

World Links for Development Program in Latin America: An Insight on Internet in the Classroom

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Abstract

The World Links for Development (WorLD) program, initiative launched by the World Bank in 1997, has assisted developing countries in bridging the “digital divide”, by providing schools and Ministries of Education with the necessary technologies, skills, and educational resources to prepare their youth to participate in the global knowledge economy. This article presents the WorLD program experience in the Latin American region. Special attention is given to the description of the components at the core of the WorLD program, its Teacher Professional Development Program in the use of the Internet in the Classroom.

Keywords

Educational Technology, Internet, Teacher Development Program, ICT Policies, Teaching, Learning, Collaborative Learning, Teaching Strategies, Teachers’ Communities of Practice, Global Learning Communities.

The WorLD Program

During the last few years, the knowledge revolution has widened the gap between developed and developing countries, increasing disparities in access to knowledge and information resources. The World Bank, committed to play an important role in reducing this gap, initiated in 1997 the World Links for Development (WorLD) program as a philanthropic pilot initiative to assist developing countries in preparing their youth to fully and effectively participate in the global knowledge economy of the new millennium, helping them make decisions regarding technology to improve access, quality and equity of education.

The WorLD program is a global education network linking schools across the globe through collaborative learning projects and educational networks, enriching the experience of educators and students in developing as well as industrialized countries.

The WorLD program's goals are:

- Establish online communities for teachers and students in secondary schools around the world.
- Improve educational opportunities and outcomes through Internet access, increased student motivation, and active cooperative learning.
- Build developing countries' capacity to apply information and communications technologies for economic and social development.
- Facilitate community access to information and capacity building activities through use of schools during non-instructional hours.
- Facilitate cultural understanding among youth across nations.

Through its extensive Teacher Professional Development program, WorLD has assisted teachers to integrate the use of technology and the Internet into their curriculum, helping to improve student achievement and learning outcomes. It has also contributed to the development of students' skills needed to be active participants in the knowledge economy. WorLD has also supported educational policy-makers in the design and implementation of their national ICT in education programs.

In order to do so, the WorLD program promoted and coordinated the participation of NGO's and public-private sector partnerships. With their participation, the WorLD program managed to address the key knowledge for development issues at the grassroots level:

- Human capacity development through comprehensive training.
- Local content development through training and collaborative project support.
- Information-sharing across countries through communities of practice and knowledge networks.
- Institutional development through partnering with local champions.
- Community access to technology and information in rural areas through use of schools as community learning centers and mobile computer labs.

The WorLD program is currently active in over 900 schools in 26 countriesⁱ, involving approximately 200,000 students and teachers. By 2005 the WorLD program network plans to include 2,000 schools in 40 developing countries interacting with at least 2,000

schools in 25 industrialized countries, reaching over 40,000 teachers and more than one million students.

In 1999 World Bank established the World Links NGO, a non-profit organization, separate from the World Bank, with the aim to continue the pilot effort in participating countries and to expand to new countries. In mid 2002 World Links NGO finished the separation process and has been completely spun-off from World Bank.

Strategies for Latin America

WorLD program expanded to Latin America in early 1998. Implementation strategies for Latin America differ from other regions because most of the countries had already established national and/or state initiatives on the use of ICT in education. The WorLD program had the challenge of being integrated into those initiatives in order to complement and reinforce their existing efforts. In some ways, the implementation of the program in the region was easier than in others because schools were already equipped; teachers were already users of the technology, and at state and national level, government officials already had experience in the implementation of ICT programs in education.

As stated above, the challenge of implementing the WorLD program in the region consisted, mainly, in assessing the national situation and adapting the WorLD program strategies to the specific country's needs and particular characteristics. For that end, a feasibility study was organized to work with government officials and to identify national and local partners. With this information, proposals and budgets were revised and authorized, and agreements were signed. The following is the list of the participating countries, indicating the year when they began the program and the national ICT in education initiative that the WorLD program complemented.

| Year | Country | National Initiative |
|-------------|--------------------|---|
| 1998 | Brazil (Sao Paulo) | Originally, WorLD program was implemented by the University of Sao Paulo, to take advantage of the experience developed through its ICT in education initiative " <i>Escola do Futuro</i> " (School of the future). After the first year of the pilot in 10 schools, WorLD expanded and began working with <i>Secretaria da Educação do Estado de São Paulo</i> (São Paulo State Secretary of Education) to complement its ICT in education initiative. |
| 1998 | Chile | " <i>Enlaces</i> " in its process of migrating from the educational Bulletin Board System (BBS) " <i>La Plaza</i> " to the full use of Internet in schools. |

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| 1999 | Colombia | WorLD complemented 4 provincial initiatives: “ <i>Escuela Nueva Virtual</i> ” in Caldas, “ <i>Conexiones</i> ” and “ <i>TareaNet</i> ” in Antioquia, “ <i>Programa de Nuevas Tecnologías en Educación</i> ” in Cundinamarca, and “ <i>Red de Participación en la Educación (RedP)</i> ” in Bogota. |
| 1998 | Paraguay | The ICT component of Quality Improvement in Secondary Education Project, “ <i>Mejoramiento de la Calidad de la Educación Secundaria – MECES</i> ”, co-financed by the World Bank. |
| 1998 | Peru | “ <i>EduRed</i> ”, Ministry of Education’s initiative to introduce ICT to develop, mainly, technological skills and microenterprises in secondary schools. |
| 2001 | Costa Rica | “ <i>Programa de Informática Educativa</i> ”, Ministry of Education’s initiative developed by Fundación Omar Dengo. |

Integration of the WorLD program in existing ICT in education national efforts was very important, because it could assure that the results from the pilot project would be relevant and useful for the Ministries of Education. For that end, WorLD’s pedagogical proposal proved to be flexible and easy to adapt to existing national and local initiatives.

Equipment and Connectivity

In regards to the technological infrastructure in the region, there was an important diversity and disparity in the type and number of technological resources available in each school, not only among countries but also, within the same country. Most schools had a range of anywhere between 10 to 20 computers, ranging from 486 to Pentium microprocessors, one printer; most of the schools had PC’s and only in Chile were there a few Mac’s.

As a result, the WorLD program considered that the minimum technological requirement needed for a school to participate was to have at least one computer with an Internet connection. At the beginning of the pilot project, some schools were provided with telephone and Internet services, but by the end of the first year, many of them could not finish their activities and commitments because of the lack of telephone or Internet service. It became clear that schools could hardly afford the recurrent costs, and sustainability would be a key issue.

Connectivity was, and remains, an important challenge for the implementation of ICT educational programs using the Internet. Developing countries' communication infrastructure is still not strong enough to provide Internet services in the whole country, even where telephone and Internet access is available; they are expensive for schools’ budgets.

A lot of effort was directed to encourage private sector support and collaboration in the project, especially from the telecommunication sector. Although it was possible to convince donors to provide special rates to schools or to offer free access to the Internet for several years, the connectivity problem in developing countries is far from being solvedⁱⁱ. Special efforts must be made to increase investment in rural communication infrastructure and to give schools preferential Internet rates and services. New public and private commitments are needed in order to assure equal access to information technology. New partnerships are needed in order to assist developing countries in bridging the “digital divide”.

Teacher Professional Development Program

The core of the WorLD program is its Teacher Professional Development program, aimed at assisting teachers in the process of integrating the use of the Internet (ICT) into their teaching practices. It promoted a critical and reflective attitude amongst teachers, towards technology and its educational applications on pedagogical, technical and ethical basis.

The WorLD Teacher Professional Development program was conceived as a continuum of coordinated efforts and activities over an extended period of time, aimed at building teachers’ communities of practice. In order to do so, it was designed as an extended dialogue amongst participants. A dialogue that began with a face-to-face workshop and continued through online activities. For four years, participants attended a one week workshop, where new concepts, ideas and techniques were reviewed and collaborative curriculum based activities were designed. They returned to their schools, developed those activities with their students and shared their experiences with their distant peers. At the end of the year, they met again, reflected on their experiences and started a new phase.

The main components of the Teacher Professional Development program are: Face-to-face workshops, written materials and a system of pedagogical and technical support. Each of them will be described:

1. Face-to-face workshops

The WorLD Teacher Professional Development program curriculum was organized in four interrelated phases, which introduced participants to the basic pedagogical and technological uses of the Internet in the classroom and ended with the high level skills needed to incorporate and spread innovative educational practices. The objective for each phase is described below:

| Phases | Objectives |
|----------------|---|
| Phase I | Introduce the fundamental concepts, technologies, and skills necessary for introducing networked technology and the Internet into teaching and learning; initiate discussion of new possibilities, generate basic email projects. |

| | |
|------------------|---|
| Phase II | Introduction to educational telecollaboration, from activity structures, to the creation, design, implementation and dissemination of original projects. |
| Phase III | Develop the skills and understanding of how to create, incorporate and facilitate innovative classroom practices that integrate technology and curricula. |
| Phase IV | Develop the skills and deepen their understanding of how to create, incorporate, evaluate and diffuse innovative pedagogical practices, instructional technology, and professional development opportunities. |

During the four years of the pilot project a group of regional and national instructors was defined. Workshops had up to 40 participants and were delivered by a team of at least two instructors. They worked with teachers modeling the same methodologies and organizing similar activities to those that the teachers were expected to use and implement with their students. They were especially responsible for helping teachers in the planning and design of the Internet learning activities selected for implementation over the following months.

Instructors' inputs in the workshops content structure, methodologies and in the written materials were determinant in the development of the final version of the WorLD Teacher Professional Development Program.

2. Written materials

WorLD program gave special attention to the design and development of the written materials that accompany each workshop. It was clear that strong written support would guide teachers in the process of integrating the Internet into the classroom. The manuals were conceived with various purposes in mind: as a workbook for use during the workshop, as a theory and technical reference book, as a classroom activities guide, and as a resource book for teacher training.

Our first intention was to translate the English version of the materials into Spanishⁱⁱⁱ, but as we started to work we realized that adaptation, contextualization and new content were necessary. A group of ICT in education specialists were brought together soon and a new version of the manuals was developed^{iv}.

In this version, the content was organized in sections, modules and activities, all of them directly related to the objectives and outcomes expected from each workshop. This design gives flexibility to the users; as they can easily locate their level of expertise and work from there. It is especially useful when reproducing the workshops for other teachers with different levels of pedagogical and technical expertise. The content in each workshop manual is divided into four transversal and central sections:

a. Pedagogical Innovation. In this section teachers learn about the pedagogical rationale of the use of technology in the classroom. Special attention is given to new theories on learning, project based learning and collaborative learning. This

section is organized into two sub-sections: Pedagogical Basis and Collaborative Projects.

b. Technology Resources. This section is dedicated to help teachers develop skills in the use of the technological tools that support collaborative learning. This section is organized into three sub-sections: Internet, Utilities and Norms and Ethics.

c. Evaluation. This section was designed to help teachers reflect on the process of evaluating Internet based learning activities. Special attention is given to techniques and instruments used to evaluate collaborative learning. This section is organized into two sub-sections: Evaluation Basis and Evaluation Techniques and Instruments.

d. Action Plans. This section aims to help teachers acquire the skills for planning collaborative projects with other workshop participants. Special emphasis is given to the identification and scheduling of the students' and teachers' activities. It also includes the assessment and planning of self and group professional development activities. This section is organized into two sub-sections: Individual and Group Action Plans.

These materials were specially designed for teachers, and they are based on activities that are similar to the ones that they will use with their students. The final version of the workshop manuals was the result of collaborative work that included inputs from teachers, instructors, and country and regional coordinators.

3. System of pedagogical and technical support

WorLD program offered teachers a system of pedagogical and technical support designed to accompany them in their process of integrating the use of the Internet into their classrooms. This system was based on collegial advice and peer collaboration. It aimed to build teachers communities of practice at school, country and regional level. Below you will find the description of each element of the support system and how they interacted:

a. School teacher that attended the workshop

All selected schools had to assign two classroom teachers to participate in the program^v. These teachers made a commitment to participate for the four years of the pilot project. Each year they had to attend a national workshop, do the designed activities and get other teachers from the school involved in the program. Throughout the 4 years of the pilot program these two school teachers became a close team and a source of support for each other. They helped each other in the development of their Internet collaborative projects and they designed activities in order to get the rest of the teachers in the school involved. We estimate that 75% of the teachers that started the pilot project remained until the end and that in more than 50% of the participating schools, teachers managed to involve other teachers from the school. The strategy of involving two teachers

from the same school proved to be very effective as they became active partners in the process of introducing educational innovation into schools.

b. School Computer Lab Coordinators

The school computer lab coordinators played a crucial role in the program by providing technical support to the teachers and students. Their responsibility was to have all the technology ready and running. They accompanied the teachers helping them acquire confidence and experience in the use of the computer and the Internet^{vi}.

The school computer lab coordinators supported and collaborated with the teachers. They eased all the technical barriers and encouraged and promoted the use of new applications such as: multimedia editors, scanners, digital cameras, etc.

c. WorLD workshop peers

The national teachers' team was composed of the 30-40 secondary school teachers from different regions of the country that attended the workshops. They were a diverse group; as they came from different curriculum backgrounds and settings. As we said before, the group met once a year for four years in one week face-to-face workshops. During the workshop they learned, explored, discovered and reflected on the possibilities of the Internet in the classroom. They also worked in small teams designing and planning curriculum based activities to carry out with their students. Promises and commitments were made and networks of teachers were created. Teachers returned to schools with plans, activities and at least a partner, somewhere in the country, with whom they could share their experiences and work together for the next 6-8 months. During the whole year teachers helped and advised each other using mainly the e-mail. Peer to peer collaboration proved to be an effective strategy for teacher development programs and for learning in the work place. Mailing lists and the country's web site were also used, in order to meet and share their ideas, projects, resources and experiences.

d. WorLD National Coordinators

WorLD national coordinators were responsible for assuring that teachers had all the pedagogical and technical support needed during the project. They were in charge of encouraging and fostering the building of the teachers' national community of practice. In order to do so, national coordinators participated in the following activities:

- Designed and planned with government officials the national strategies and the program action plan.
- Visited the schools and advised principals and teachers.

- Collaborated with local, national and international partners.
- Adapted the national strategies to local realities.
- Revised and participated in the development of the written materials.
- Designed and maintained the country's web site.
- Moderated the national mailing list.

National coordinators were also a diverse group with different backgrounds and experiences. Most of them were teachers with expertise in the use of ICT in education and experience in Teacher Professional Development programs. Their participation and commitment was a key element for the development of the program. They planned and organized workshops and conferences based on teachers' pedagogical and technological needs and they gave insightful feedback for the overall program strategy.

e. National Ministries of Education

The WorLD program could have never existed without the commitment and participation of the Ministries of Education. They contributed in the understanding of the regional educational challenges and shared their experiences and knowledge. For some countries, the WorLD pilot project was easily integrated into the already existing infrastructure and, if results were good, it could be easily generalized to a national level.

In other cases, the WorLD pilot project became the first initiative in the use of the Internet in education, new infrastructures were needed and the results of the pilot project would provide valuable insights for future decision making in the introduction of the Internet into education on a large scale. The Ministry of Education participated with the following activities:

- Co-directed the WorLD program through their office responsible for the ICT in education program.
- Promoted and supported the participation of international, national, and local partners.
- Involved education administrators in supporting the participating schools.
- Monitored the development of the program.

It is important to mention that the Ministry's support and recognition of the work done by WorLD schools and teachers was an important element that maintained their motivation and their active participation in the program^{vii}.

f. Regional Coordinator

The regional coordinator was responsible for adapting the general strategies of the WorLD program to the regional needs, managing and coordinating the local, national and international efforts in the region. The regional coordinator was in charge of the following activities:

- Designed with the country's government officials the pilot project that best fitted the national needs.
- Promoted and coordinated the participation of national and international partners.
- Advised and monitored all national coordinators' activities.
- Designed and participated in the national workshops.
- Selected and trained a team of regional instructors responsible for the delivery of the national workshops.
- Coordinated the development of the training materials for the region.
- Monitored the progress of the program in the region.
- Shared strategies and challenges in the region with other WorLD regional coordinators.
- Informed the WorLD program director on the progress of the program in the region.

The regional coordinator was responsible for fostering the regional teachers community of practice. Special attention was given to promoting the design of regional collaborative projects, the development of a regional newsletter and the formation of a regional team of instructors.

g. WorLD Program Director

The WorLD program director was responsible for designing the general strategies of the program. He was in charge of obtaining financial resources and building partnerships with national and international organizations in order to support the program's activities. The program director was in charge of the following activities:

- Advised regional coordinators^{viii} on the regions' and countries' strategies.
- Promoted and coordinated the participation of national and international partners.

- Coordinated the development of the Teacher Professional Development curriculum and the program's written material.
- Organized annual meetings with national coordinators.
- Monitored and evaluated the progress of the program in all the regions.
- Shared strategies, challenges and outcomes of the program with other program directors and managers at the World Bank.

The WorLD program director was responsible for building the WorLD teachers international learning community. Special attention was given to the development of the program web site, online administration tools, participants and project databases and the international newsletter.

A four year pilot project is a long time, many things happen at the personal and institutional level. This system of support responded to the different unexpected problems that occurred during the development of the project. When one component was temporarily unavailable or changed, the rest of the team supported, trained, and integrated the new member. The dynamics of the network kept the system working and in most cases collaboration, learning and sharing could not be stopped easily.

Outcomes

The main outcomes obtained during the five years of the WorLD program in the Latin American region can be classified into the following set of impact indicators: program scalability, individual and institutional capacity building, and educational resources developed.

1. Program scalability

Ministries of Education showed significant interest in participating in the WorLD program from the beginning, but it was not until the second or third year that countries started to think about extending the program to other schools. The strongest initiative was from Chile, which by the end of the second year started the process of expanding to all schools (through *Enlaces* Schoolnet). As seen in *Figure 1*, all Latin American countries extended the program.

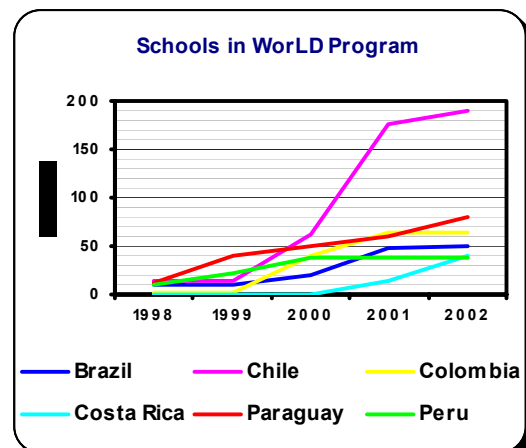


Figure 1

The program's scalability can be seen as an indicator of the relevance and pertinence to the different participating countries that the WorLD program represented. Therefore, we consider this as an indicator of our program's success.

2. Individual and institutional capacity building

One important stated goal of the WorLD program was to build developing countries' capacity to apply information and communications technologies to educational purposes. During the five years of the pilot project, important knowledge and experience have been developed at individual and institutional levels:

- a. At **schools**, through teachers' workshops and development of local, national and regional communities of practice.

The **teachers'** commitment to the project was exceptional. Most teachers in the region responded with great enthusiasm and responsibility to the projects demands. They were supportive, patient and generous with their colleagues. But most of all, teachers were critical and inquisitive about the relevance and implications of the use of the Internet in the classroom. They reflected on their learning process and transformed their teaching practice^{ix}. They were committed to building and participating in their teachers' community of practice.

- b. At **Ministries of Education** at local, state and national levels, through the participation of government officials - responsible for leading programs in the use of ICT in education - in planning and organizing WorLD program's activities.
- c. At the **World Bank**, through the participation of the operations officials – responsible for advising on public ICT in education initiatives – in managing and monitoring WorLD program's activities.

This knowledge and experience acquired has furthered the understanding of the challenges that developing countries face in preparing their youth to fully and effectively participate in the global knowledge economy.

3. Educational resources developed

During the development of the pilot project the following resources were designed, used and revised by the whole WorLD community of teachers, coordinators, instructors, and administrators:

a. The WorLD's model for Teacher Professional Development Program

This model serves as an example of the implications, costs and means needed to implement Teacher Professional Development programs, specifically in the

integration of ICT into the classroom, but easily adapted to other content areas. It also shows how telecommunications can be used in these programs. National coordinators have already been using and adapting this model while extending the WorLD program to other schools.

b. Written materials

As stated before, the WorLD program training material's flexible design has already been used for different purposes: as a workbook during the workshop, as a theory and technical reference book, as a classroom activities guide, and as a resource book for teacher training. Teachers value highly these materials.

c. Collaborative projects databases

WorLD schools' projects designed by teachers can be found in the World Links NGO site: <http://www.world-links.org>. This information is of great relevance for the promotion of collaboration among teachers in all regions. Collaborative projects were designed with the following characteristics:

- Curriculum based.
- Interdisciplinary.
- Link learning with real life issues and community interests (health, culture, environment., etc).
- Student-centered and hands-on.
- Cross-national and (often) cross-linguistic.
- Students and teachers become collaborators and content providers.

Another important outcome of the WorLD pilot program is the creation of the World Links NGO, as it represents an important opportunity to give continuity to the efforts made by public and private organizations, and to extend its benefits to other developing countries.

These outcomes prove that institutional local, national, regional and international collaboration not only is possible but is of greater importance in trying to better understand and tackle complex issues such as bridging the "digital divide." We believe that the WorLD program in the Latin American region has provided important "know-how", information, and valuable educational resources that will help government officials integrate the use of ICT, particularly the Internet, into the classroom.

Lessons Learned

There are many lessons that have been learned in five years of the WorLD program in the Latin American region. We want to highlight those that were most common to all countries and those that, we believe, can serve in the design of future ICT in education programs and Teacher Professional Development initiatives.

1. The development of **pilot projects** is an effective strategy in order to understand and value the implications of introducing the use of specific technologies into the classroom. Important issues such as cost, adaptability, and relevance can be easily assessed. During the pilot project, personal and institutional “know-how” and educational materials were developed with all the elements necessary for the specific technologies to be introduced on a large scale. In this case, the WorLD pilot project gave national and local government officials important information on the use of the Internet in the classroom, it developed local and national capacity to manage future initiatives^x and finally, it provided a model for future teachers’ professional development programs.
2. **Regional cooperation and collaboration** proved to be very relevant. Countries from the same region share many cultural values and institutional challenges. Sharing their experiences and strategies was very useful because they were easily reproduced and/or adapted. Working globally, although recommended, was more difficult especially at the beginning of the pilot project because of cultural differences, language barriers, different time zones and overlap in school calendar years.
3. **WorLD Teacher Professional Development program** was successful because it was designed as a continuum of coordinated efforts over time and aimed at building communities of practice at school, national and regional level. It also offered teachers a variety of follow-up activities and access to high quality educational resources. And finally, it provided training at the work place and involved teachers as trainers for their school colleagues. The sum of all these efforts helped teachers gain control over their learning process and become leaders in their educational communities^{xi}. A lot of efforts have been made for in-service professional development of teachers in the integration and use of ICT in education, which is valuable. But similar efforts have to be undertaken to reform teacher education institutions’ curricula, to prepare the educator that the modern society needs, and provide the education system with teachers prepared to effectively integrate the use of ICT into teaching and learning, as well as a means for continuous professional development.
4. Developing, adapting and translating **educational materials** was expensive and time consuming but was essential for the program. During each workshop teachers received a printed manual with theory, technical information and plenty of activities for them to use with their students. Teachers returned to their schools with useful materials that supported and guided them while working with their students and involving other teachers. High quality printed materials are very important when educational innovation is intended.

5. **Connectivity and sustainability** of computer laboratories are still critical issues in the development of Internet educational programs in Latin America. Besides the efforts that Government officials must make to guarantee connectivity and access to the Internet in all schools, alternatives such as using schools as community telecenters should be studied not only as an answer to sustainability, but also as a means of providing educational services to the communities.

Conclusions

Assisting developing countries to prepare their youth to fully and effectively participate in the global knowledge economy remains a challenge. Creative partnerships and collaboration of all sectors of society at local, national, regional and international levels will be needed in order to succeed. We hope that the WorLD program's outcomes and lessons learned are relevant and useful, especially to government officials, in future decision making on national and local policies regarding the use of technology to improve access, quality and equity in education.

For the World Bank, the results of this pilot project are of significant value, as they helped us reflect on the challenges of introducing ICT into the education systems of developing countries, which will guide some of our future actions and work with policy makers for Education Reforms.

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ⁱ Botswana, Brazil, Burkina Faso, Cambodia, Chile, Colombia, Costa Rica, El Salvador, the Gambia, Ghana, India, Indonesia, Laos, Mauritania, Mozambique, Paraguay, Peru, Philippines, Senegal, South Africa, Sri Lanka, Turkey, Uganda, Vietnam, West Bank/Gaza, and Zimbabwe.

ⁱⁱ For example, in Paraguay “*Comisión Nacional de Telecomunicaciones (CONATEL)*” offered free full Internet access for 3 years to all 60 schools participating in the Program.

ⁱⁱⁱ For Brazil, English materials were translated into Portuguese.

^{iv} Specialists from Argentina, Chile, Colombia, and Mexico participated in the process.

^v Teachers from different subject areas participated. They were selected by the school principals considering their enthusiasm and commitment.

^{vi} At the beginning, some school computer coordinators attended the workshops. In most of the cases, they planned and designed the collaborative project without considering the classroom teachers. They then “imposed” their selection on the classroom teacher; as a result the development of the project became a problem instead of a solution. Therefore, by the second year of the pilot project, only classroom teachers were accepted for the workshops. They selected, designed or adapted the Internet collaborative project and their decisions were based on their students' and curriculum's needs. Internet classrooms activities were naturally integrated and relevant for students and teachers.

^{vii} No monetary incentives were given to teachers participating in WorLD Program.

^{viii} World Links Program had 5 regional coordinators: Anglophone Africa, Francophone Africa, Asia, South Asia and the Middle East, and Latin America.

^{ix} According to the SRI 1999-2000 Evaluation Report, teachers' assessment of the impact of computers on their skills showed that: 82% improved their attitudes towards teaching and 63% responded that they designed and led collaborative students projects.

^x In Paraguay, two WorLD teachers are now working within the Ministry of Education to continue and extend the Program.

^{xi} Teachers from one of the first group of schools participating in WorLD Program in Chile are now actively collaborating with an *Enlaces* Schoolnet local training institution to train other teachers in nearby schools.