	1.2%			3.8%	2.4%
In a church	1.6%		1.7%	4.5%	2.2%	1.4%	1.7%
In a community center	2.2%	1.0%	2.0%		4.4%	5.2%	1.3%
In the workplace	4.9%	16.2%	5.9%	4.5%		3.3%	2.6%

In terms of curricular focus, the youth placed great importance on the two traditional curricular areas of academic studies and work and technical skill-related studies. Seventy

percent of the respondents identified one of these two areas as the curricular focus they would like to see in an alternative secondary education program. Interestingly enough, however, nearly 25 percent of respondents answered that they would like to see a curriculum that focuses on community development or one that improves lives at home such as health, nutrition, interpersonal relations, and other such curricular content.

Table 20: Curricular preferences for an alternative upper secondary education program

<i>What interests you most in terms of what you could learn in an upper secondary program?</i>	Full Sample	Gender		Individual currently works		Individual has children at home	
		Male	Female	Yes	No	No	Yes
Content that would help you in your work and future work (such as technical skills)	29.4%	33.6%	25.9%	34.1%	24.3%	31.5%	23.5%
Content that deals with your life and your community (such as community development projects)	10.6%	10.8%	10.5%	10.2%	11.4%	11.0%	10.0%
Content that allows you to continue your education (such as knowledge about science, math, and history that prepares you for college)	41.4%	38.5%	43.7%	37.9%	45.4%	40.8%	42.1%
Content that makes you feel better about yourself (such as learning to express yourself better)	5.3%	4.0%	6.3%	5.0%	5.7%	5.5%	5.0%
Content that helps you in your family life (such as improving family relations or learning about health and nutrition)	13.2%	12.8%	13.5%	12.7%	13.1%	11.0%	19.1%
Other content	.2%	.3%		.1%	.2%	.1%	.3%

Differences in responses were relatively predictable for this question. Working youth and males were more likely to select technical skills as their top priority for a program while youth raising children were more likely to select the curricular focus on families and personal life.

Across all groups, academic core content areas continue to be a major priority. Nonetheless, technical skills, community development projects, and content that could directly improve the lives of the participants and their families are also important to youth.

This finding suggests that the best curriculum for a large-scale alternative secondary program might be one that covers the national curriculum and prepares youth for

university and the labor force, but that is adapted as well to the personal and social context of the target population.

Surveyed youth were fairly consistent about the qualities they believe to be most important in a “good” teacher. Of six possible qualities, the youth tended to identify good training/education, good knowledge of what they teach, and teaching in an active and interesting way as the most important qualities of good teachers. More than 80 percent of respondents selected one of these three qualities.

There are a few significant differences across youth groups, as can be seen in Table 21, but these are relatively minor. Overall, the responses underscore the importance of having capable teachers who both know the material and know how to teach it. This focus of respondents may be due to concern that not all teachers meet those expectations.

Table 21: Teacher preferences for an alternative upper secondary education program

What do you think is the most important characteristic of a good teacher or facilitator?	Full Sample	Individual is enrolled		The area where you live is...	
		No	Yes	Urban	Rural
Doesn't miss class	3.4%	4.7%	1.9%	3.0%	4.5%
Has good education/training	25.1%	26.6%	23.3%	24.3%	26.7%
Treats students well	10.2%	10.7%	9.7%	11.0%	9.2%
Knows the material well	32.3%	30.4%	34.5%	29.9%	35.9%
Teaches in an active and interesting way	23.6%	22.8%	24.5%	26.2%	19.1%
Evaluates students fairly	5.5%	5.0%	6.0%	5.7%	4.7%

Survey results show that the target populations for an alternative secondary education program have a strong preference for teachers as their primary learning resource. Respondents were asked which, among a list of key learning resources, they thought they would learn best with in an alternative secondary program. A full 60 percent of those surveyed identified teachers as how they think they would learn best, above textbooks, computers, cassettes, TV, CDs, and internet. For those currently enrolled in alternative programs, the figure is 54 percent. Given our sampling technique, we can be fairly certain that throughout Honduras the majority of students enrolled in alternative programs for lower and upper secondary identify teachers as their most important learning resource. This is particularly interesting due to the fact that four of the six programs sampled, and 60 percent of the in-school individuals sampled, are enrolled in programs where the primary learning resource is not designed to be the teacher.

For example, zero percent of EDUCATODOS participants responded that they learned best from cassettes even though cassettes are the primary learning resource in EDUCATODOS; 4.5 percent of *TELEBÁSICA* participants asserted learning best from television despite the fact that television videos are the primary learning resource in that

program; and 4.8 percent of IHER students reported learning best from radio, a radio-based program. Further research would be necessary to understand why students in programs that use alternative technologies do not seem to value those technologies. One possible explanation is that the programs and teachers are not using the technologies appropriately (Marshall, et. al., 2005, Secretariat of Education, 2002). Another possibility, again, may be that these responses reflect youth notions about what a “real” or “serious” education program should look like.

After teachers, respondents are most likely to choose textbooks as the way they believe they would learn best in an alternative secondary program. Respondents chose textbooks nearly three times more frequently than the next learning resource: computers. Approximately one in five individuals surveyed, or one in four of the in-school respondents, believe that they learn best from textbooks.

Table 22: Learning resource preferences for an alternative upper secondary education program

<i>With which of the following resources do you believe you would learn best in an alternative secondary education program?</i>	Full Sample	Individual is enrolled		Individual works		Has children at home	
		No	Yes	Yes	No	No	Yes
With textbooks	21.9%	18.8%	25.5%	24.2%	18.5%	23.3%	18.8%
With cassette tapes	.4%	.7%	0%	.3%	.5%	.4%	.3%
With the radio	1.6%	1.9%	1.2%	1.8%	1.4%	1.5%	2.1%
With television	1.8%	2.3%	1.2%	1.2%	2.6%	1.6%	2.6%
With a computer	8.4%	6.6%	10.5%	7.9%	9.0%	8.6%	7.3%
With the internet	5.2%	3.5%	7.1%	5.6%	4.8%	5.8%	4.1%
With CDs	.5%	.6%	.5%	.6%	.5%	.2%	1.5%
With the teacher	60.2%	65.6%	53.9%	58.4%	62.6%	58.6%	63.3%

In-school youth, working youth, and youth without children at home are all at least slightly more open to innovative learning resources, but no resource was anywhere near the acceptance of teachers and the distant second, textbooks.

While these findings might sound surprising, they are consistent with the international literature and research on effective learning in alternative delivery programs. As Figueredo and Anzalone write: “Most people can learn appropriately through simple technologies, so that investments in expensive technologies is not usually justified, especially in developing countries where educational budgets are limited and needs are great” (p.29, 2003). Indeed, more than 80 percent of international distance education is print based. Alternatively, these responses may reflect traditional notions of education and learning resources.

This finding also underscores the critical role of teachers found in assessments of alternative and distance learning programs throughout the world. In one recent evaluation of the effectiveness of distance education programs across the world, the most significant

factor associated with increased program effectiveness was the level of instructor involvement. When instructor involvement in distance learning programs was low, traditional education programs were found to be more effective than alternative/distance education programs (on a range of outcome measures including test scores, drop-out rates, and external program evaluations). When instructor involvement was medium or high, alternative/distance programs outperformed traditional programs (Zhao, 2005).

The importance of textbooks and teachers for learning is again seen in a series of questions where respondents were asked to answer how important particular resources are for their learning. Table 23 shows the results of these questions. Again, teachers and textbooks are rated far above the other resources, although in this set of questions respondents were more likely to say that texts were “very important” to their learning (64%) than to say that the teacher or facilitator was “very important” to their learning (59%). Other resources, including learning technologies and the physical condition of the classroom, were considered relatively important to respondents.

Table 23: Assessment of various factors’ importance for learning in an alternative upper secondary education program

<i>How important is/are _____ for your learning?</i>	The text-books	The teacher/facilitator	The blackboard	Tech. resources	The physical state of the classroom
Very important	64.0%	59.1%	37.8%	48.5%	42.4%
Important	11.3%	16.2%	38.8%	26.6%	29.5%
Not very important	24.7%	24.7%	23.4%	25.0%	28.2%

It is interesting to consider why there is a slight discrepancy between the answer to how respondents think they would learn best in an alternative secondary program and how respondents rate the importance of various resources for their learning. It could be simply a matter of the wording of the question, or it could be that in the first question they are being asked to think of how they would learn best in an ideal program while in the second they are being asked to think of their past experiences. In this sense the strong favoring of teachers in the first question could suggest how youth believe they could learn best while the responses to the second might indicate that textbooks have, in the past, proven to be a more reliable source of learning than their teachers or facilitators.

These findings on learning resources suggest that any alternative upper secondary system in Honduras would benefit from ensuring high quality textbooks and face-to-face support from teachers. More technologically advanced media, such as video, radio, or computers, can provide more interactive and dynamic material but are difficult and expensive to ensure proper distribution and usage (Guri-Rosenblit, 2005; UNESCO, 2001). Given the cost of producing such media and the relatively small population in Honduras and limited education budget, a program would benefit from using these as potential supplementary materials rather than as a primary learning resource.

The final set of questions dealt with what things youth would be willing to pay for if their ideal program existed (see Table 24). The responses to this question do not indicate that youth have the means to pay for the top affirmative responses; rather they indicate what costs would be reasonable to pass on, in part, to participants. As Table 24 shows, more than 60 percent of respondents answered that they would be willing to pay for an annual enrollment fee and textbooks. A full 40 percent, however, answered that they would not be willing to pay for these things.. The costs that youth were least willing to assume include a monthly fee (67%), payment for the teacher (82%), and security for the school (65%).

Table 24: Willingness to pay for various factors in an alternative upper secondary education program

<i>In your ideal program, would you be willing to pay for _____?</i>		Yes	No
Enrollment fee?	%	61.3%	38.7%
Monthly fee?	%	33.3%	66.7%
Textbooks?	%	62.6%	37.4%
Classroom materials and resources?	%	49.6%	50.4%
The teacher?	%	18.2%	81.8%
Transportation to class?	%	46.6%	53.4%
Security at the program site?	%	35.3%	64.7%
Minor repairs of the program site?	%	55.4%	44.6%

Based on these findings, the most reasonable cost-sharing options for an alternative secondary system are enrollment fees and/or textbook fees. Nonetheless, it needs to be ensured that these fees do not render the program inaccessible to the people we most want to enroll – those who, without an accessible, quality alternative program would not enroll in or complete secondary education.

With this understanding of the demands and constraints for alternative secondary schooling among the different target populations for such a program, we now turn to our analysis of secondary education in Honduras and existing alternative secondary programs in particular.

IV. Evaluation of Honduras' Existing Alternative Upper Secondary Programs

This section takes an in-depth look at six alternative secondary education programs currently operating in Honduras. In our efforts to understand what sort of program would suit the needs of Honduran youth and adults who cannot attend traditional programs, we also hope to learn how these needs are being met or not by existing programs.

For this work we spent time with each program, visiting and observing classes, holding focus groups of students, and interviewing teachers and local and national administrators. The following is a summary of our findings. First we offer a detailed description of each program organized into five key areas, then we offer a comparative analysis of the strengths and weaknesses of each program.

We identified six fundamental aspects of alternative secondary programs that are critical to program success and we conducted our research and analysis using the framework of these five aspects. They include: 1) program policies and management; 2) program finance; 3) organizational arrangements; 4) program curriculum; 5) program instruction; and, 6) program internal efficiency. These six areas encompass and organize the main ways in which alternative delivery programs are designed to meet the needs of their target populations. In this section we first review the literature on each of these program aspects in regards to alternative secondary education programs and then turn to an evaluation of each of the six existing programs in Honduras organized along these same six lines.

One critical piece of a thorough evaluation of these programs is of course the learning outcomes of the students. Unfortunately, there is no pre-existing comparable measure of student learning among the programs, such as a secondary school exit exam, and it was beyond the purview of this study to administer a test to program participants. An evaluation, therefore, of how well programs are educating participants, controlling for the background characteristics of participants, is an important step to take before making any final conclusions about the relative merit of any of the programs as a model for program expansion.

Policies. Policies in alternative secondary programs frequently are organized to facilitate particular populations or hard-to-reach or hard-to-educate individuals. It is well recognized that disadvantaged and underserved populations benefit differently from different kinds of educational inputs (Anderson, 2002). Most generally, alternative programs can include policies that lower the barriers to participation (Figueredo and Anzalone, 2003), such as lowering the private costs of schooling to participants and their families, and lowering entry or qualification requirements.

Alternative education programs face unique management challenges because they are frequently less centralized than traditional schools, less accessible (such as being located in hard-to-reach or dangerous areas or taking place at night or during the weekends), and tend to have fewer staff, less-qualified staff, and more dispersed staff. Alternative programs also struggle to balance responsiveness to local adaptation and needs with central support and guidance. Managing alternative programs requires specific skills and

tasks, including ensuring that disperse local staff have sufficient support and preparation, sites have the necessary supplies and resources, local needs are respected and honored, and data is monitored and analyzed (Figueredo and Anzalone, 2003).

Finance. Program finance is critical to program sustainability. Many alternative education programs are implemented because they can lower the per student cost of education, particularly in hard-to-access areas where per student costs for traditional education can be prohibitive (UNESCO, 2001). But alternative programs are, at times, implemented haphazardly in an effort to cut per student costs rather than provide a quality education innovatively. Such programs often are tossed out after a few years (UNESCO, 2001), resulting in a major waste of funds. (Alternative programs often have high start-up costs and only become cost-efficient when they are large enough or have existed long enough to benefit many participants.) Alternative education finance, therefore, needs to be sustainable and programs need political and social support (World Bank, 2005b). They also need to balance social with private costs. Because alternative programs tend to target poor and at-risk populations, they cannot depend on participants for large amounts of cost-sharing.

Organizational Arrangement. The success of alternative programs in attracting and retaining participants depends, in part, on ensuring access to target populations. Access is often achieved through flexible organizational arrangements including condensed programs with fewer class hours, local community locations, night or weekend hours, flexible annual calendars that respond to agricultural cycles, or flexible student assessment practices that allow students to enter and exit the program at different times of the year or retake exams (Figueredo and Anzalone, 2003; UNESCO, 2001; World Bank, 2005b).

Instruction. Research on instruction in alternative programs confirms that students can learn in a variety of ways; indeed it is less the medium of instruction that is used and more the quality of that instruction (World Bank, 2005c). Despite this, as mentioned earlier, teachers still play a critical role in the effectiveness of alternative programs, although in some programs the teaching itself is done at a distance, such as with on-line courses (Zhao, 2005). Nonetheless, research suggests that people nearly always prefer face-to-face instruction or hybrid models over distance teaching methods. A balance must be found between the cost-savings that are gained from using fewer teachers, less teaching time, or less qualified teachers, and the learning benefits of ensuring high quality instruction. Whenever possible, a mixture of instructional resources supports diverse learning styles. On the other hand, typical alternative delivery programs, especially in developing countries, often are poorly positioned to use newer technologies due to lack of financing, equipment, and access to program sites (Guri-Rosenblit, 2005). Alternative education students often are academically weaker than traditional school students because of their socioeconomic disadvantages, their competing commitments, and their schooling history, and yet alternative programs often demand more of them in terms of self-instruction. Additionally, because frequently there is less teacher-directed instruction, fewer class hours, and alternative media, the pedagogy employed in

alternative programs must be appropriate for the program (Figueredo and Anzalone, 2003).

Curriculum. Here again, alternative programs face several challenges. First, alternative programs often are considered, and indeed are, a second-rate education (World Bank, 2005c; Figueredo and Anzalone, 2003). Earning legitimacy as a quality program, comparable to traditional schools, is critical for program success. Because of this, and because graduates should have the same privileges as graduates of conventional schools, most alternative programs cover the same curricular material as in traditional schools, take the same standardized and exit exams (if they exist), and earn the same diploma. But alternative programs frequently do not want to teach the exact same curriculum because they want to cover material that is meaningful to the target population, such as a rural-development focus, a community-development focus, skills for work focus, or a personal development focus. The challenge then becomes how to teach a traditional curriculum plus adapted material all in a shorter amount of time and expect to have the same learning outcomes (Figueredo and Anzalone, 2003; World Bank, 2005c).

Efficiency. To be successful, an alternative delivery program needs to attract and enroll sufficient quantities of participants and ensure that the highest proportion possible proceeds through the program to completion. High repetition and drop-out rates indicate that the program is not meeting the participants' needs (potentially the learning needs or scheduling needs) and these same efficiency problems increase the per-student and per-graduate costs (di Gropello, 2006).

Using these criteria, we now turn to evaluate the six existing alternative secondary education programs in Honduras. As stated earlier, this evaluation is almost entirely qualitative, based on interviews with national directors, regional coordinators, and teachers; classroom observations; focus groups with students; and a review of the existing literature.

EDUCATODOS

EDUCATODOS, a semi-autonomous program of the Secretariat of Education, was established in 1995 through USAID and still receives USAID support. It served 132,000 first to ninth grade students in 2006 (22,000 in lower secondary grades 7 to 9) in 16 of Honduras' 18 regional departments. The mission of EDUCATODOS, is to improve access to basic education particularly for people excluded from the traditional system.

Policies. EDUCATODOS targets low-income youth and adults in rural and peripheral urban areas. It does so by offering a community-centered education model with relatively low direct costs to participants structured around times and places when working participants can attend. EDUCATODOS is, by far, the lowest cost alternative program, with social costs reaching only about US\$40 per participant per year (see Table 25). Direct private costs to students (textbooks and fees), according to our national survey, are significantly higher, at about US\$100 per year. The highest reported private costs to

students, according to our survey, however, are indirect costs such as transportation to class and food.

EDUCATODOS has a partly decentralized organizational structure comprised of a National Technical Coordination office which is semi-autonomous from the SE, departmental offices, promoters who work at the municipal level, and then each individual class center.

EDUCATODOS added the lower secondary grades in 2000. Like all six of the programs we evaluated, EDUCATODOS offers graduates national accreditation, meaning that EDUCATODOS graduates of the ninth grade should be able to enroll in any upper secondary school, traditional or alternative. EDUCATODOS has been financed largely through USAID with counterpart funding from the SE. At the local level, EDUCATODOS also benefits from significant local counterpart , including volunteer teachers (facilitators), borrowed space, and, in certain cases, municipal government, non-profit or private sector financing. USAID financing ends in 2009.

Structure and Organization. At the level of the individual class center, each group of participants is responsible for selecting their own facilitator, finding an appropriate, accessible location for classes, and choosing 10 hours per week to hold classes. Classes are generally held in local primary schools after hours, or in community centers or churches. Class hours are typically two hours per day, Monday through Friday, in the evening or night, or 5 hours per day on both Saturday and Sunday. The local selection of facilitator, location, and hours is designed to ensure greater accessibility for participants. While the precise figure is unknown, average class size is probably between 10 and 20 participants.

Curriculum. EDUCATODOS has developed its own curriculum for grades 1-9 based on guidelines from the SE (“*Rendimientos Básicos*”) but organized into five integrated thematic areas designed to be of greater relevance and interest to EDUCATODOS target participants. The five areas are: Population, Health, Environment, National Identity, and Democracy. The curriculum in these content areas is widely perceived to be quite good. English is taught in grades 7-9 in EDUCATODOS, although the quality of the English curriculum has been criticized. All curricular areas are currently being reviewed and adapted to meet the new Basic National Curriculum laid out by the SE.

Table 25: Per Student Private and Social Costs, by Program and Cycle in USD\$

Cost type		SEMED	IHER	EDUCATODOS	SAT	TELE-BASICA	Nocturnos
Private Costs	Direct private costs - Lower Sec	220.61	108.44	101.88	61.81	6.99	92.46
	Indirect private costs - Lower Sec	211.02	89.22	144.30	96.24	317.93	405.84
	Lower Secondary Total (US\$)	431.64	197.66	246.18	158.05	324.92	498.29
	Direct private costs - Upper Sec	342.81	125.30				79.48
	Indirect private costs - Upper Secondary	203.56	81.59				499.69
	Upper Secondary Total (US\$)	546.37	206.88				579.17
Social Costs	Lower secondary	131.38					
	Upper secondary	138.19					
	Lower and upper combined			37.43	299.27	347.27	202.77
Total Costs	Total per student cost - Lower secondary (social, private direct, private indirect)	563.02		283.62	457.33	672.20	701.07
	Total per student cost - Upper secondary (social, private direct, private indirect)	684.56					781.94
	Total per student cost - Lower secondary (only direct costs - private and social)	352.00		139.32	361.08	354.26	295.23
	Total per student cost - Upper secondary (only direct costs - private and social)	481.00					282.26

Instruction. In the EDUCATODOS program, the primary “teacher” is designed to be cassette tapes and textbooks rather than instructors in the classroom. There is one classroom facilitator per group of students but this person’s role is to guide the students and follow instructions from the cassettes. The cassettes and textbooks are specifically designed for EDUCATODOS to be largely self-sufficient. Facilitators work as unpaid volunteers (except in some cases where they are given some type of monetary incentive either by students or by a local financier). To qualify as a facilitator at the lower secondary level, the individual must have completed upper secondary (grade 11 or 12) and be willing and able to facilitate classes. The facilitators are given initial training that focuses on EDUCATODOS methodology, classroom management, and leadership. They are not trained in curricular content since the tape and book teach those contents. EDUCATODOS has developed standardized tests based on the EDUCATODOS curriculum that all participants take. A 2002 study conducted by UMCE found that academic achievement in core subject areas was comparable between lower secondary EDUCATODOS pilot centers and traditional lower secondary schools located in similar communities. Research also shows, however, that program quality has deteriorated

somewhat with the expansion of the lower secondary EDUCATODOS program (Marshall, et. al., 2005).

Efficiency. A recent study of efficiency in EDUCATODOS' lower secondary cycle found a 60 percent desertion across the cycle (from grade 7 to grade 9) and only 25 percent of the initial grade 7 cohort made it to grade 9 two years later (Marshall, et. al., 2005). Of the 60 percent that deserted, up to one-third did not drop out but rather the center where they studied closed. Marshall, et. al., found that participants and centers were more likely to survive if they were located in schools, vocational centers, or at work sites. Programs and students in homes or other locations such as churches were less likely to survive.

SAT

SAT, or the System for Tutorial Learning, originated in Colombia and was introduced in Honduras in 1987 through a USAID Project implemented in collaboration with the Centro Asesor para el Desarrollo de los Recursos Humanos de Honduras (CADERH) and Colombia's Fundación para el Desarrollo y Aplicación de las Ciencias (FUNDAEC). Since then it has become a well-respected, though relatively small-scale alternative secondary education program operating in twelve of the nation's 18 departments and serving over 7,000 students in grades 7-12 (lower and upper secondary). SAT operates only in rural areas with the mission of promoting human resource development in rural areas to empower rural populations to take on their own developmental challenges.

Policies. The target population for SAT is poor rural youth and adults who completed their primary education but do not have access to local secondary schools. Most SAT participants either work in agriculture or at home. Private costs are kept minimal with no tuition, minimal costs for textbooks, and little to no cost for transportation. In our survey SAT had, by far, the lowest private costs of schooling, averaging US\$60 per year in direct costs and US\$95 in social costs. Per pupil social costs are US\$300 per year (see Table 25), less than the annual per pupil social costs of *Telebásica*, the other small-scale program. SAT has diverse funding sources from the SE and national and international nonprofit and intergovernmental organizations. Like EDUCATODOS, SAT is set up to suit the schedule and location/access of participants, and graduates receive national certification. At the upper secondary level, graduates earn a *Bachillerato* (secondary school degree) in Rural Well-Being and are qualified to apply for studies at the university level.

SAT is run by a religiously affiliated nongovernmental organization, BAYAN. There is a central office in La Ceiba (Atlántida) where centralized responsibilities such as curriculum, statistics, and assessment take place. Departmental coordinators and local *asesores* in turn work directly with local centers. *Asesores* handle most of the local administration of the program. The SE also is involved in SAT management. Traditional upper secondary institutes house the *asesores*, and departmental SE offices manage and pay SAT teachers.

Structure and Organization. At the local level, SAT sites are closely linked with the communities where they are located, mainly because of SAT's close involvement with community development. Generally, local parents and community leaders help to manage and support the local SAT site. The SAT program is 30 hours per week, 20 classroom hours, and 10 fieldwork hours. Classroom hours are held in the afternoon, Monday through Friday. The school calendar runs parallel to the SE calendar with the important exception that in SAT there is no student repetition, so if students do not pass a final exam or if all the material is not covered in the traditional school calendar, classes can continue indefinitely until students are prepared to move on to the next year. Classes are held in the local community, either in a pre-existing building or in infrastructure created by the community for the center. One center we visited was held in open thatch huts that had been built by the community for SAT.

Curriculum. SAT has a carefully designed integrated curriculum and corresponding textbooks based on the National Basic Curriculum of the SE. The curriculum is organized into five areas: Math, Science, Communication and Language, Technology, and Community Service. All of the areas are adapted for a rural and applied focus. SAT considers itself to have a vocational, rather than academic, focus, concentrating on micro-enterprise and rural development. Participants are evaluated using standardized exams which are designed, administered, and graded by program administrators (not the tutors).

Instruction. Instruction in SAT is lead by a "tutor" who teaches all the subjects for that grade. Tutors are SE employees, paid according to the teacher wage scale by the departmental SE office. Separate from conventional school teachers, however, SAT tutors are selected through a competitive process within SAT and then are vetted by the departmental SE. Of the requirements to be a tutor, one is to have a university degree. Individuals whose degrees are in community-based education or education generally are preferred, but other university degrees are accepted and at times, secondary school graduates who enroll in the National Pedagogical University are also accepted. Tutors undergo six weeks of training per academic year – two weeks prior to each trimester. Training covers methodology as well as content. Tutors also have the support of an *asesor*. The pedagogical focus is interactive, with a vocational focus on community service, micro-business, and agricultural industries. Aside from the tutor, the primary learning material is the textbook. Technological or scientific materials may be used in the fieldwork for agricultural experiments or community service projects.

In terms of learning outcomes, SAT has undergone three external evaluations in recent years. One study, conducted by the SE in three departments, found that SAT student math skills are superior to those in traditional schools (*Secretariat de Educaci3n*, 2001). Spanish test results were comparable between the two groups. A study by Based-UK of the same three departments also showed that SAT has had a positive impact on rural development.

IHER (*Maestro en Casa*)

IHER, or *Maestro en Casa*, (Teacher at Home), is a distance education program organized around self-instruction through textbooks and radio programming. IHER stands for the Honduran Institute for Radio Education. The program is based on a program from the Canary Islands of Spain and has been operating in Honduras since 1989. It offers primary as well as lower and upper secondary studies and currently enrolls some 35,000 participants, of which about 13,000 are in lower secondary and 6,000 in upper secondary. The mission of IHER is to elevate education levels, critical thinking, and solidarity for the neediest Hondurans.

Policies. IHER is a semi-autonomous program, run by a religious nongovernmental organization but as an official SE distance education program and using the national curriculum. The program has been expanding in recent years to meet demand. The private costs of schooling are moderate, averaging US\$100 per year in direct costs and US\$100 in indirect costs at the lower secondary level. Students pay for their packet of textbooks as well as a small monthly fee. Unfortunately, the program is highly fiscally decentralized and we have no data on the social costs of the program although they are estimated to be quite low. Financing comes from the SE for textbook design and production, assessment design, and radio program development and broadcasting, but the local functioning of the program is covered through the monthly fees and other forms of local financing.

Organizational management of IHER is highly decentralized to municipal and community IHER centers. These offices handle the administration of the program while the central office handles program materials as outlined above.

Structure and Organization. At the local level, IHER offices finance the program, select program “animators” (teachers), and handle day-to-day administration. The program is comprised of one hour of radio per week per grade level and four hours of tutorial with an animator. As with EDUCATODOS, the location for the local IHER center and time of the tutorial hours are determined by the group of students and their animator to be accessible to participants. Community IHER centers frequently are located in community centers, churches, or primary or pre-schools.

Curriculum. The IHER curriculum is the national traditional curriculum for an academic secondary school degree (Sciences and Letters). IHER creates its own textbooks and radio program, but the content of the curriculum is only minimally adapted to the distance learning context. Unlike some of the other programs, subject areas are traditionally delineated in history, math, physics, etc., and while there are many fewer hours of class in the IHER program compared with traditional schools, both have a duration of two years. Students generally study only two subjects every eight weeks, rotating between subjects four times a year. The weekly hour of radio is divided between the two current subject areas. Some centers operate without the weekly hour of radio and instead have five hours per week with the animator.

Instruction. Like EDUCATODOS, the primary “teacher” for *Maestro en Casa* is designed to be the radio. Furthermore, the educational model is one based on self-

instruction where most of the learning is done independently, at home, by participants. The program animators, also like EDUCATODOS, are volunteers with minimal background requirements (that they have completed more years of schooling than that which they teach). Animators typically are selected by a network of local stakeholders who support IHER in the community. Animators are given limited training each year in the methodology and use of the textbooks. They are not supposed to teach the material but rather to clarify questions and support the learning of participants. Students have auto-evaluation exercises in their textbooks to monitor their learning, and animators administer and grade standardized exams to determine whether students pass or fail the subject.

Efficiency. Unfortunately, *Maestro en Casa* has not undergone any internal or external evaluation. Moreover, it lacks centralized statistics on student flow, including repetition rates, so we were unable to construct a cohort model.

Telebásica

Telebásica is somewhat different from our other alternative secondary programs in that it differs little from traditional programs except for its use of television-based lessons. The alteration of technology, instruction, and curriculum in innovative ways, as seen in *Telebásica*, is one of the four characteristics of alternative education as we define it in this study. As stated in a 2001 evaluation of *Telebásica*, *Telebásica* schools can be described as “self-managed creative schools that use teaching methods and management processes that distinguish them from traditional schools” (AIR, p.1). *Telebásica* is a SE program with semi-autonomous administration and with close ties to its parent program, *Telesecundaria*, in Mexico. The program, which began in 1996, is still in the pilot stage with only 59 *Telebásica* centers (in 16 departments) in Honduras and just over 4,000 students. It offers lower secondary education only in rural areas.

Policies. *Telebásica* has few policies that separate it from a traditional lower secondary program. Perhaps most importantly, *Telebásica* does not target a lower secondary population other than that of other *Centros Básicos* where the pilot program sites operate. It is important to note, however, that *Centros Básicos* themselves have a separate target population. *Centros Básicos* are schools in rural or semi-rural areas where there was little pre-existing access to secondary education. Traditionally in Honduras, primary schools offer grades 1-6 and secondary education institutes offer grades 7-12. *Centros Básicos*, by contrast, offer grades 1-9 in an effort to expand access to lower secondary education to rural populations. So while *Telebásica*, as a pilot program within *Centros Básicos*, does have a somewhat different target population than traditional secondary schools, it does not, like the other programs we investigated, target working, overage, or returning students. *Telebásica* has extremely low direct costs of schooling because there is no enrollment fee, schools are located locally, and textbooks are donated by Mexico. In Honduras, *Telebásica* students on average spend less than US\$10 per year on direct costs (see Table 25).

Funding for *Telebásica* comes from the SE, the Secretariat of Public Education in Mexico, and international funding, such as from the Inter-American Development Bank. *Telebásica* has the highest per student social cost (US\$347) among the six programs although it is only US\$50 more than SAT (see Table 25). This high cost is largely due to teacher salaries as well as the donated books. Even so, part of the high cost of the *Telebásica* program is due to economies of scale, where the *Telebásica* program has high capital and start-up costs for curricular development and adaptation, etc., but not the high numbers of students that other programs like IHER, SEMED, *Institutos Nocturnos*, and EDUCATODOS have.

Telebásica has a national office with departmental support located in SE departmental offices. Unlike some of the other programs, school sites also have directors who support the administration and functioning of *Telebásica* sites.

Structure and Organization. As mentioned above, *Telebásica* takes place in traditional *Centros Básicos*, schools primarily located in rural areas that offer grades 1 through 9. Because these are traditional schools, there is little community management. Classes are held five hours a day from Monday through Friday for a total of 30 hours per week. Every day a variety of subjects are covered, generally lasting 40 minutes each.

Curriculum. The *Telebásica* program relies heavily on the Mexican *Telesecundaria* curriculum – both the videos and the textbooks come from Mexico – but the curriculum has been adapted for the Honduran context (although many still claim that it needs to be adapted more). The curriculum is adapted to meet Honduras' National Basic Curriculum for grades 7 through 9 and graduates, as in all the programs, receive the same national certification. The curriculum is organized along traditional content areas of Math, Science, Spanish, Social Studies, English, and Technology Education and remains relatively theoretical as in traditional lower secondary programs.

Instruction. Instruction in *Telebásica* is led by qualified teachers (qualified meaning they have a university degree in teaching at the secondary level) who compete for *Telebásica* positions and become paid SE employees. *Telebásica* teachers, and *Centro Básico* teachers generally, differ from traditional secondary school teachers in that rather than having subject-specific teachers, teachers on average teach 3.2 subjects (Ayerbe and Alas, 2005). *Telebásica* teachers receive specialized *Telebásica* training in the pedagogical model of the program and receive program supervision four times a year. While teachers are a primary learning resource, the television programs also are an important learning resource. These programs are paired with *Telebásica* textbooks and learning guides. The program is designed to function as such: the teacher puts on the video and when it is done the class works from the textbooks and learning guides based on what they just watched. One interesting finding from the 2001 evaluation of *Telebásica* is that many teachers are foregoing the use of the videos because they are rushing to get through all the material due to school closings and teacher absences (AIR). Interviews suggest that *Telebásica* schools function less than 100 days per year while the Mexican curriculum assumes approximately 200 days of class.

Telebásica participants take specific program exams. The AIR report found that academic achievement was higher in *Telebásica* schools than in comparable *Centros Básicos* without the *Telebásica* program (2001). The report also found that student retention was higher in the *Telebásica* program.

Efficiency. We created a reconstructed cohort analysis for *Telebásica* from 2005 and 2006 data using the UNESCO Institute for Statistics method. According to our cohort analysis, *Telebásica* is a fairly efficient program comparatively. Promotion rates are roughly 85 percent in grades 7 and 8 and are significantly higher in grade 9. Most of the students who do not go on to the next year are dropping out. Grade 7 has a 16 percent drop-out rate and grade 8 has a 12 percent drop-out rate. Few students are repeating, with repetition rates under two percent for all three years.

SEMED

SEMED is a distance learning modality for upper and lower secondary education run by the Secretariat of Education. It began in 1992 in response to the Education for All Conference held in Jomtien, Thailand, as a means of providing a distance-learning option for youth and adults who wished to continue their education but could not attend conventional schools. SEMED is a large program, serving 27,000 students in grades 7-12 nationally in 17 of Honduras' 18 departments.

Policies. SEMED is a fully state-run program operated out of the Secretariat of Education and offering a distance education program based on self-instruction during the week and weekend face-to-face reviews and exams. It is open to any individual 15 years or older who has completed grade 6 and serves a range of participants -- youth, adults, and seniors from both urban and rural areas. Private costs for SEMED include an enrollment fee (although this was waived last year and is expected to be waived for the next few years) and textbook purchase. SEMED is offered in conventional secondary education institutes in urban areas, thus resulting in significant transportation costs for students traveling from rural areas.

The private costs of schooling in SEMED are high. Students report spending between US\$200 (lower secondary) and US\$343 (upper secondary) per year in direct costs alone (see Table 25). The bulk of these costs are in textbooks and monthly fees. Transportation to SEMED centers and food also are expensive.

The social costs of SEMED are very low at an estimate US\$130 per student per year in lower secondary and US\$140 in upper secondary (see Table 25). The low social costs are due to the use of existing infrastructure, hourly, rather than salaried, pay for teachers, and the fact that students, by purchasing textbooks, cover most of the costs of educational materials. Financing for SEMED comes largely through the Secretariat of Education with additional support from student contributions and the Inter-American Development Bank.

Management of SEMED is through the Secretariat of Education where there is a National Coordinator for the program and a technical team that works on textbooks, curriculum

adaptation, manuals, and standardized exams. The local management, administration, and supervision are conducted at the school level where each SEMED program has a SEMED program director and an academic coordinator in addition to regular school staff such as the school director. As mentioned earlier, SEMED program sites are within conventional public secondary institutes and the SEMED program is under the purview of the general school management.

Structure and Organization. SEMED is a self-instructional program in which participants study on their own during the week and on the weekend meet at the school site for classes consisting of review and end-of-period exams on Saturday afternoons from 1-6pm and Sunday mornings from 7am-12pm. This comprises a total of 10 face-to-face hours per week. Participants generally come from the urban center where the institute is located and surrounding rural and semi-urban communities. While we do not have precise figures, SEMED class sizes tend to be much larger than many of the other programs, with program staff estimating an average of 75 students per class at the beginning of the year. Unfortunately, SEMED suffers from a serious drop-out problem and by the time we observed classes at the end of the academic year, some classes had no more than 15 attending students.

Curriculum. SEMED follows the curricula of conventional schools with some minor adaptations for the distance learning modality. At the lower secondary level there is only one national curriculum, and SEMED follows the national plans and programs for this level. At the upper secondary level where there is a range of academic programs, SEMED offers only one *bachillerato*, that of business administration. The adaptations are minor, such as removal of physical education, but SEMED has developed its own textbooks, designed for self-instruction, and teachers' manuals.

At the upper secondary level each of the three years is divided into six periods. In total, students cover 36 subject materials and do three practicums. SEMED participants are evaluated using standardized SEMED exams that are given simultaneously in all SEMED sites. Evaluation also consists of teachers' assessment of student homework.

Instruction. SEMED "tutors" are teachers – generally from the same institute where the SEMED is located – who are selected and offered positions in SEMED. For this additional work they are given additional pay from the SE. The pay SEMED teachers receive is hourly, at the same rate as their weekday teaching, but they are hired on a temporary basis, allowing for their periodic evaluation or removal. They are paid only for the time they teach and do not receive some of the benefits they receive as weekday teachers, such as a two-month bonus pay. The role of SEMED tutors is to review material, answer questions, and administer assessments. They are not supposed to "teach" the material, as students are supposed to learn it on their own, but several of the teachers we talked to said that they often actually must teach the material as their time with the students is limited. The main learning resource for the program is designed to be the auto-instruction textbooks. The tutors are all required to have a university degree in education; however, they have not been given any training in SEMED pedagogy for several years.

They do receive some supervision and support at the school level from the SEMED program director and academic coordinator.

This year the Inter-American Development Bank is financing an internal evaluation of the SEMED program. Results have not been completed or released to date.

Institutos Nocturnos

Institutos Nocturnos, or night schools, are the oldest of the programs we investigated in this study, having begun in the 1970s. Night schools, like *Telebásica*, differ less from traditional schools, although in a very different manner. *Telebásica* has the same schedule and target population as conventional schools but a different pedagogy and use of technology. Night schools follow the exact same pedagogy and curriculum as traditional schools, use the same learning resources, but have a different target population and are offered at night to suit the needs of this working, urban, and semi-urban population. The program was initiated as a means of expanding secondary education access to this population that works during the day or is over-age and does not want to attend traditional secondary schools. Night schools exist across the country, in both public and private secondary education institutes, serving more than 40,000 students.

Policies. The main policy that separates night schools from conventional schools is that classes take place at night and there is no age limit on enrollees. Private costs vary significantly for night schools because those housed in private schools may charge whatever enrollment fee and/or monthly fees they choose. Public schools that offer night classes do not charge monthly fees and this year the enrollment fee was waived. Estimated direct private costs from our survey are between US\$80-90 per year per student although students reported very high indirect costs from transportation and food. Transportation costs may be more expensive and difficult to access due to the late hour when night schools end (around 9pm).

We estimate that the social costs for night schools are also relatively low, around US\$200 per enrollee per year, largely because of the size of the program and large class sizes, estimated by program personnel at around 45 students per class at the beginning of the academic year.

One of the qualities that separates the night schools from the other programs analyzed here is that the night schools have no separate management structure. They are managed through the regular secondary education departments in the SE or through the private schools that operate them, and they have no specific staff. Similarly, at the school level there is no separate management for night schools. They are supported and run by the regular school staff where the night schools take place.

Structure and Organization. The target population for night schools includes nontraditional students, many of whom are youth who work in *maquilas*. Others are unemployed youth, adults, or youth working in other sectors such as the service sector. Nearly all participants are poor. The only real difference between traditional programs

and night school programs is the hours of class. Night schools are held in the evening hours, generally for 3.5 or 4 hours per day, Monday through Friday, from around 5:30 to 9 p.m. Individual classes are shorter to accommodate this shortened time period (which, in day programs, is usually 5 hours a day), lasting 30 minutes each. Like SEMED, night schools are held in traditional secondary education institutes which are in urban (or semi-urban) areas. The SE reports that there are more night schools held in private schools today than are held in public schools.

Most night schools are now organized and run in private secondary schools with little supervision by the SE.

Curriculum. Night schools offer both lower and upper secondary education. At the lower secondary level they offer the unitary national curriculum. At the upper secondary level night schools offer a host of different programs including the academic *bachillerato*, as well as many technical *bachilleratos* including accounting, business administration, computer sciences, etc. Whichever the program, night schools use the same curriculum, the same plans and programs, and the same textbooks as traditional schools. There are some very minor adaptations, such as with physical education or compression of the curriculum due to the shortened hours that are done ad hoc on an individual teacher basis.

No separate evaluations of the night school program in Honduras have been undertaken. It is generally held, however, that the quality of teaching and learning in these programs is lower, with teachers having lower expectations of students and students facing multiple responsibilities and challenges in their participation in the program.

Instruction. Instruction in the *Institutos Nocturnos* is led by teachers with university degrees, generally who teach in the morning and/or afternoon secondary education shifts as well. Unlike in SEMED, however, these teachers are permanently hired to these night school positions and receive a salary as if they were teaching a morning or afternoon shift. There is no specialized training for night school teachers and teachers are supposed to teach the same as in a day program, that is, be the primary learning resource for the class, teaching all the material in the curriculum. Teachers also independently develop and administer their own student assessments for this program.

Comparative Summary of Strengths and Weaknesses of Alternative Secondary Education Programs in Honduras

The preceding detailed description of the policies, organization, curriculum, instruction, and efficiency of Honduras' alternative secondary education programs begins to offer a sense of how appropriate each program might be were it to be scaled-up to meet the growing demand and need for alternative secondary education. In that section, however, we attempted to be descriptive rather than analytic. This next section consolidates our analysis and findings as to the strengths and weaknesses of the programs. These findings come from a variety of sources – from our own observations and analysis, from the opinions of stakeholders, from the youth survey, and from pre-existing research on the

programs. Whenever possible we have attempted to triangulate findings, for example by asking stakeholders their opinion on something we observed in class or heard from student focus groups. As in the preceding section, this analysis of strengths and weaknesses is organized into the five organizational areas.

At times we will refer to the survey opinions of in-program and deserter youth on a number of characteristics of the six programs. On a scale of “very good” (1) to “very bad” (5), these groups of youth rated 10 aspects of their respective programs. Table 26 and 27 report findings from these questions. The survey asked about the quality of the programs’ content, the schedules, location, attendance, training and treatment of the teachers, and the educational resources of the programs and level of private program costs. The first table reports average responses across the entire sample. These findings are representative at a national level. The second table reports program-specific averages.

The sample was not designed to be representative at the level of the individual programs so differences in the average ratings across programs could simply be the result of the centers that happened to be selected for the sample. Nonetheless, Table 27 reports mean responses by program to provide a possible sense of participant and prior-participant perceptions of the programs individually. The tables will be referred to in the discussion below.

Table 26: Average student and deserter ratings of various aspects of alternative education program quality

<i>In terms of the program you are (or were) enrolled in, how would you rate:</i>	Count	Mean
The contents that are taught	721	1.42
Class schedule (hours)	721	1.72
Class schedule (days)	721	1.68
Location of the education center	721	1.91
Distance from your home to the education center	721	2.33
How the teachers/facilitators treat you	721	1.63
Teacher/facilitator attendance	721	1.62
Teacher/facilitator educational background	721	1.50
Educational resources such as books, cassettes, etc.	721	1.96
The level of costs of the program	721	1.92

1='Very good' 2='Good' 3='Ok' 4='Bad' & 5='Very Bad'

Table 27: Average student and deserter ratings of various aspects of alternative education program quality, by program

<i>In terms of the program you are (or were) enrolled in, how would you rate:</i>	Program					
	EDUCA TODOS	SEMED	TELEBÁSICA	SAT	IHER	Inst. Nocturnos
	Mean	Mean	Mean	Mean	Mean	Mean
The contents that are taught	1.37	1.30	1.44	1.14	1.41	1.55
Class schedule (hours)	1.43	1.74	1.85	1.82	1.76	1.72
Class schedule (days)	1.17	1.66	1.81	1.73	1.78	1.71
Location of the education center	1.47	1.96	1.77	2.32	1.83	1.97
Distance from your home to the education center	1.60	2.66	2.38	2.36	2.27	2.21
How the teachers/facilitators treat you	1.36	1.60	1.75	1.41	1.34	1.85
Teacher/facilitator attendance	1.36	1.54	1.65	1.55	1.48	1.79
Teacher/facilitator educational background	1.30	1.45	1.73	1.27	1.41	1.63
Educational resources such as books, cassettes, etc.	1.48	1.81	2.00	1.67	1.81	2.26
The level of costs of the program	2.20	1.97	2.15	1.91	1.80	1.88

1=Very good; 2=Good; 3=Ok; 4=Bad; 5=Very Bad

Policies. Many program policies are specific to one of the other organizational areas below and are discussed therein. A few examples of broader policies are discussed here.

One broad policy is that program sites need to receive sufficient support to ensure their sustainability. Most of the programs reviewed here have this local site-specific sustainability, but EDUCATODOS program sites may have a serious closure problem. In the 2005 Marshall, et. al., study, 20 percent of the cohort followed had their program site closed during the course of the lower secondary cycle, preventing them from finishing the cycle. In most cases, the study reported, the centers closed because facilitators decided not to continue. Also, closings are particularly high (39% - 50%) in centers located in homes and churches. Marshall, et. al., suggest that this problem be addressed by increasing the formality of each center, ensuring that they receive the necessary resources, and offer the facilitators some level of pay. In our interviews centers also reported that resources were insufficient and not delivered in a timely manner. The same

problem may also be present in IHER, where one teacher reported that the lack of incentives given to program instructors (“animators”) led to high teacher turnover rates.

Other policies revolve around promoting access and enrollment in each program by the program’s target population. All six programs appear to be doing reasonably well in this area. Programs targeting the out-of-school or working population -- IHER, SEMED, *Institutos Nocturnos*, and EDUCATODOS -- open enrollment to all ages. We noted one example of a continued barrier to access – although it did not involve any of the six programs we studied -- when we held a focus group with incarcerated youth. EDUCATODOS, impressively, has three functioning sites within a penitentiary, but because the formal secondary education school within the prison operates on a traditional school calendar, it becomes difficult for participants to proceed through grades or graduate as they turn over in and out of the prison. Indeed to date, no participant has been able to graduate from that program.

Finance. Program financing is integral to program sustainability and certain quality measures such as being able to attract and retain good teachers and provide necessary resources and equipment. The financing base of the six programs in this study is diverse. SEMED and public *Institutos Nocturnos* are supported largely through the SE. SAT, EDUCATODOS, and *Telebásica* all receive some SE funding as well as international funding. IHER receives SE funding but also depends on program income from participants to sustain itself, as do the private *Institutos Nocturnos* and SEMED. Three of the programs, IHER, SAT, and EDUCATODOS, also receive significant support from the local communities where they operate. International literature suggests that support from the government – both political and financial – is important to program sustainability, as is having a diverse funding base. Broad political and social support also is critical to sustainability. EDUCATODOS faces an impending challenge in that its USAID funding is due to expire in 2009.

While a certain level of cost-sharing by participants can increase buy-in and the legitimacy of a program, alternative programs that target the poor and extreme poor need to question the benefits of cost-sharing, namely the barriers private costs create for program enrollment and completion. One of the somewhat surprising results of our teacher interviews was that teachers in nearly all six programs were very concerned about the level of costs to students. Many reported that this was one aspect about the program they would change and others referred to costs as one of the main reasons behind program dropout rates. Many teachers suggested that textbooks be cost free to participating students or that grants be made available to the poorest students. The level of costs was also one of the lowest rated characteristics of the six programs among our youth survey. Costs were rated particularly poorly in EDUCATODOS and *Telebásica*. This does not necessarily indicate that costs are highest in these programs – indeed the survey does not suggest that this is the case – but might instead reflect the students’ socioeconomic level, at least in the case of EDUCATODOS.

Table 25 provides summary costing information for the six programs. In all cases, social costs were calculated using data obtained from the programs themselves, while private

costs (except for textbooks) were calculated from the national youth survey. Private costs are those costs incurred to students. Private direct costs are costs for the program itself, and include the costs of textbooks, enrollment and or monthly fees, other school materials, and school field trip costs. Private indirect costs are those costs incurred by students simply by being in the program. These include transportation costs to and from classes and the cost of food purchased while in class. Social costs include all those costs not incurred by the student. They include funding from the government, from national and international donors, or from the private sector used to develop, produce, and distribute materials, to pay and train teachers and facilitators, and to manage the program. Table 25 shows subtotals for these cost areas.

The direct costs of schooling to students are highest in SEMED, with students paying US\$220 per year for lower secondary and US\$340 for upper secondary. IHER, EDUCATODOS, and *Institutos Nocturnos* all have direct private costs of around US\$100, while SAT has the lowest direct costs charging only for textbooks and a small enrollment fee. Students of *Telebásica* benefit from having almost no direct private costs, given that both books and enrollment are free.

On the other hand, social costs – those incurred by program funders – are highest in *Telebásica* and SAT, at roughly US\$350 and US\$300 per student per year, respectively. SEMED and *Institutos Nocturnos* are roughly half that amount, at US\$140 and US\$200 per year, respectively, while we estimate that EDUCATODOS spends only about \$40 per student per year. By far the highest costs in all the programs except EDUCATODOS are teacher pay expenses. Volunteer facilitators in EDUCATODOS explain that program's low social costs. We were not able to obtain costing information from IHER but we expect that it is low because, like EDUCATODOS, it uses volunteers rather than paid teachers.

Summing up both the private direct and social costs of the five programs other than EDUCATODOS leads to a surprising finding: all the programs except for EDUCATODOS spend roughly the same amount per year per student -- US\$350. This is rather remarkable due to the vast diversity among the program characteristics, some being located in urban schools, others in rural community centers, some having salaried teachers, others receiving hourly pay, some having specialized curricula, and others using conventional curricula and textbooks. The combined private direct and social costs of EDUCATODOS are only US\$140, less than half that of the others, again largely because of having unpaid facilitators.

We separated out the private indirect costs of the programs because they skew the costing information somewhat in that some programs require students to travel daily to class while others meet only infrequently. Moreover, the figures we obtained for food purchasing highly skew our findings although they may be accurate. Summarizing the analysis, we found that private indirect costs range from less than US\$100 (IHER) to more than US\$400 (*Institutos Nocturnos*) largely because of food consumption. We are unclear if survey respondents might have misunderstood the question or if, in fact, food

consumption is a very high percentage of total program costs in certain programs (*Nocturnos*, *Telebásica*, and EDUCATODOS).

Structure and Organization. This study has shown that issues of program organization – such as the times and locations of classes – are of the utmost importance in terms of lowering the barriers to schooling for nontraditional participants. As we saw earlier, the need to work and work hours were the single largest obstacle for youth in terms of participating in an education program and in Table 26 and 27 above, the lowest rated characteristic of the alternative education programs in Honduras is the distance of the program from participants' and deserters' homes. Four of the programs we studied – SAT, EDUCATODOS, IHER, and *Telebasica* -- target rural youth by locating program sites in local rural settings. This type of organization accommodates rural participants and prevents the cost and time required to travel to urban centers. On the other hand, locating program sites in rural areas reduces potential access to highly qualified teachers, the ability to borrow or share existing infrastructure in other secondary schools, and the ability to create economies of scale by serving large groups of participants in a reasonable number of centers. SEMED and *Institutos Nocturnos* are both able to generate economies of scale, use existing infrastructure and resources, and employ qualified teachers but night schools serve very few rural students because the location and the daily classes combined make it nearly impossible for rural students to attend, and SEMED does serve rural students but has much higher transportation costs, also introducing greater security risks for students traveling from rural locations.

The six programs operate during a range of different hours. *Nocturnos* are at night, SAT in the afternoon, *Telebásica* in the morning, and SEMED over the weekend. Perhaps the best accommodation to students is demonstrated by EDUCATODOS and IHER, both of which allow individual program centers to choose their own hours – to meet a required number of hours – based on when participants and teachers can be present. Students and teachers communicated that this was a strength in these programs. *Telebásica* has the least convenient schedule for nontraditional participants as their morning classes do not allow for rural workers (who typically work in the morning) or full-time workers (although it should be noted that *Telebásica* does not attempt to target these populations). *Nocturnos* are much better organized to suit working youth but many participants, particularly young women, face security risks heading home after 9 p.m. (according to interviews with teachers and focus groups with participants).

Finally, the effectiveness of the program management structure is extremely important although there is not one best way to structure a program. The six programs display a broad range of management structures ranging from EDUCATODOS, which has strong central management, to IHER, which is highly decentralized, to night schools which have no independent management at all. The lack of separate management in the night schools emerged as a serious program challenge during our investigation. The lack of separate management has meant that night schools – while serving an entirely different population than day schools – have virtually no adaptations to suit the learning needs of the population. Instead, it appears that this program has degenerated into a second-class

system where tired teachers who have already taught one or two shifts earlier in the day have lower expectations of students.

The highly decentralized management of IHER also appears to have generated some management problems, specifically in the area of supervision and data collection. IHER staff receives no supervision or training and there is no information available on student flow or other such basics as enrollment figures or where program centers are located.

Curriculum. Several strengths and weaknesses were observed in the area of curriculum. First, several programs do not appear to have sufficient class time to cover the necessary material. Dropout rates in SEMED are extremely high and we heard from multiple stakeholders that this was largely because students lacked the skills necessary to undertake learning on their own without instructor support. In *Telebásica* we learned of the problem of frequent school closings which limit the amount of instructional time and leads teachers to skip video instruction. In night schools teachers are attempting to cover the exact same number of subjects and amount of material as they do during the day, but with less time and with lower performing students who are often coming to school after having worked all day. We suspect that in all cases these situations lead to decreased learning outcomes.

The quality and content of the curriculum also are critical. Teacher, student, and administrator impressions of the curricula of EDUCATODOS and SAT appeared to be favorable. These two programs have taken national guidelines and adapted them into integrated curricula that suit the context and needs of their target populations. EDUCATODOS, however, has yet to update its curriculum to align it with the new National Basic Curriculum (as has IHER). SEMED textbooks, too, received favorable reviews from stakeholders and we even heard that many traditional school students receive SEMED textbooks because they are preferred over their own. The content of the *Telebásica* curriculum is very rich but some problems remain regarding its alignment with the Honduran context given that much of the material comes from Mexico. In the case of IHER, which offers the academic *bachillerato* there is evidence that students do not have the same level of interest in an academic degree as in a technical one which they believe opens more doors for work and income (based on interviews with teachers and focus groups with students).

Instruction. The quality of instruction is, arguably, the most important aspect of any education program, particularly so if the students are academically weaker and face more significant disadvantages than traditional students. Instruction does not necessarily need to be face-to-face time with teachers but, as noted before, research shows that the amount of instruction time is the largest predictor of alternative and distance learning program success (World Bank, 2005). Several of the programs appear to have too little instructional time to meet the learning needs of participants. These programs assume that students will study and learn on their own and that the meetings with instructors are only to clarify doubts. Often, however, students lack the skills to learn independently. IHER, for example, has only five hours of instruction per week (one of which is by radio), and SEMED and EDUCATODOS have only have 10. On the other hand, *Telebásica*, with 30

hours of instruction per week, is probably not well suited to a working population. Clearly a balance needs to be struck between fewer hours which lower the costs of programs and allow working youth to participate, and more hours, which provide sufficient instructional time for participants to learn.

The same balance needs to be struck between having lower qualified teachers, which again lower the costs of programs, and more qualified teachers, which support improved learning. We argue that the sophistication of material that needs to be learned at the upper secondary level requires teachers with a teaching degree or another university degree as well as sufficient training. Programs like EDUCATODOS and IHER, which use volunteers without higher education degrees, severely restrict the ability of students to turn to their instructors for support, clarification, and instruction (based on interviews with program staff and teachers of both programs). Several teachers in EDUCATODOS, for example, shared that there were difficulties with math because teachers did not have sufficient knowledge of the subject area and students needed more support than the tape and textbook. SAT, SEMED, *Telebásica* and night schools all use fully qualified teachers. SAT, however, uses the same teacher as the primary learning resource for all subject areas. This can be problematic given the sophistication and depth of upper secondary education content. We observed as well as heard from teachers and administrators that teachers do not always feel prepared or able to teach unfamiliar subject areas.

Using cassettes (in the case of EDUCATODOS), radio (IHER), or textbooks (SEMED) as the primary learning resource does not appear to be successful. As described earlier, our survey found that the majority of youth surveyed believed that in an alternative secondary education program they would learn best through a teacher. In the case of EDUCATODOS, a facilitator we interviewed told us that it is very difficult for students to follow long tape segments on their own, and that the tape segments are not always aligned with their textbooks. In SEMED, teachers reported that students often do not do the independent learning during the week and turn to teachers for instruction despite the fact that teachers are there to clarify rather than teach the material. In the end, teachers do not have sufficient time to cover all the material and students are not learning on their own. Finally, in IHER we also heard from teachers that students often lack the discipline and other skills necessary to study and learn on their own. When alternative learning resources are used as complements to, rather than supplements of, teachers, such as is the case with videos in *Telebásica*, the learning results appear to be more successful.

In alternative programs, teachers also need to be prepared to use the adaptive methodologies and resources specific to their program and to meet appropriately the specific needs of their students. In general, teachers and program officials were happy with the training opportunities in SAT and *Telebásica*. In other programs -- SEMED, night schools, and IHER -- instructors are not receiving any specialized training support and are suffering for it. Teachers in EDUCATODOS also reported that they lacked sufficient in-service training.

The employment conditions of teachers in these programs also emerged as important in our investigation. Using volunteers runs the risk of lowering the quality and sustainability of instruction (EDUCATODOS, IHER). In one interview an IHER animator discussed how the lack of incentives was a severe limitation on the quality of instructors in the program. On the other hand, having fully salaried teachers with no accountability also can have a negative impact (*Telebásica*, night schools). In *Telebásica*, for instance, some teachers do not attend special trainings because they feel no need since their job and salary are secure. In night schools there is indication that teachers have lower standards and less commitment to their classes in part because they are not held accountable to the teaching or learning in their classrooms. SEMED and SAT appear to have more successful policies in this regard. Both programs hire and pay qualified teachers but do so on a temporary basis, allowing for the evaluation of teachers and increasing teacher accountability. In both cases teachers also compete for these positions, and program officials (SAT) or school officials (SEMED) are able to select the teachers they think best.

V. Recommendations for a Large-Scale Upper Secondary Alternative Education Program

We now have a fairly detailed understanding of the context for alternative secondary education in Honduras. Section II of this study presented a synthesized account of the larger context of secondary education in Honduras, including the current reform agenda and Education for All (EFA) and Poverty Reduction Strategy (PRS) goals. The second section presented findings from our national survey of an alternative program target population and focus groups with in-school and out-of-school youth. That section found that there is a huge demand for an accessible alternative for upper secondary education and detailed the specific needs, obstacles, and interests of different groups of youth who would benefit from such a program. The third section, then, described and evaluated the strengths and weaknesses of the alternative secondary education programs that currently exist in Honduras.

This final analytic section of our study will bring the previous three sections together, presenting a series of recommendations for characteristics of a promising large-scale alternative upper secondary program. Rather than design a new program or programs, however, it is likely to be more politically appropriate and fiscally sound to scale-up and adapt one or more of Honduras' existing programs. Our methodology, therefore, was to lay out our recommendations based on our findings from sections II, III, and IV in a matrix and then compare them to the characteristics of the existing programs. Using a point system we were able to identify which of the existing programs are most suited to our recommended criteria for the current demands and obstacles for an alternative upper secondary program. We identified SAT and EDUCATODOS as the best-suited programs. Using our same recommended criteria we then propose adaptations to these two programs to better suit the needs we have identified, and analyze the start-up and recurrent per student costs of adapting and scaling up these programs.

Our recommendations are organized into the same six areas: policies, finance, structure and organization, curriculum, instruction, and efficiency. Table 28 through Table 33 display our recommendations and the allocation of points for each of the existing programs.

Before turning to specific recommendations regarding characteristics of a future program, however, our research brought to light a few general recommendations for alternative secondary education in Honduras.

First, **alternative secondary education programs lack sufficient political consensus, prioritization, and support.** To date, alternative secondary education programs in Honduras have been relegated to the backburner of educational efforts, with the programs that do exist often introduced by NGOs or international donors. But our research shows that alternative secondary education is one of the only viable educational options for a huge proportion of Honduras' out-of-school youth -- 63 percent of the 16-22 year-old population in Honduras is currently out of school.

Why? Our research suggests that many of these individuals who aspire to continue their education cannot because they cannot access traditional schools. Forty-seven percent of the Honduran population is rural, 60 percent live below the poverty line, and a full 46 percent of 16-22 year-olds work (INE, 2006). With PRS and EFA goals of 70 percent lower secondary net enrollment and 50 percent upper secondary completion by 2015, Honduras has little choice but to prioritize educational programs that are accessible to these large segments of society (Government of Honduras, 2001).

Still only 1.7% of education funding currently goes to alternative education programming at any level, despite the fact that an estimated 57,000 youth are currently enrolled in upper secondary alternative education alone (Government of Honduras, 2005). A 2005 World Bank comparative study of education in the Central American countries found that Honduras spends more on central administration than it does on its entire secondary education system (2005a).

Alternative secondary education programs do exist in Honduras but they are disjointed, under-funded, and generally perceived to be of inferior quality to that of Honduras' problematic traditional school system.

There are no unifying policies for alternative secondary education nor for secondary education generally. Current secondary education reform efforts are continuing to marginalize and ignore the critical importance of alternative delivery.

Alternative secondary education should be prioritized by the SE as a necessary means to achieve national and international goals. As part of this prioritization it should be given greater budgetary support and be brought into the fold of current reform efforts. A policy basis will strengthen the coherence, credibility, and sustainability of alternative programs (UNESCO, 2001). Finally, the SE should develop coherent policies for the current plethora of alternative programs. It is good that all the current programs are recognized

by the SE and graduates are given the same certification as graduates of traditional programs, but the government should go further to prioritize alternative modalities at the upper secondary level.

Second, we recommend that the Secretariat of Education or another body **develop a general technical curriculum for the upper secondary level that can be used in any and all alternative programs** as well as in traditional programs. Consultations with the private sector confirm that employers want upper secondary graduates with broad and general skills, including those of oral and written communication, basic math and measurement skills, and work ethics and practices (CITE). Our national survey and field research strongly demonstrate that the primary hope of the target population for an alternative secondary education program is to open employment opportunities and increase their incomes. It is clear from these two findings that a general technical education curriculum is necessary for alternative upper secondary education. Yet Honduras in the past has turned to create a hodge-podge of different technical secondary tracks, disjointed and disarticulated from each other and from the private sector (CITE). We recommend that one curriculum be designed (or adapted from one already existing) that can meet the basic needs of any alternative program. This curriculum should meet national standards and the National Basic Curriculum guidelines, it should offer general technical skills such as those highlighted in civil society and private sector consultations, and it should follow the format of the current upper secondary curricular reform of one foundational year followed by two years of more applied and technical skills. Finally, the curriculum should be designed with alternative education programs in mind, teaching the skills necessary to learn independently, grounded in a context and content relevant to non-traditional students, and organized in such a way as to require fewer hours of classroom instruction and not rely on expensive, difficult-to-access resources.

Rather than being seen as obstacles, many of the characteristics that differentiate alternative programs from traditional ones can be used as strengths. Alternative secondary students are generally older and more mature and can apply what they are learning to their life experiences. With the lower number of instructional hours in most alternative programs, partnerships can be cultivated with local industry and businesses for internships. (Ideally, these internships should be paid, as most alternative education students need to earn an income.)

Third, we recommend that **the primary learning resource in an alternative upper secondary education program in Honduras be a qualified professional teacher**. Alternative delivery programs around the world have successfully created programs that rely relatively little on teachers – radio-based education for nomadic youth in Mongolia for instance, or print-based correspondence education in Korea and India – but evidence is growing that teachers are difficult to replace in most learning programs (Figueredo and Anzalone, 2003). Evidence shows that students overwhelmingly prefer face-to-face contact with teachers over the lack of it (Guri-Rosenblit, 2005), that programs have better learning and efficiency outcomes when they have more instructional time (Zhao, 2005), and that non-teacher learning resources frequently are difficult to maintain in sufficient

quantities and good working condition in the hard-to-reach areas of developing countries (UNESCO, 2001; World Bank, 2005c).

These international findings support our fieldwork in Honduras where we found, in the youth survey, that students feel they would learn best with a teacher, and that technology-based programs often forgo the technology because of lack of equipment, scheduling difficulties, or non- or poorly functioning equipment and resources (EDUCATODOS, *Telebásica*, and IHER).

Using teachers as the primary instructional resource will increase costs but we believe that it will produce better results. One of the identifying characteristics of alternative secondary programs, as defined in this paper, is providing education at affordable or lower unit costs. In Honduras, a very poor country, this will inevitably be one of the attractions of alternative education. Nonetheless, as argued in *Meeting the Challenges of Secondary Education in Latin America and East Asia: Improving Efficiency and Resource Mobilization* (World Bank, 2006), alternative education programs can save money by being input-efficient, or by being output-efficient. The quality of input-efficient programs is that they get the same results with fewer initial resources. The quality of output efficient programs is that they get better results for the same initial inputs. Both of these are cost saving measures. We urge the Government of Honduras and donors to consider both as options in the development of alternative secondary education programs. Along the same line of reasoning, a program that invests \$1000 but only graduates five people is actually more expensive than a program that invests \$2000 but graduates 30. We believe that a quality program led by teachers will have better outcomes and thus be more cost-efficient than one that attempts to bypass the use of teachers.

Finally, it may be most appropriate for Honduras to maintain two, rather than one, primary alternative upper secondary education programs. In this study we have proposed one large-scale program which could function in both rural and urban areas. Another possibility, however, is to establish one main program in rural areas and another in urban areas. If this option is selected, however, it is critical that both programs offer equivalent quality education to avoid the perception that one offers a better education over the other.

Policies

Table 28 summarizes our policy recommendations for an alternative upper secondary education program and scores the six existing programs on a scale of 0-2. Zero, on the scale, means there is virtually no alignment with the recommendation; one means there is partial alignment; and two means that the program fully or nearly fully meets the recommendation.

Table 28: Policy Recommendations

Indicator	Recommendations	Source	EDUCA- TODOS	SEMED	SAT	TELE- BASICA	IHER	NOCT- URNOS
1. Target population	The program should target the poor and extreme poor; youth ages 16-22 and adults.	National household survey (May 2006). PRSP.	2	1	2	1	2	1
2. Regional coverage	Wide national coverage of both rural areas where there frequently are no secondary schools and marginal-urban and urban areas where working and poor youth cannot access traditional schools.	Youth survey. Focus groups. National household survey (May 2006). Hernández y Chavez, 2004. Hernández y Alas, 2005.	2	0	1	1	2	0
3. Management	3.1 Strong vertical management structure which permits supervision, accountability, and information flow. 3.2 Local participation including community involvement in rural areas and local partners in more urban areas. 3.3 Program recognition, collaboration, and support from Secretariat of Education	Interviews with program directors, teachers, and SE officials.	3.1.	3.1.	3.1.	3.1.	3.1.	3.1.
			2	1	1	2	0	0
			3.2.	3.2.	3.2.	3.2.	3.2.	3.2.
			2	0	2	0	2	0
			3.3	3.3	3.3	3.3	3.3	3.3
			1	1	1	1	1	1
Program total			9	3	7	5	7	2
Total possible			10	10	10	10	10	10

The first recommendation deals with target population. Based on development priorities and the current socioeconomic context in Honduras, an alternative upper secondary education program needs to target the extreme poor and the poor. An alternative upper secondary education program should be accessible to any person who has completed lower secondary education; therefore, we set the age target to 16 on the low end, the age when youth are scheduled to complete lower secondary. An alternative program can be open to participants of all ages and due to low average educational attainment in Honduras, some adults may wish to go back to study upper secondary in an alternative program. In our fieldwork we met many program participants in their 40s and 50s. We suggest that a program be open to adults of any age but that the program particularly target the secondary-age population of youth in their teens and twenties to help Honduras meet its EFA and PRS goals and to build the alternative program as a viable continuation of traditional studies. Students should feel comfortable switching from a traditional (or alternative) lower secondary program directly into the upper secondary alternative program.

All of the six programs we investigated fit this criterion at least partially. EDUCATODOS, SAT, and IHER all received a value of 2 because their programs target the very poor of all ages. *Telebásica* received only one point because its participants are rural, most of whom are poor, but its daytime schedule prevents many of the poorest from attending because of work. Furthermore, *Telebásica* is designed for age-appropriate students rather than over-age students. We gave a value of 1 to SEMED and *Nocturnos* as well because of their high private costs which bar many of the very poor.

As far as regional coverage, it is clear from existing research on education in Honduras as well as from our youth survey and national statistical data that there are serious access constraints to upper secondary schooling in rural areas. It also is clear, however, that working youth in urban and marginal-urban areas also cannot access traditional secondary schools easily. Thus, we recommend that a large-scale alternative education program have wide geographical coverage focusing on those areas where access is constrained. EDUCATODOS and IHER received full points for this criterion because they focus on access in hard-to-reach rural and marginal-urban areas. SAT also targets hard-to-reach areas but it is only located in one-third of Honduras' departments.

Finally, we have included some broad management recommendations in the policy area. The first of these recommendations is that there be a strong vertical management structure that supports quality supervision, data collection and management, and accountability for local program sites. Capable central management is important to ensure quality and equity in a program (UNESCO, 2001). Central management can ensure that teachers and facilitators receive sufficient and appropriate training, that all centers have necessary resources, and that the program is functioning appropriately with positive outcomes.

We found there to be a wide dispersion of management capacity among the six programs. EDUCATODOS and *Telebásica* both have reasonably strong central management with supervision and data collection capacity. Both have room for improvement but compared

favorably to SAT and SEMED where central management structures exist but lack critical capacities such as data collection and management. IHER and *Nocturnos* are far from meeting this criterion -- IHER has a central office but with very limited jurisdiction over a highly decentralized management system, and *Nocturnos* have no separate management.

While capable central management is important, so too is local participation and decision-making authority. A second management policy we recommend is that programs foster local participation, either within the local community as often occurs in rural areas, or by involving local stakeholders, businesses, and partners in more urban areas. Either way, a program should be valued and supported by the community where it exists. The program should function as an integral part of the community, providing services and developing the human capacity of the surrounding community. This was a very clear recommendation in our interviews with program directors and local coordinators and echoes a large body of decentralization research.

Finally, we recommend that the program have some level of a formal relationship with the Secretariat of Education. Such a relationship would help to ensure the sustainability of the program and give the program credibility in the eyes of participants, community members, and employers. We rated all the programs a 1 on this criterion because while all of the programs do have a formal relationship with the SE, we think that the SE could play a more meaningful role in them, such as monitoring and evaluating the quality of the programs.

In sum, we established five recommendations for the policy and general management area. EDUCATODOS is the program that best fits these criteria, satisfying 90 percent of our recommendations. This makes sense as EDUCATODOS serves a highly nontraditional population, has wide access throughout the country and in many different kinds of locations, and has a strong central administration that supports EDUCATODOS daily operations. SAT and IHER both satisfied 70 percent of our recommendations, while SEMED, *Telebásica*, and *Institutos Nocturnos* satisfied 50 percent or less.

Table 29: Organizational Recommendations

	Recommendations	Source	EDUCA-TODOS	SEMED	SAT	TELE-BASICA	IHER	Nocturno
1. Schedule	Flexible schedule based on local participants' needs. Probable schedules include afternoon or evening hours Monday through Friday or weekend hours.	Youth survey. Focus groups with program participants. Interviews with teachers.	2	1	1	0	2	1
3. Location	Location should be accessible, ideally near to where participants live, or alternatively, accessible by safe and affordable transportation.	Youth survey. Focus groups with program participants. Interviews with teachers.	2	0	2	1	2	0
4. Infrastructure	Infrastructure needs resources necessary to operate an upper secondary education program (most likely a secondary or primary school)	Classroom observations.	1	2	1	1	0	2
5. Face-to-face instructional hours	15 hours per week approximately. Weekly hours needs to balance competing responsibilities of participants with teaching and learning needs for the upper secondary level.	Interviews with program directors. Comparison with international alternative secondary education models.	2	2	2	1	0	2
Program Total			7	5	6	3	4	5
Total Possible			8	8	8	8	8	8

Organization

Establishing appropriate organizational arrangements is key to making an alternative program accessible to its target population (Figueredo and Anzalone, 2003). This emerged clearly in discussions with stakeholders and in the youth survey.

Our first organizational arrangement recommendation is that each program site select its hours of operation based on the needs of its participants. In the case of a small community-based program, the group of 15 or 30 students could decide on weekly hours such as occurs in EDUCATODOS and IHER. In the case of a larger program center, the local center administrators or instructors could select a schedule based on their knowledge of their population's needs. Alternatively, if this flexibility is not possible, the most appropriate schedules reported in the youth survey were Monday through Friday evening hours or weekend hours. In scoring the programs we gave 2 points each to programs with flexible schedules, and 1 point each to programs with fixed schedules but that operated on schedules that fit out survey results.

Location was another clear factor affecting accessibility in our youth survey. Our recommendation based on these findings is that a program ideally should be located within the community it is serving or, if impossible, in a location where safe and affordable transportation is available for students coming from other communities. We gave SEMED and *Nocturnos* zeros on this particular criteria because private costs of transportation were very high for both programs and many students and deserters expressed safety concerns about traveling at night (daily for *Nocturnos* and on Saturdays for SEMED).

While the local community-operated programs are more accessible, they also are more likely to lack adequate infrastructure. An upper secondary education program, particularly one geared toward technical education, ideally should benefit from labs, land, or other infrastructure relevant to the program curricula. Many students and teachers complained that their infrastructure was lacking, either in ability to cover the curriculum or in basic needs such as sufficient light (especially for night programs), space, desks, and full walls to block noise and rain. For this criterion we gave *Nocturnos* and SEMED full points because they operate in secondary institutes which typically have electricity, water, libraries, and laboratories. We found through field visits and interviews with stakeholders, however, that even infrastructure in secondary institutes is often lacking. SAT, EDUCATODOS, and *Telebásica* often operate in schools, but these are primary schools or *Centros Básicos* which offer basic infrastructure but not necessarily that required of an upper secondary program.

Finally we recommend that an alternative upper secondary education program should involve approximately 15 hours of face-to-face contact with an instructor per week. Fifteen hours is well below that of traditional schools which typically provide 30 hours per week, but is also more than many of the programs, including IHER, SEMED, and EDUCATODOS. We set the goal at 15 hours because it is condensed enough to allow participants to work and classes to be held only in the evenings or over weekends, but it

is sufficient enough, hopefully, to cover the depth and breadth of a quality upper secondary education curriculum. To determine a more precise figure it would be necessary to look at the standards and guidelines that need to be mastered at the upper secondary level, a task not within the purview of this study. We gave those programs who have between 10 and 20 instructional hours per week full points on this criterion; we gave *Telebásica* only 1 point because, as a full-time program, it does not condense instructional time for nontraditional learners, and we rated IHER zero points because, with only four instructor hours and one radio hour per week, it is unlikely that it can cover a quality upper secondary education curriculum.

The current six programs fit our four organizational recommendations to very different extents, ranging from only 38 percent concordance with recommendations in *Telebásica* to 88 percent concordance in EDUCATODOS. *Telebásica*, of all the programs, is the least organizationally suited to meet the current need for a large-scale alternative upper secondary program. It is not designed to serve or meet the needs of a nontraditional population who cannot attend school the same weekly number of hours or during the same time of day because of competing responsibilities. EDUCATODOS and SAT are the best suited programs in this area with accessible locations and nontraditional and condensed hours.

Table 30: Curriculum Recommendations

Indicator	Recommendations	Source	EDUCA- TODOS	SEMED	SAT	TELE- BASICA	IHER	NOCT- URNO
1. Curricular orientation	Teaches practical skills and competencies that facilitate entrance to and success in the labor market and higher education.	Focus groups with students and out-of-school youth. Youth survey.	1	1	2	1	1	1
2. Graduate certification	Upper secondary school diploma validated and approved by the Secretariat of Education.	Focus groups with students and out-of-school youth. Interviews with program coordinators.	2	2	2	2	2	2
3. Subject material organization	Organized to be relevant and interesting to participants, preferably using integrated thematic areas.	Interviews with program directors.	2	0	2	1	0	0
4. Curricular adaptation	Adapted to the lives, context, needs, and interests of participants.	Interviews with program directors. Focus groups with students.	2	0	2	0	0	0
5. Relationship to national standards and curriculum	Aligned with official curricular areas of National Basic Curriculum and upper secondary education standards (should they be developed).	National Basic Curriculum design (Government of Honduras).	0	2	2	1	2	2
Program total			7	5	10	5	5	5
Total possible			10	10	10	10	10	10

Curricular Recommendations

We already have presented one broad curricular recommendation: development of a general technical upper secondary education curriculum for alternative programs. The development of this general technical curriculum would meet the labor needs of the private sector, thereby meeting the demands of participants that they graduate with better employment and income opportunities, while not falling into Honduras' pattern of multiple, highly specialized upper secondary tracks. As stated in Table 30, we recommend a curricular orientation that teaches practical skills and competencies which facilitate entrance into the labor market and access to higher education.

None of the programs meet this criterion exactly, but SAT comes the closest, offering one general technical curriculum that focuses on important technical skills of rural and community development well-suited for the population it serves and suitable, as well, for entrance into higher education. *Telebásica* and EDUCATODOS have well-received curricula but neither has any curriculum for the upper secondary level and both need to be better aligned with national curricular guidelines. *Nocturnos*, by contrast, offer scores of different curricula, while SEMED offers only one but it is highly specialized (business administration) and not up-to-date.

As a second curricular recommendation we echo the thoughts of nearly all the international research on alternative secondary education -- that, to be a viable option accepted by target participants and meeting the goals of supporting nontraditional students to have more productive and better lives, the program must offer nationally recognized certification of graduates equivalent to that of a traditional program (World Bank 2005a, 2005c; Figueredo and Anzalone, 2003; UNESCO, 2001). Some programs, such as adult literacy and numeracy programs, do not require equivalent official certification because they are nonformal programs not geared at offering viable alternatives to traditional schooling. Honduras, however, urgently needs a viable alternative to traditional upper secondary -- a program that offers quality education equivalent to traditional upper secondary schools and is legitimate and valuable to participants and the population at large. This requires equivalent certification. The Secretariat of Education is very clear about this important point and all six of the programs we investigated earn official upper secondary education certification.

We recommend that curricular content be organized in a way that is relevant and accessible to students, either through the use of integrated curricular areas, applied learning, or some other means. Rural, working, and over-age youth in Honduras face significant barriers to learning, and providing an engaging, meaningful curriculum is critical to maintaining their motivation to study. As we saw in the youth survey, one of the main motivations for students is not simply future benefits, but the present possibility of learning new things., SAT exemplifies an integrated curriculum organized around applied learning. SEMED, by contrast, teaches and assesses students on 36 distinct classes and three modules over the course of three years of weekends. We learned from SEMED students and teachers alike that this hectic and disparate curricular organization

leads to significant student discouragement and academic struggle, and may be a reason behind dropout.

Related to this, we recommend that the curriculum also be adapted to the context of the programs' participants. Alternative program participants are different from those in conventional schools and what they learn should be relevant to their lives, communities, cultures, and backgrounds. One surprise in the youth survey was the strong valuation of curricula that support personal growth and community development. To date, however, only SAT and EDUCATODOS of the six alternative program curricula are adapted to student's lives.

Finally, it is critical that curricula be aligned with national standards and guidelines for upper secondary. In recent years there has been a great effort in Honduras to specify curricular standards and guidelines. As discussed earlier, the Secretariat of Education has developed a National Basic Curriculum which, to date, presents only broad guidelines for the upper secondary level. Building upon this, however, the secondary education curricular reform has developed a proposal and curriculum for a first foundational year in all upper secondary education programs. USAID's MIDEH Project, in collaboration with the Secretariat of Education, has developed standards for grades 1-9 and also may develop upper secondary education standards aligned with the DCNB guidelines. We urge that the curriculum used in an alternative upper secondary education program be aligned with the Secretariat's standards, guidelines, and requirements of upper secondary education content. Aside from EDUCATODOS, which is currently going through this process of alignment, all of the other programs are reasonably well aligned, with the partial exception of *Telebásica* which confronts the challenges of having to modify and complement the Mexican textbooks and videos.

In sum, we developed five curricular recommendations. SAT meets all five of those criteria, EDUCATODOS meets 70 percent of them, while the other four programs only meet 50 percent of them. The primary weaknesses of IHER, *Nocturnos*, SEMED, and *Telebásica* lie in the organization and adaptation of content in a relevant, meaningful way for nontraditional students.

Table 31: Instruction Recommendations

Indicator	RECOMMENDATIONS	SOURCE	EDUCA- TODOS	SEMED	SAT	TELE- BASICA	IHER	NOCT- URNOS	
1. Teachers	1.1 Teachers should be contract staff who receive economic remuneration either in the form of salaries or hourly pay or incentives. 1.2 The program itself, either at the central, regional, or local level, should select teachers and conduct periodic evaluations. 1.3 Teachers should receive regular in-service training and supervision specifically in program content areas and methods. 1.4 Teachers should be qualified teachers or have university degrees.	Classroom observations. Interviews with teachers and program directors. Marshall, e.t al. (2005). World Bank (2005).	1.1.	1.1.	1.1.	1.1.	1.1.	1.1.	
			0	2	2	2	0	2	
			1.2.	1.2.	1.2.	1.2.	1.2.	1.2.	
			1	2	1	0	0	0	
			1.3.	1.3.	1.3.	1.3.	1.3.	1.3.	
1	0	2	2	1	0				
			1.4.	1.4.	1.4.	1.4.	1.4.	1.4.	
			0	2	1	2	0	2	
2. Method- ology	Active methodology led by teachers who gradually teach and incorporate self-instruction. Applied learning through projects and internships.	Interviews with teachers. Focus groups with students. Youth survey.		0	1	1	1	1	1
3. Learning resources	Textbooks should be the primary learning material, designed specifically for the program, aligned with program content and standards, and in support of quality self-instruction. Other supplementary materials such as video, CD, or cassettes can be used to complement the teacher and textbook instruction.	Interviews with teachers and program directors. Focus groups with students.	1	2	2	1	1	1	
Program total			3	9	9	8	3	6	
Total possible			12	12	12	12	12	12	

Instructional Recommendations

The next area of recommendations deals with instruction. We have divided this category into three sections -- teachers, methodology, and learning resources. We already have argued for the use of teachers in our general recommendations; here we specify the details of their role.

First, we recommend that teachers receive remuneration for their work. While EDUCATODOS and IHER have had some degree of success using volunteer facilitators, finding many extremely dedicated and talented community leaders, retired teachers, and the like, both programs also have encountered challenges with their facilitators (Marshall, et. al., 2005; Spaulding, 2002; Van Steenwyk, 1999). Van Steenwyk (1999) found that EDUCATODOS programs with high student retention were associated strongly and positively with the degree of work of the facilitators, and Marshall, et. al. (2005) found that facilitator desertion was strongly associated with whether or not they received remuneration.

Like Marshall et. al. (2005) our field work and review of the international literature indicate that remunerating teachers will increase teacher motivation and professionalism, and attract and retain better qualified individuals. There are many ways to remunerate teachers. One way we propose is akin to that used currently in the SEMED program. Active teachers are selected locally to teach SEMED during the weekends. They are hired as contract teachers on a yearly basis allowing for their period evaluation and removal if they do not perform well, and they are paid on an hourly basis for their work. SEMED teachers are not salaried for their work with SEMED and do not receive the annual two months bonus pay. They also are required to continue working even if teachers in the traditional system are on strike. This system pays teachers, giving them incentive to remain in their positions, holds them accountable by hiring them on a temporary basis subject to evaluation, and avoids the problem of lost instructional time during teacher strikes.

Second, also as in the SEMED system as well as EDUCATODOS and SAT, we recommend that teachers be selected either locally or through program administration, rather than nationally assigned. This allows for improved selection of the appropriate qualities and skills necessary to succeed as program instructors. Related to this we recommend that program teachers undergo periodic evaluation both for their own professional improvement and so that ineffective teachers can be removed. To date, none of the six programs have periodic instructor evaluation.

Third, we recommend that teachers receive regular in-service professional development, specifically in the areas of program content, methods, and use of resources, and they should have access to regular supervision and support from program coordinators, pedagogical guides, or the like. In our fieldwork we found that alternative education program instructors often feel abandoned and on their own. In many of the programs they receive no training or supervision, while in others it is only minimal. SAT provides the

most training and supervision, allotting one coordinator per 10 instructors and mandating six weeks of training per instructor per year.

Our last recommendation regarding teachers is that they, indeed, be teachers. Alternative upper secondary program teachers should be qualified teachers, having graduated from the National Pedagogical University. At the very least they should be university graduates in a relevant field and receiving teacher preparation. The SAT program demonstrates that when positions are paid and training is provided there are more than enough applicants even for very rural locations. Whenever possible it is ideal for teachers to come from the communities in which they teach, but because this is the upper secondary level where the content is often sophisticated and difficult, we recommend having qualified teachers over local instructors.

While we have emphasized the importance of using teachers as the primary learning resource, an alternative upper secondary education model in Honduras should not rely on strictly traditional teaching methods. The need to condense learning to fewer hours requires that students be more responsible for their own learning than in traditional systems where the teacher can guide them through every subject. At the same time, our discussions with teachers and focus groups with students indicated that alternative education students frequently do not, at least initially, have the skills and behaviors necessary for self-instruction (this also is found in international research such as Figueredo and Anzalone, 2003). We recommend, therefore, that the content and teaching methodology be structured such that students gradually acquire the skills of self-instruction and that as they progress through the program their learning is more and more self-directed with the teacher serving a facilitator role, clarifying doubts, guiding students, and assessing learning.

Currently, this is not occurring in any of the programs. Certain programs, such as SAT, EDUCATODOS, and *Telebásica*, use very little self-instruction. The others – *Institutos Nocturnos*, SEMED, and IHER – are highly self-instructional but do not teach self-instruction skills in a gradual way, rather they are assumed from the onset of the program.

Finally, we recommend that textbooks be the primary material used in an alternative upper secondary education program and that texts be supplemented with more interactive technologies when possible. As mentioned above, the programs that ostensibly rely on more advanced technologies – radio, television, and cassette – have confronted problems of scheduling, equipment failure or absence, and damaged or missing learning materials. Internationally, some programs have been able to use more advanced technologies extremely successfully, but this is usually in developed countries in programs operating in resource-rich areas and operated by affluent organizations. As Guri-Rosenblit (2005) of the Open University of Israel, a distance education university, argues, programs and areas that are in most need of distance education technologies are often the least well-positioned to use them because of lack of infrastructure, access, and financial and human resources. In our youth survey, youth clearly favored textbooks as the primary learning material, even those students in programs who use other technologies. SEMED and SAT both currently employ well-designed textbooks as their primary learning material.

In sum, we have put forward six instructional recommendations. SAT and SEMED meet those criteria best, both complying with 75 percent of the recommendations. EDUCATODOS and IHER are least aligned with our recommendations, both only complying with 25 percent of the recommendations.

Table 32: Finance Recommendations

	RECOMENDACIONES	FUENTE	EDUCA- TODOS	SEMED	SAT	TELE- BASICA	IHER	NOCT- URNOS
1. Private costs	1.1 Low or free private direct costs for learning resources (textbooks and other materials. 1.2 No enrollment fee. 1.3 Accessible transportation costs.	Youth survey	1.1.	1.1.	1.1.	1.1.	1.1.	1.1.
			1	0	0	2	1	0
			1.2.	1.2.	1.2.	1.2.	1.2.	1.2.
			1	2	2	2	1	2
			2.1.	2.1.	2.1.	2.1.	2.1.	
			1	1	2	2	1	0
2. Social costs	2.1 The Government of Honduras assumes greater commitment to and financial and political support for alternative upper secondary education. 2.2 Sufficient funding to provide necessary learning and infrastructure resources.	Interviews with program directors. FONAC, 2000 (Propuesta para la Transformación Educativa en Honduras).	2.1.	2.1.	2.1.	2.1.	2.1.	2.1.
			1	1	1	1	0	1
			2.2.	2.2.	2.2.	2.2.	2.2.	2.2.
			2	1	2	1	2	1
3. Funding sources	Diverse funding sources (public and private) to ensure sustainability.	Interviews with program directors.	1	1	2	1	2	1
Program total			7	6	10	9	8	5
Total possible			14	14	14	14	14	14

Finance Recommendations

The final area of recommendations is finance-related and presented in Table 32. The first issue relates to the appropriate levels of private costs incurred by participants; our recommendations are the result of the youth survey and the international literature. The second and third issues relate to social costs and financing sources and these recommendations emerge from the international literature as well our interviews with the alternative education program directors.

One of the primary reasons a large-scale alternative upper secondary education program is necessary in Honduras is because of the economic constraints on the secondary school-age population. Thus, creating a program with inaccessible private costs defeats the original purpose of the program. At the same time, the Government of Honduras has significantly increased its investment in education while its resources are limited severely by the economic situation in the country. A World Bank comparative study of Central American education systems identified a potential to divert administrative funds, which are very high in Honduras, into the secondary education sector (2005). The ideal scenario is one where alternative upper secondary education students do not have to pay at all but this may not be possible, at least initially, and the private high rate of return at the upper secondary level gives potential students a motivation to invest in their education at this level.

We recommend that private direct costs be kept minimal, perhaps with students paying for textbooks – but limiting the number of textbooks required – and continuing with the government’s current policy of enrollment and monthly fee abolishment. The indirect private costs of schooling are more difficult to control, but we already have recommended that programs be located within the communities in which they operate whenever possible and that, if impossible, they operate in areas where there is safe and affordable transportation. As we saw in the costing analysis above, private direct costs among the six programs are by far the highest in SEMED due to textbook costs, while they are extremely minimal in *Telebásica* where textbooks are free and there is no enrollment or monthly fees.

In terms of social costs we recommended above that the Government of Honduras assume greater responsibility for and prioritization of alternative upper secondary programs as a necessary means to achieving national development goals. To date, state financing is lacking in all six programs. SEMED and *Nocturnos* are almost exclusively state-financed, but both are sorely lacking resources. Meanwhile, other programs such as IHER receive very little in state support. We recommend that the state increase funding to these programs as part of their PRS and EFA goals of increasing access to and completion of secondary education.

We also recommend that the program administration ensure that program sites have sufficient resources and that those resources are in usable condition. This appears to be a problem in all of the programs to varying degrees.

Finally, it is important that a large-scale alternative upper secondary program be fiscally sustainable. One proven method of fiscal sustainability is the combination of political will and support and diverse funding sources. Currently, *Telebásica*, SAT, EDUCATODOS, and IHER all have reasonably diverse funding sources. Nonetheless, *Telebásica* is still a very small pilot program and EDUCATODOS faces the challenge of losing its USAID funding in 2008.

Overall, *Telebásica* and SAT have the closest fit with our six finance recommendations. *Nocturnos* and SEMED are in the weakest shape financially, meeting 50 percent or fewer of our recommendations.

Selecting and Adapting Existing Programs

The previous section provided a detailed account of a series of recommendations for a large-scale alternative upper secondary education program in Honduras that would meet the current demands and obviate as many constraints to schooling as possible. The six existing programs fit these recommendations to differing degrees and in different ways. A program might be very strong in one of our organizational areas (policy, organization, curriculum, instruction, and finance) while being very weak in another.

Table 33 summarizes the percent of compliance with our recommendations for each program in each area. It then shows the total points earned out of the total possible, gives a simple percent compliance and then a weighted percent compliance. The weighted percent compliance is the total percent compliance we used because it weights each of the organizational areas equally rather than based on the number of recommendations we created for each area. SAT has the highest overall percent compliance, at 79 percent. EDUCATODOS is a somewhat distant second with 66 percent. The remaining four programs, *Telebásica*, SEMED, IHER, and *Nocturnos*, reach only between 56 and 45 percent compliance with our recommendations.

This does not at all mean that the other four programs are bad or should be ended. Rather, it means that SAT and EDUCATODOS are the best suited programs to meet the current need for a large-scale alternative upper secondary program in Honduras. The remaining programs might fill more specific needs. *Nocturnos*, for instance, are directed particularly at working and overage urban students. *Telebásica*, on the other hand, targets rural traditional students. These programs may or may not be successful at meeting their own specific goals but they do not appear to be the best suited programs to meet the broader national need for a large-scale program to meet PRS and EFA goals.

SAT and EDUCATODOS are the best candidates for program adaptation and scale-up. Both programs need significant adaptation, however, to be appropriate large-scale upper secondary models. For example, SAT, to date, only functions in rural areas and has a rural-focused curriculum. It would need to widen its scope to marginal-urban and urban areas. EDUCATODOS, meanwhile, has never operated at the upper secondary level and would need to plan for operations at the upper secondary level. Table 34 takes these two

programs and identifies specific recommendations for each of them to meet or move toward each of the general design recommendations we laid out in the previous section.

Table 33: Summary evaluation of program compliance with study recommendations

	EDUCA- TODOS	SEMED	SAT	TELE- BASICA	IHER	NOCT- URNOS
Policy total	9	3	7	5	7	2
Total possible	10	10	10	10	10	10
Percent compliance	90%	30%	70%	50%	70%	20%
Organization total	7	5	6	3	4	5
Total possible	8	8	8	8	8	8
Percent compliance	88%	63%	75%	38%	50%	63%
Instruction total	3	9	9	8	3	6
Total possible	12	12	12	12	12	12
Percent compliance	25%	75%	75%	67%	25%	50%
Curriculum total	7	5	10	5	5	5
Total possible	10	10	10	10	10	10
Percent compliance	70%	50%	100%	50%	50%	50%
Finance total	7	6	9	9	7	5
Total possible	12	12	12	12	12	12
Percent compliance	58%	50%	75%	75%	58%	42%
Total - all areas	33	28	41	30	26	23
Total maximum possible	52	52	52	52	52	52
Simple percentage	63%	54%	79%	58%	50%	44%
Weighted percentage (each area equal weight)	66%	54%	79%	56%	51%	45%

We also developed a series of recommendations for the other four programs, not because we would promote them as models to be scaled-up necessarily, but simply for quality and efficiency enhancement purposes.

Aside from Table 34, we do not describe our recommendations for SAT and EDUCATODOS in detail in the text because, taken with the program description and analysis of this paper and the program recommendations described above, we feel they are self-explanatory. We do, however, briefly summarize them below.

The SAT program has strong policies and organizational arrangements, relies on teachers and textbooks as we recommend, and has a well-designed integrated curriculum adapted to the target population. Our main suggestions for SAT if it were to be identified as a program to serve as a large-scale national alternative upper secondary education program, would be to expand its target population and coverage to marginal-urban and urban populations, to strengthen some aspects of program administration, such as supervision

Table 34: Specific recommendations for adaptation of SAT and EDUCATODOS programs

	SAT	EDUCATODOS
Policies		
1. Target population	Expand to marginal-urban and urban areas.	
2. Regional coverage	Expand geographic coverage.	
3. Management structure	Strengthen supervision and support to program sites.	Strengthen supervision and support to program sites
4. Relationship with Secretariat of Education	SE should strengthen data collection, monitoring, and evaluation of program. Come to a consensus with SE regarding a general technical curriculum for alternative upper secondary.	SE should evaluate program more regularly. Come to a consensus with SE regarding a general technical curriculum for alternative upper secondary.
Organization		
1. Schedule	Allow flexible scheduling based on student needs and the local economic and labor context.	
2. Location		
3. Infrastructure	Ensure pedagogically adequate infrastructure.	Ensure pedagogically adequate infrastructure.
4. Instructional hours per week		Increase weekly instructional hours to around 15.
Instruction		
1. Teachers	Hire teachers on contract to allow for periodic evaluation. Ensure that teachers teach in areas that they were trained in or have mastery of.	Increase the basic qualifications of teachers to have teaching or other university degrees. Provide teachers with compensation. Improve selection and training of teachers. Hire teachers on contract to allow for periodic evaluation. Ensure that teachers teach in areas that they were trained in or have mastery of.
2. Methodology	Develop students' self-instruction skills.	Decrease dependence on cassette tapes (use as supplement to instruction rather than primary teaching resource).
3. Learning materials	Adapt materials to broader target population (urban and marginal-urban).	Design and produce materials for upper secondary level.
Curriculum		
1. Curricular orientation	Develop general technical curriculum to be used in/adapted for all contexts.	Develop general technical curriculum for upper secondary that can be used in/adapted for all contexts. Strengthen focus on transversal competencies for the labor market.
2. Graduate certification		
3. Subject matter organization		
4. Curricular adaptation		
5. Alignment with curricular		Ensure that materials are aligned with national guidelines.

standards and guidelines		
Finance		
1. Private costs	Ensure that private costs are accessible to target population. Provide scholarships for individuals with need and merit.	Ensure that private costs are accessible to target population. Provide scholarships for individuals with need and merit.
2. Social costs		
3. Financing sources	Ensure program sustainability with diverse funding sources and government commitment and support.	Ensure program sustainability with diverse funding sources and government commitment and support.

and data monitoring, to develop a general technical curriculum that could be used and adapted in both rural and urban areas and that teaches self-instruction, and to hire teachers on a contract, rather than permanent basis, and ensure that teachers are teaching in areas where they have training and expertise. Rather than having one teacher per class, we recommend having at least two who rotate between two classrooms, one for hard sciences and math and one for social sciences and language.

EDUCATODOS is well-positioned in communities throughout the country and has strong political and community support. Our recommendations for adaptation of EDUCATODOS are far-reaching, however. This reflects that while SAT had 79 percent compliance with our recommendations, EDUCATODOS only had 66 percent compliance. To use EDUCATODOS as a national large-scale alternative upper secondary education program, we recommend that it: 1) develop a general technical curriculum and materials that teach self-instruction and prepare graduates for entry into the labor force or university; 2) hire qualified teachers to teach at the upper secondary level on a contract basis, with periodic evaluation and sufficient training and support; 3) decrease dependence on cassettes, using them only as a supplementary learning tool, if at all; 4) increase weekly instructional hours to approximately 15 hours.