

## Welcome to the ISTECS Quarterly Message – February 2004

### News from the EO:

The following is a brief list of suggested actions (approved by the Board of Directors and the General Assembly) to be implemented by the EO in 2004:

- **Events.** According to a decision made by the ISTECS Board of Directors during its June (Tampa, Florida) and December (Santa Cruz, Bolivia) meetings, the Consortium will reduce its event funding allocation. The future process will include the coordination of fewer events, and will focus on larger sized events with a widespread impact. Additionally, both the EO as well as local coordinators will apply for additional funding from a number of funding sources, including international organizations as well as participating member industries, thus reducing the impact on the ISTECS budget. ISTECS will still continue to support smaller workshops and training events with very limited funding, through a new application process and requirement forms that are currently available on the ISTECS Web page.
- **New Mexico initiatives:** As part of the strategic decision to focus more attention on initiatives that have an impact in New Mexico, the EO is in the process of coordinating the second annual “IT Challenge for Social Change,” an event that is allowing ISTECS to learn and understand the local needs for IT transfer and application. This event is also serving as a catalyst to form local networks and raise funds for development projects within the state. To this end, the EO is making key alliances with local groups. At the moment, the Executive Office is preparing an MOU to work with the twenty land grants through the Mexican Land and Education Trust to develop a technology based system for governance of the Land Grants and the Acequia systems. This system will link these communities to the appropriations committees in the state of New Mexico. In addition, the EO office is preparing an innovative and ambitious Telemedicine / Telehealth project. Concrete action plans on these two projects will be disclosed soon. Additionally, ISTECS is a part of the advisory committee of the Annual Ibero-American Research and Development Summit (AIRDS), which focuses on creating a trade hub in NM for Ibero-American investments.
- **Fundraising / Grant-writing.** The EO will work with Initiative Directors as well as members that wish to present projects and proposals to funding organizations. An initial list has already been compiled, and the EO will create a database of potential funding sources and contacts.
- **Improved Public Relations and Marketing.** The purpose of this effort will be for membership (both academic and industrial) recruitment and retention, and also to offer “welcome packages” and other marketing collateral to both potential and incoming members. In addition, the EO is in the process of distributing two questionnaires that will allow the EO to understand the needs and the assets of ISTECS members. The objective is to gather enough information to be able to better promote services and to find new ways of carrying out tech transfer based on the needs of our membership.

- EO will identify and provide both **consulting and quality control** for locally organized events, as requested. ISTECC will continue to support smaller training events as well as to coordinate larger sponsored conferences and symposia, however, a new “event request form” as well as criteria to host the General Assembly will be implemented as a means to be more efficient in the event coordination operation and to be able to make objective decisions that have the highest return on investment for the majority of members of the Consortium.

## **Events 2004**

### **Second ISTECC Digital Libraries Conference**

**May 19-21**

#### **UNICAMP Campinas, Brazil**

This event will be the second annual conference, and information on the First Conference may be accessed at: (<http://dll.istec.org/conferences/brasildll03>). This conference will focus on Open Archives and Institutional Repositories. The third day of the upcoming conference will be the celebration of the 50th Anniversary of the Brazilian Information Science Group (Brasileiro de Informação em Ciência e Tecnologia (IBICT at [www.ibict.br/](http://www.ibict.br/)) of the Ministry of Science & Technology. The organizers plan to bring in speakers from the Berlin Open Access Accord (Theresa Velden of the Max Planck Institute), the Los Alamos Digital Library Research Group (Rick Luce), the Budapest Open Access Initiative (Jean Claude Guidon representing the Soros Foundation), and others. Please plan to attend these important events. There will be other ISTECC activities during the week of events, as well as the mid year meeting of the Board of Directors. Please visit the Web page periodically for updated information.

### **National Science Foundation (NSF) / Pan-American Advanced Studies Institute (PASI) – ISTECC Research & Development Initiative**

#### **“Rapid System Prototyping with emphasis on digital signal processing, artificial neural networks, communications, and instrumentation & control systems”**

The Department of Electrical Engineering in conjunction with the Department of Computer Science and Engineering at the University of South Florida and the Ibero-American Science & Technology Education Consortium (ISTECC) have been awarded a National Science Foundation (NSF) Pan American Advanced Studies Institute grant to organize a 12-day workshop on “Rapid System Prototyping with emphasis on digital signal processing, artificial neural networks, communications, and instrumentation & control systems” in a Latin American country during the summer of 2004. The main goal of the project is to provide state-of-the-art knowledge in these areas to professors and industry leaders from Latin American countries and the United States and create a network that will allow this information to spread over the participating countries by having the workshop participants return to their home academic institutions and incorporate the newly acquired knowledge into their curricula. It is expected that the “hands-on” activities during the complete workshop will greatly enhance the understanding of the theoretical material presented and will build up participants’ interest in pursuing teaching and or research in advanced RSP development. The grant includes paid travel for 20 participants from Latin America and 20 from US institutions. ISTECC has also applied for additional funds to cover another 20 participants from the Latin American region. ISTECC members will be given high priority.

Additionally, all of the material developed will be integrated into Ibero-American community for remote training and research through the ISTECS network.

The proposed deliverables will consist of a 12-day workshop and the development of Internet-based delivery platform that will offer a common stage for global collaboration between students, instructors and researchers. The proposed areas of integrated instruction will allow participants to obtain knowledge about the state-of-the-art in the areas of Description Language (VHDL), Instrumentation & Control, Artificial Neural Networks (ANN), Wireless communications and Digital Signal Processing (DSP) all with respective industrial applications related to the region. As part of the workshops the participants will be allowed to use high-tech tools to implement and test applications for DSP and VHDL, among others.

A summary of the objectives of this Institute are presented below:

- To offer a 12-day training Institute with a Certificate of Participation granted by University of South Florida, the local host institution, and ISTECS.
- To include all relevant materials developed for the Institute and future information on on-going projects in the ISTECS / USF / host institution Web Site (<http://istec.eng.usf.edu>), which is available to over 100 Latin American Universities using the existing ISTECS network.
- To train professors that will return to their home institutions to deliver the acquired knowledge and to implement a teaching/research Laboratory.
- To foster and facilitate cooperation between the participants in order to maintain an active working network for educational and research activities by presenting and discussing potential joint projects between Institutions in the United States and Universities in Latin America.

More information will be posted on the ISTECS Website as it becomes available.

### **Annual Ibero-American Research and Development Summit (AIRDS) 2004**

**June 22-24**

**Albuquerque, New Mexico, USA**

AIRDS is a unique opportunity for companies, investors, laboratories, centers of excellence, universities, and international organizations to meet in a centralized location where they can explore partnership opportunities and prospects for international business development. AIRDS 2004 will focus on the biosciences with an emphasis on measurement and enumeration tools.

**Abstract:** From many scientific disciplines, scientists are working on new ways "to see" and "observe" in order to understand and react to our world. The bioscience community is in a desperate search for better, more efficient, and cheaper tools that bring new levels of clarity to the understanding of biological events. AIRDS 2004 will be the event where these two worlds collide - Measurement Science meets Bioscience.

AIRDS 2004 will consist of a multi-track conference, technology demonstrations, a poster session, and an agenda that is conducive to networking, deal flow, and partnership development amongst companies, academic institutions, Ibero-American centers of excellence, U.S. federal laboratories, government agencies, and international organizations.

The Summit agenda is arranged into two broad categories:

1) Market Areas

- Research Tools (including drug discovery)
- Medical Diagnostic Tools

2) Technology Commercialization Stakeholders

- Buyers
- Integrators
- Providers

For more information, please visit: <http://www.irdsummit.org/>

**ISTEC Co-Sponsored Events, 2004:**

**VII Internacional Colloquim on Applied Technologies for Information Services**

**III Virtual Symposium: Electronic Publication and Copyrights**

**Universidad de los Andes, Venezuela**

**Mérida, July 5-9, 2004**

**Abstract:** The Library services of the Universidad de Los Andes (SERBIULA) and the National Association of Directors of Libraries, Networks and Information Services of the University and Research Sector (ANABISAI) are organizing the VII Coloquio of Applied Technologies for the Information Services and the III Virtual Symposium: Electronic Publication and Copyrights. This event will take place in Mérida, Venezuela on July 5-9 of 2004.

**Objectives:**

Main topics:

- The University Library as a knowledge portal
- Creativity and innovation in information services
- Copyrights and intellectual property in academic libraries
- Intellectual property in digital libraries
- Coexistence: Hybrid libraries
- Evaluation of service, standards, self-evaluation, accreditation
- Managing change in university libraries
- ISO norms to evaluate quality of information services
- Using electronic sources for cataloguing
- Electronic editing and digitalization
- The library of the XXI century: Skills for information users
- The influence of digital libraries in the new concept of teaching
- Technology as a support to digital libraries and distance education
- Information technologies and training users
- Cooperation between academic libraries

- Cooperation via consortia in academic libraries
- The libraries' role in corporate portals
- The impact of communication networks in cooperation
- Marketing and the promotion of services
- Statistics in academic libraries

For additional information, please contact the organizing comité by writing to: maryote@ula.ve, iris@serbi.ula.ve, liris@ula.ve

## **XII Latin and Ibero-American Operations Research Congress (CLAIO)**

**October 4-8, 2004**

**La Habana, Cuba**

Organizers:

Universidad de La Habana y el Instituto Superior Politécnico 'José Antonio Echevarría' (CUJAE)

Host:

Asociación Latino Iberoamericana de Investigación de Operaciones

Sociedad Cubana de Matemática y Computación

The XII CLAIO will take place in Ciudad Habana, Cuba October 4<sup>th</sup> to 8<sup>th</sup>, 2004. This event takes place every two years since 1982 and it is celebrated in a Latin American city with the auspices of the Latin and Ibero-American Operations Research Association, as a member of the International Federation of Operations Research. This event has served the function of establishing mutual knowledge between researchers and professionals in the region, and of training young graduates and graduate students. The participation of researchers from other regions has incremented in the last CLAIO's.

The thematic includes: Applications of operations research to public administration, human resources and business; Decision analysis; Mathematical programming; Mathematical economics; Computer Science and Informatics: information systems; Optimization; Optimization methods and algorithms; Probabilities and statistics; Logistics applications; Operations research applications to Biology and Medicine.

For more information:

Dra. Sira Allende  
General Director  
Mathematics and Computer Science  
Department

Universidad de La Habana  
San Lázaro y L.

Fax [537]637480  
email:sira@matcom.uh.cu

Dra. María Gulnara Baldoquín  
President of the Program Committee  
Industrial Engineering Department

Instituto Superior Tecnológico 'José  
Antonio Echevarría' (CUJAE)  
Boyeros

email:gulnara@ind.cujae.edu.cu

## **Summary of Recent Events, 2003**

**December 2003**

**XIII ISTECA GA, Dec 2003**

The XIII GA, held at Universidad de Aquino, Bolivia, was held in the city of Santa Cruz in December of last year. It included an IT Challenge (see below), workshops, a Telemedicine forum, and the ISTECA GA. The presentations made during the GA are currently on the ISTECA Web page, and the minutes from the Assembly will also be posted shortly. The following is a summary of the events that were held during the week of GA:

**DLL Workshop**

“How to Create a Digital Library / Introduction to the Basic Concepts of Digital Libraries”

Taught by ANGELA MARIA MEJIA GUTIERREZ, Universidad Javeriana, Bogotá, Colombia

Topics included:

Definition of a Digital Library. The basic services being offered by a Digital Library. The software and hardware is required including Free-ware. The importance of an on-line catalogue in order to present digital content. Journals and electronic publications. Electronic publications in reserve. Electronic theses and dissertations. Digitalization of unique contents. Movement summary of open archives. The ISTECA model about all the aforementioned issues

**ACE Workshop**

“New Information and Communication Technologies Applied to Education”

Taught by Guillermo Cardona Ossa, PhD, Universidad Virtual, Bogotá, Colombia

Topics included:

New technologies in the research processes toward construction of a virtual education model. Virtual workshops as a pedagogic tool. Multimedia y learning: interactive education. Minimum requirements, multimedia tools and components. INTERNET and education. Didactic help for the XXI century. Resource integration “The Virtual Classroom” concepts, characteristics, minimum requirements, use of virtual classrooms, integrated distance work. Practical tools for the migration from presence to virtual presence. Creation of virtual educational vessels for basic, medium, superior, entrepreneurial and non-formal education.

**R&D Workshop**

Software Engineering

Taught by Jonás A. Montilva C., Universidad de Los Andes, Venezuela

Topics included:

Software development based in components is a recent high technology process that has revolutionized the Software industry and has established a new paradigm in high quality software production. This process is inspired in the way in which technological products are made in the engineering of physical systems: the new products are developed from the assemblage of prefabricated components.

Object orientation, distributed systems and web technology have created in the last years a new path in the process of software development. This new technological path has allowed for the production of applications that are based in the reutilization of generic components, easy to integrate, distributed, high quality, low cost, and independent from development platforms.

A high percentage of the commercial software offered by big computing companies is developed nowadays using this new method. This tutorial will have the following thematic material: software

development and its new currents, software actives and components (product model), processes models based on CSR.

### **Telemedicine Forum**

First International ISTEAC / Telemedicine – Telehealth Meeting

This event took place on Wednesday, December 3. It aimed at exchanging information, and promoting a debate on the incorporation of advanced technologies in the Medicine / health fields as well as their perspectives on short, medium and long term development. Dr. Carlos Callegari, from the Universidad de Carabobo, Venezuela, is the main coordinator of this effort. For more information, please read the section under the R&D Initiative below.

### **ISTEC / Motorola IT Challenge For Social Change: Bridging the Digital Divide in New Mexico, USA and Building Partnerships for Community Development Through Information Technology.**

**November 7, 2003**

**Albuquerque, New Mexico**

**Objectives:** The principal outcome of this IT Challenge was to spur a statewide strategy for generating and supporting collaborative activities among academia, industry, government, and other public sectors within New Mexico to promote community and rural development through the use of Information Communication Technologies (ICT). Additionally, an overarching goal of this event was to challenge community groups to use IT as a new tool that can contribute to a bottom-up approach to cultural and socio-economic development that is created by rather than for community members. A hemispheric and comprehensive outlook will help shape policy into practice, by asking strategic questions about ways to move from the "what" into the "how." This proactive and action-oriented approach was to create the synergy needed to make New Mexico a leader in innovate technology applications that improve economic development and the quality of life within the State and abroad.

*The 2004 NM IT Challenge will be a continuation of this event, and will aim to propose concrete projects and collaborators to move this initiative into an action plan.*

For proceedings information: [http://www.istec.org/initiatives/libertadores-projects/it\\_challenge/it\\_challenge\\_abq/index.htm](http://www.istec.org/initiatives/libertadores-projects/it_challenge/it_challenge_abq/index.htm)

### **ISTEC / Motorola IT Challenge, "Education and the Digital Divide"**

**IV Gathering Society and Information Technologies**

**November 13 and 14, 2003**

**Universidad de Chile, Santiago, Chile**

Co sponsors/organizers:

- ISTEAC / Motorola
- Universidad de Chile
- Centro de Investigaciones de la Web
- Fulbright Commission
- CLEI – Centro Latinoamericano de Estudios en Informática
- Sociedad Chilena de la Ciencia de la Computación

**Abstract:** The increasing penetration of Information and Communication Technologies in civil society, industry and government have resurfaced the importance of the intensive and sophisticated use of technologies as a way to generate increases in productivity. Together with new technological developments and innovations in the use of these ICTs in the society, they create a need to revise part of the assumptions over which much planning and execution has taken place in the past years. For this reason, these themes will form a central part of the IV Encuentro Sociedad y Tecnologías de la Información of this year, which will be centered on the Impact of ICT in Productivity.

**Objectives:**

- Macroeconomic Impact
- Industrial Productivity
- Productivity in the public sector
- Privacy of Personal Information
- Intensity and sophistication of use

**Impact:** This is an annual event coordinated by Universidad de Chile. The event drew over 200 participants, mostly from Chile and from South America.

**Audience:** This annual event counts with an annual captive audience that includes representatives from the most prestigious scientific societies including CLEI, SCCC, Academia Chilena de Ciencias, Comité Nacional ICSU, Consejo Nacional de Sociedades Científicas, CYTED, ACTI, CIW/DCC/Univ. de Chile, GECHS, INTEC and Microsoft. Other participants included politicians, technocrats, and social leaders

**WWW:** [www.ciencia.cl/encuentro](http://www.ciencia.cl/encuentro)

**ISTEC / Motorola IT Challenge: Second Proyecto País**

**December 1, 2003**

**Universidad de Aquino, Santa Cruz, Bolivia**

**Abstract:** This IT Challenge, which corresponded with ISTEC's XIII General Assembly, provided a continuation of discussions from last year's IT Challenge "Primer Proyecto País". The e-Bolivia project is inclusive and participatory, based on strategic alliances (industrial, educational institutions, international organizations, NGOs, and governments) and open to society and its institutions, and will operate with transparency, effectiveness, and efficiency, allowing for an increase in the competitive productivity of the country.

**Objectives:** The objectives of this event were to establish a permanent discussion forum, in real time, regarding the "Proyecto País: Bolivia-Digital (e-Bolivia) en la Sociedad de La Información, Desafíos y Oportunidades" (Proyecto País: Digital Bolivia (e-Bolivia) in the Information Society, Challenges and Opportunities"). This discussion is aimed to identify replicable projects with scale-up potential, that are economically viable and sustainable in different design and implementation stages at the community, municipal, and departmental level. The projects will function equally well in national, regional, and global environments that contribute to e-Bolivia.

**Audience:** The e-Bolivia project is inclusive and participatory, based on strategic alliances (industrial, educational institutions, international organizations, NGOs, and governments) and open to society and its institutions, and operates with transparency, effectiveness, and efficiency, allowing for an increase in the competitive productivity of the country. <http://www.istec.org>

At the time that this Quarterly Message went to press, the final plan of 2004 IT Challenges was not yet defined by the ISTECE Executive Office and their counterparts at Motorola. More information will be released shortly.

## **DIGITAL LIBRARY LINKAGES (<http://dll.istec.org>)**

### **GOALS FOR 2004, from the ISTECE 2003 GA**

#### A. DLL Portal,

- Digital repository online
- OAI Harvestable Community
- Feedback and interactive site
- Celsius statistics tracking system

We are moving into the mainstream Library environment, and are currently in talks with AISTI and LANL to exchange DSpace access.

#### B. Integration of other services/software with DLL:

Integrating Information Services (Rapid Electronic Document Delivery + Celsius, Consultation, Teaching, Community Involvement) with Continuing Education, Knowledge Networks & Research.

#### C. DLL Portal, CELSIUS, Dspace / Institutional Archive, can all be integrated with e-learning = Chips & Salsa:

- CnS under development by ISTECE
- Information streams can be captured, analyzed, and categorized for:
- Re-use (whole or part)
- Usage assumptions / trends
- Pooling resources
- Publishing the output of the community

### **Update from CELSIUS / PREBI – Argentina News**

Marisa Di Giusti, Coordinator of the Proyecto de Enlace de Bibliotecas (PreBi) DLL Chapter at the Universidad Nacional de la Plata in Argentina, and her staff, have officially launched the Prebi Portal. We invite you to visit their site:

<http://sedici.unlp.edu.ar>

Some of the most important recent news are:

1) There are many new Universities that installed Celsius (Panama, Venezuela, Colombia) and the project staff dedicates too much time to answering questions and assisting with the installation. We need to open a space not to give them a class, but so that any member can ask about the system operation.

2) Since many Celsius stations have been installed it is indispensable to coordinate a certain standard, which would constitute the avant-premier of Celsius Net, for this not only we need librarians but people with experience in informatics. We must operate with a statistical globe, this implies that we must coordinate denominations: University, school, department, etc. We must define the Directory – so to speak – of Institutions, how to update it, the licenses, etc.

3) We are working very hard at La Plata in the issue of normalization of titles, and we need a strong participation of librarians with expertise in technical processes. We will present our work which deals with all of the titles that we request be normalized with subject, editor, and existences data, but this requires constructive criticism from knowledgeable people.

4) I wish to open a strong debate related to the normalization of proceedings and congress minutes information, since they appear differently in each of our libraries.

5) PrEBi is still working the digital theses issue, together with institutions in Brazil that develop it, as are USP, UNESP and UNICAMP.

### **UNM – Digital Libraries Linkages - Humanities proposal**

The primary objective of the REDD Humanities Proposal is to make the project manageable, given time constraints and resources. The first step is to conduct a brief survey of the faculty at UNM to find out what kinds of material are needed by the faculty and graduate students in the Latin American Studies program and in which languages they do their primary research, other than English. We believe that faculty and graduate students can best benefit from material in history and literature. Additionally, UNM has a strong interest in:

- Labor movements in Latin America
- Legal and human rights issues
- Non-governmental organizations
- Political science
- All of the above, with a particular emphasis on Mexico.

We expect that we will need to add at least two universities from Spanish speaking countries, one of which should be in Mexico. Other potential participants are in Colombia or Peru.

Initially, we suggest a pilot project that involves a limited number of faculty and graduate students from each participating university:

- 10 faculty and 10 Doctoral students at each of the Latin American Universities, for a total of 160 (if there are 6 participating universities).
- 10 faculty and 50 graduate students from UNM, for a total of 60. This number is lower because it is less likely that they will have high demands for material, as UNM has the third largest collection of Latin American material in the U.S.

This will ensure that we can do sufficient training and follow-up with each researcher. The start date will have to be delayed so that we can negotiate with the additional institutional participants, as well as receive feedback from UNM faculty. We will keep our DLL members updated through the Web page.

### **DSpace**

The Dspace software, developed by MIT, manages documents of any type in a repository. It has also been selected as the official platform for ISTEAC related projects. For more information on this

software, please visit:  
<http://dspace.istec.org>  
<http://chipsnsalsa.istec.org>

### **News from Red de Bibliotecas Digitales Mexicanas (Rebidimex)**

The "Red de Bibliotecas Digitales Mexicanas" (ISTEC - REBIDIMEX), is a regional block that operates within the Digital Library Linkages (DLL) initiative, and has some of the following main goals:

- Digitalized information exchange
- Interlibrary loan
- On-line catalogues
- Institutions directory
- Academic gatherings
- Internet databases
- Internet digital libraries

We wish to formally invite all ISTEC members in Mexico to participate in the discussion forums and to collaborate with Prof. Salvador López Leal, who is leading these efforts, by visiting:  
<http://tariacuri.crefal.edu.mx/rebidimex/servicios.html>

### **Communication to the users of the portal "Código Livre" and to the Free Software Brazilian Community**

In January 8, 2001, Univates, a University Centre in the South of Brazil, made available to the community its free software cooperative development environment, the Código Livre Portal (<http://codigolivre.org.br>). At the beginning, Código Livre (CL) was completely based on SourceForge software, and now it is a fork with a whole set of different tools.

CL hosts more than 500 projects, maintained by more than 4,000 individuals, and is now being moved to the University of Campinas (Unicamp) in the state of São Paulo, to a bigger server and broader bandwidth. Unicamp and Univates will administer the portal together.

Our experience with more than three years with CL has showed us it can be expanded in a way it can host not only free software projects, but also all kinds of free knowledge projects. Besides this, as we have developed our software development framework, Miolo, we started dreaming of a new, simple, dynamic, distributed and scalable CL portal.

We noticed the needs of groups of individuals, enterprises and institutions to have a group of tools that would ease co-operative software development and the sharing of all kinds of information. We believe it is possible to joint these needs into a standard, generic environment, where all needs can be met. This is why we are sharing here our small RFC (Request for Comments), where we express our needs and wills (and also some others needs and wills we got to know), hoping to hear from the community what would be good for our next CL, and also hoping to have more help on the development of it. CL2 will be the environment used by Solis, our Free Software Co-operative ([www.solis.coop.br](http://www.solis.coop.br)) in the development of its projects. Please use the address [cl2@solis.coop.br](mailto:cl2@solis.coop.br) for your suggestions.

**\*What will CL2 be?\***

A portal hosting all kinds of free knowledge projects, with a user interface that can be as simple or

full-featured depending on the project maintainer and its user needs. Different features may be added, as the project requires them.

**\*Example 1\*: Creating a Manual**

The one who wishes to create a free Manual of any kind will register into the portal and select what kind of project one wishes to initiate. One will receive the information that anything hosted by CL2 will be freely available to the general public, accordingly to the licenses issued by the Free Software Foundation (GPL, LGPL and FDL). One must agree with this in order to follow on. One will receive a couple of instructions and a "Wizard" will help him selecting the best interface for ones project, and the tools available for it. In this case, probably a Wiki, a website building tool and a mailing-list manager.

**\*Tools\*:**

- Fred Content Management System (available - <http://fred.codigolivres.org.br>)
- Miolo-Wiki (available - <http://miolowiki.codigolivres.org.br>)
- MailWoman (a simpler Mailman/Majordomo type of list manager, under development)

A similar example would apply when one wishes to create a book, an on-line newspaper, etc.

**\*Example 2\*: Initiating a Free Software Project**

The one who wishes to create a free software project of any kind will register into the portal and select what kind of project one wishes to initiate. One will receive the information that anything hosted by CL2 will be freely available to the general public, accordingly to the licenses issued by the Free Software Foundation (GPL, LGPL and FDL). One must agree with this in order to follow on. One will receive a couple of instructions and a "Wizard" will help him selecting the best interface for ones project, and the tools available for it.

**\*Tools\***

- Fred Content Management System (available - <http://fred.codigolivres.org.br>)
- Miolo-Wiki (available - <http://miolowiki.codigolivres.org.br>)
- MailWoman (a simpler Mailman/Majordomo type of list manager, under development)
- Scotty Call-Center and BugTracking system (available - <http://scotty.codigolivres.org.br>)
- Project Management (under development by Unicamp\_
- CVS
- RAU-TU knowledge base building system (available - <http://www.rau-tu.unicamp.br>)

**\*Example\*: Building a "support community" for an existing free software project or product.**

As above, the user can choose, for instance:

- RAU-TU knowledge base building system (available - <http://www.rau-tu.unicamp.br>)
- Scotty Call-Center and BugTracking system (available - <http://scotty.codigolivres.org.br>)
- Miolo-Wiki (available - <http://miolowiki.codigolivres.org.br>)

**\*CL2 structure\***

CL@ will be built on top of the Miolo Framework, (<http://miolo.codigolivres.org.br>), allowing:

- The data and projects database to be distributed among the institutions wishing to host the environment (regardless of this distribution, users will have a unique view of the whole system, as if it was a single entity);
- Database replication for fault-tolerance;
- The possibility of creation of independent (or semi-independent), self-contained, controlled CL2 corporate environments;
- The possibility of integration of new modules or features;
- Advanced searches enhanced by dynamic and assisted metadata creation through the usage of standards of each project and its components;
- Complete i18n interface allowing the same features and searches in different languages, automatically detecting the language preferences of the user;
- Semantic and ontology mechanisms which will produce meaningful significance in any language the CL2 portal is searched, regardless the search language and the original language of a given project.

\*Some more thoughts\*

We believe that once given opportunities and tools, the human knowledge will manifest and intensify in a form of a collective, planetary intelligence, so well described in the writings of Pierre Lévy. Existing systems such as Sourceforge and its siblings such as Código Libre have provided a collaborative environment for a specific manifestation of human knowledge: computer software. CL has hosted interesting manifestations of other kinds of human knowledge, which we believe can be reproduced and intensified. Although the semantic web, with new proposals for ontology and significance of multimedia information is still in its early stages, we believe the Miolo Framework was built with enough room to accommodate this new CL2 project, and we invite everyone to contribute with new ideas, code, and resources.

Nowadays, Solis and Univates are the ones betting on CL2, and we hope more people will join us. Please write to: [cl2@solis.coop.br](mailto:cl2@solis.coop.br) for more information.

### **Announcement of the Creation of a Discusión list in Spanish for Código Libre - GNUTeca**

In 2003, and thanks to UNESCO's support, we officially launched our efforts to offer GNUTeca in Spanish, initially through a workshop that was offered in Montevideo, Uruguay, and later in Chile. Additionally, we have made initial contacts with a number of other Spanish speaking countries.

Our intention with this notice is to invite you to take part in the gnuteca-spanish list (<http://server.codigolibre.org.br/mailman/listinfo/gnuteca-esp>) with the purpose of improving our communication and to coordinate efforts in future Spanish GNUTeca developments (Ñuteca??).

The online registration should be done directly by the user, following the instructions in: (<http://server.codigolibre.org.br/mailman/listinfo/gnuteca-esp>). If you have any problems, please let us know by writing to: [pablo@solis.coop.br](mailto:pablo@solis.coop.br). I also ask that you please forward this information to any pertinent discussion lists or other people that may be interested in this project.

Sincerely,

Cesar Brod  
Vice-Presidente  
Solis, Cooperativa de Soluções Livres

**DLL continues to investigate and evaluate online Masters degree programs in Library Science and Information Science that could be of benefit to our Library and computer science members.**

Online Masters in Library Science degree from Clarion University of Pennsylvania

A unique online master's degree in library science focusing on the needs of rural and small libraries has been launched by Clarion University of Pennsylvania, with the first classes being offered spring of 2004. "The launching of this new program is both exciting and timely as it coincides with the 25th anniversary of the founding of Clarion's internationally-known Center for the Study of Rural Librarianship ([www.clarion.edu/rural](http://www.clarion.edu/rural))," according to Dr. Andrea Miller, chair of the Department of Library Science ([www.clarion.edu/libsci](http://www.clarion.edu/libsci)). Citing the professional leadership provided by the Center for the Study of Rural Librarianship, Miller noted that the Center recently inaugurated librarianship's newest professional association, the Association of Rural and Small Libraries (<http://arsl.clarion.edu/>). She said that research sponsored by both the Center and the Association will inform and guide the coursework offered in the Web-based degree.

The first two courses in the all-Web M.S.L.S. will be offered beginning January 2004. These courses will be LS500: Information Sources and Services, and LS504: Introduction to the Information Professions. LS500 will be taught by Dr. Bernard Vavrek, director of the Center for the Study of Rural Librarianship, and LS504 will be taught by Dr. William Buchanan.

Clarion's M.S.L.S. degree has been continuously accredited since 1973/74. The department underwent an accreditation review by the Committee on Accreditation of the American Library Association in the spring of 2003 and received another seven-year accreditation at the annual ALA meeting in Toronto this past summer. Miller noted that in the spring of 2005 the department will launch a second all-Web M.S.L.S. degree option exclusively for school library media certification students. Like the degree option for rural and small libraries, the school library media coursework will be guided and informed by another of the department's research entities, the Institute for the Study and Development of School Library Information Centers (<http://jupiter.clarion.edu/~amiller/instituteweb.html>).

Applications are now being accepted for both all-Web M.S.L.S. tracks. For additional information, call the department's toll-free number (866.272.5612) or visit its Website at [www.clarion.edu/libsci](http://www.clarion.edu/libsci) or contact:

Dr. William Buchanan  
Professor  
Department of Library Science  
Clarion University of Pennsylvania  
814.393.2447 (office)  
814.393.2150 (fax)

**University of Minnesota Libraries Software Release:  
LIBDATA: LIBRARY WEB MANAGEMENT SYSTEM  
December 1, 2003**

The University of Minnesota Libraries (Twin Cities) announces the open source software release of

LibData: Library Web Management System. LibData is a library-oriented web-based application consisting of integrated database architecture and authoring environment for the publication of subject pathfinders, course-related pages, and all purpose web pages. This application was designed for, but is not limited to, academic and public libraries. LibData was built with open source components (Apache, MySQL, and PHP) and is being offered as open source to the library community under the GNU Public License. The software and its extensive documentation can be downloaded from Plato, a test foundry for the Libraries' Digital Library Development Laboratory (<http://plato.lib.umn.edu/>) and soon on SourceForge (<http://sourceforge.net/projects/libdata/>). For more information, please contact John Butler ([jbutl@umn.edu](mailto:jbutl@umn.edu)), Director, University Libraries Digital Library Development Lab, or Paul Bramscher ([brams006@umn.edu](mailto:brams006@umn.edu)), LibData Lead Developer.

#### Software Description:

The goal of publishing dynamically generated library web pages through a system that integrates easy-to-use web authoring tools with a large database of information resources led the University of Minnesota Libraries to build LibData. Like many large research libraries, Minnesota provides access to thousands of resources, both licensed and freely available. Access is presented to user in numerous ways, including through the Libraries' web site, subject pathfinders, and course-customized library web pages. LibData's master database --which offers a framework for containing records for resources, services, library locations, staff, and more -- was designed to allow for easier management of these resources and their rapid retrieval and incorporation into the variety of web presentations that librarians create for users. LibData currently offers three distinct page authoring tools useful to both novice and expert librarian users:

- \* Research QuickStart Subject Builder (for subject pathfinders)
- \* CourseLib (for customized course-related pages)
- \* PageScribe (for free-form, all purpose pages)

These tools are tightly integrated with the main database, making resource management easier to control, and ensuring that library users receive well-managed, current information. LibData also features a robust staff management system, user and page statistics, and complete customizability and extensibility.

LibData was successfully moved into production at the University of Minnesota Libraries during the summer and fall of 2003. The Libraries' instance uses a central authentication and security mechanism (campus-wide .x500 directory), and has some additional functionality for enterprise portal connectivity. LibData's thorough documentation and easily understood source code greatly enables this sort of localization and integration. Through this open source release, the development team invites the library community to build on the foundation of LibData v.1.0 and share in its future growth and development.

## **RESEARCH & DEVELOPMENT LABORATORIES**

### **GOALS FOR 2004, from the ISTE 2003 GA**

#### **A. Expand Special Discount Program**

- Metrowerks/Motorola Products (CodeWarrior Development tools, Hardware, etc.)
- Hardware Donation (Equipment available at ISTE)

#### B. Voice over IP ISTEK Network

- Unlimited free calls within the Network
- Low Cost for call outside the network (Any where in world)
- The beginning of “ISTEK – Communication Services”
- Allow better communications at a very low cost (~30% less)
- Develop Web based course materials for a web-based tutorial format under the C&S platform
  - DSP: Theory and Practice—CUAO
  - VHDL tools (Xilinx)—PUJ-Cali
  - Wireless—UNM
  - DSP/VHDL—USF
  - Automation and Control—USF
  
- Development of Design Centers for EDA Tools
- UNM/USF/UNJ

#### C. Proposals: Professional Development Series

Mission: To provide students, educators and researchers direct access to state-of-the-art instruction for use in teaching advanced technological concepts and experimenting with new techniques.

#### D. Continue Strengthening the Development Teams

- CUAO
- USF
- UNM
- PUJ-Cali

#### E. Proposed Activities, 2004

#### F. Tentative Technical Events

- July 2004, Panama/Bolivia, PASI
- August 2004, CUAO, DSP
- October 2004, Universidad de Puerto Rico, Mayaguez, Nano-technology
- September 2004, Universidad de Carabobo, VHDL-DSP

#### **Brazilian “Software Livre” Group**

We want to disseminate the creation of a service whose main purpose is to inform ISTEK members about the availability of free software product developed by our community.

The service is located at: <http://www.rau-tu.unicamp.br/istec/sourcewell>.

In order to use this service it is necessary to be previously registered. It is important that every publication be identified. We want people to feel free to use this system as they wish and that they help us to disseminate this information.

We wish to exchange ideas and help each other in the development of free software packages.

## **Sun is developing a 3-D user interface technology written in Java under the name Project Looking Glass:**

Sun Microsystems, thru his Global Manager Libraries/e-Learning, Mr. Kevin Roebuck, are interested in facilitating a small working group to pursue digital library & e-learning environments' application. They would like to know if anyone has particular expertise in Java 3-D or user interface design and would like to participate in this working group. For further information, please contact Kevin at (650)786-5440 or via his email: [kevin.roebuck@sun.com](mailto:kevin.roebuck@sun.com)

[http://www.sun.com/software/looking\\_glass/](http://www.sun.com/software/looking_glass/)

### **ISTEC Telehealth Initiative**

Talks/meetings have continued in regards to the ISTEC Medicine / Health Initiative. During the past General Assembly, a meeting was held were among the participants, where the following coordinators were appointed:

Dr. Carlos Callegari, Dean of Health at the University of Carabobo in Venezuela, as the main leader of this effort.

Dale Alverson – Professor of Neonatology at the University of New Mexico – was appointed as a Coordinator in the Area of Telemedicine to Rural Areas.

Nancy Orihuela - Universidad Nacional de San Agustín de Arequipa in Peru – named Coordinator in the Development of Hardware/Software.

Hernando Baquero – Universidad del Norte – Colombia – Coordinator of Glossary

Carmen Ricardo – Universidad del Norte – Colombia – Coordinator Tele-Education.

Further meetings have been held locally supporting this Initiative. A recent meeting had the attendance of key players from the UNM School of Medicine and from the UNM Anderson School of Management. An action plan will be disclosed shortly.

### **NSF Press Release**

Some of you might be interested in reading an NSF Press Release on “Open-Source Practices May Help Improve Software Engineering” (work of W Scacchi, UC-Irvine). Scacchi is documenting how open-source development breaks many of the software engineering rules formulated during 30 years of academic research. This press release is available at:

<http://www.nsf.gov/od/lpa/news/03/pr03132.htm>

## **LOS LIBERTADORES**

### **GOALS FOR 2004, from the ISTEC 2003 GA**

- 1. IT CHALLENGES PROGRAM UPDATE
- 2. CREATE, ENHANCE AND STRENGTHEN STRATEGIC ALLIANCES
- 3. IEEE PARTNERSHIP (SEE ANNEX B)

- 4. CHIPS N SALSA PROJECT

### **WITS Group**

As promised to you during last General Assembly, ISTECS has initiated talks with NORTEL and ProQuest in regards to the purchase of equipment and related devices for infrastructure development in the Institutions members of ISTECS. We have already disseminated information on the ProQuest and WitsGroup proposals.

### **Donation**

INTEL, Inc., thru its Albuquerque offices, donated an AMRAY Scanning Electron Microscope, which was used in their microelectronics factory in Albuquerque, to ISTECS. Since INTEL recently acquired more modern equipment, it was in turn donated to the University Pontificia Universidade Católica do Rio Grande do Sul in Brazil to be used in their research laboratory. This equipment is valued at approximately 250,000.00 USD.

### **New Mexico Initiatives / UNM Advisory Board**

As agreed in previous Board of Directors Meeting, one of the most important priorities in 2004 is to maintain the level of support currently provided by the State of New Mexico. In order to create the right strategic alliance and to make the best use of our resources, the VP for Strategy and Planning and the Executive Office have begun a process to create a NM Advisory Board with the preliminary participation of the following groups:

The University of New Mexico:

Presidency, Anderson School of Management, School of Medicine, Electrical Engineering, Computer Science, Latin American and Iberian Institute and the Computer Information Resources Departments.

NM Consultants: Dick Forbes, Michel Messeca

WitsGroup – Luay Shawwa

Local organizations: American Friends Service Committee (AFSC), Los Alamos National Laboratories (LANL), Sandia National Laboratories (SNL), City of Albuquerque, National Indian Telecommunications Institute (NITI), etc.

This initiative will consist in efforts to collaborate with local groups for regional ITC development. ISTECS will also co-sponsor some important international events to be hosted in NM. Please visit the ISTECS website for additional information.

### **Sun Grid LA**

#### **GRID-LAC**

With the support of Sun Microsystems, a group of ISTECS members (UNM-EEUU, ITESM-Mexico, USP-Brazil, ULA-Venezuela) are launching the creation of a Latin American Grid. The intention is to create a ubiquitous computing service that covers all of the ISTECS members. Thusly, any member will be able to use information or scientific computation services and the Grid will provide it to them. Grey technology provides the idea of an electric potency grid, the user does not care to know which equipment provides the service, the only interest is in knowing that the service is provided.

The first applications will be related to bio-informatics and biotechnology, and knowledge

management. The latter one will support the Chips & Salsa initiative, which ISTEAC is also launching. This group has planned a meeting during the events to be celebrated in Campinas next May, with the participation of IBM in their efforts to continue this project.

## **ADVANCED CONTINUING EDUCATION**

### **GOALS FOR 2004, from the ISTEAC 2003 GA**

- Create a work program for an event that should be held at UNAPEC-in Santo Domingo, Dominican Republic. The purpose will be to assess their needs and solutions in order to deploy distance education programs, as well as continuing education. The event has been requested and they are trying to gather some funds to help develop and implement such an event. The date and time has not been decided as of yet.
- Under the ACE Series “Formación de Formadores”, La Universidad Católica de Valparaíso in Chile, has requested we create a work program to organize an event that would train their faculty members in the Facultad de Ingeniería to develop and implement online courses. Their commitment to create these workshops is also depending on the budgets issues for the present year. However, they have requested we get them in line for a planned event. The date and time has not been decided as of yet.
- July 2004, Universidad del Norte – Barranquilla and the G10 (Group of the 10 Colombiano). A Technology event applied to distance education organized by UN in cooperation with the Universidad Autónoma de Occidente UAO. The event should be programmed for the duration of 5 days maximum.
- Universidad de Carabobo -Valencia, Venezuela. Requested that ACE cooperate in the organization of an Instructional technology event for academia faculty members of the School of Medicine. Date and time is being defined as of now.
- Evaluation of TELEDUC and Chips and Salsa will take place with the cooperation of the Universidad del Norte, Barranquilla, Colombia and Universidad Autónoma de Occidente UAO, Colombia to further advise on the use of this software as an initial platform for Course Management System.
- More evaluation of Free Software should take place this year to find solutions against the overcharged commercial products for distance education platforms.

## **OPPORTUNITIES**

### **NASA**

The NASA Center for Distance Learning, the Institute of Electrical and Electronic Engineers (IEEE), and Christopher Newport University announce the VINNY; award. Named in honor of Leonard da Vinci, a man famous for the creative use of science, technology, engineering, and mathematics to solve human problems and designed to help heighten and increase awareness of science, technology, engineering, and mathematics (STEM), the VINNY is a global video competition.

Teams of students research a common global problem and how STEM can be used to solve it. They then produce a 1-minute video presenting the results of their research. Registration is now open to K-12 (pre-college) teachers and students worldwide. You can find out more at <http://vinny.pcs.cnu.edu>.

Or contact: Randall Caton  
NASA Langley Research Center  
Hampton, VA 23681-2199  
Voice: 757-864-5032  
FAX: 864-8835  
Email: [rcaton@cnu.edu](mailto:rcaton@cnu.edu)  
Web: [www.pcs.cnu.edu/~rcaton](http://www.pcs.cnu.edu/~rcaton)

### **Form for events**

For those who might be interested in requesting logistic and financial support from ISTEAC to coordinate workshops and training sessions, the EO / R&D Group has created an event request form to facilitate and expedite this process. The EO will collaborate in identifying an experienced professor and the grant will cover his/her honorarium. Please note that only ISTEAC members will be able to apply for this program, and that, especially during the current financial hard times, funds are very limited. The deadlines to apply are:

First Semester - July 1 thru 30 of the previous year  
Second Semester - Jan 15 thru March 15 of the same year

In order to receive any type of support, your institution's membership status must be in good financial standing. Shortly, you will be able to download this information from [www.istec.org/r&d](http://www.istec.org/r&d). For more information on these development series, please contact the Executive Office at: [info@istec.org](mailto:info@istec.org).

### **From Pontificia Universidad Católica, Peru**

The Pontificia Universidad Católica del Perú announces an ambitious and innovative new project: Series of Field School Programs, which provides students in United States institutions with the opportunity of being part of their academic Institution for a period of six weeks. Participating fields include Archeology, Telecommunications, Geography and the Environment, and Ethnomusicology. For complete details, deadlines and schedules, please contact their web page at [www.pucp.edu.pe/dric/fieldschool](http://www.pucp.edu.pe/dric/fieldschool) or [fieldschool@pucp.edu.pe](mailto:fieldschool@pucp.edu.pe)

### **From Corporación Universitaria Autónoma de Occidente (CUAO), Colombia**

The Corporación Universitaria Autónoma de Occidente (CUAO), from Colombia, has sent its proposal of International Academic Mobility for Undergraduates of ISTEAC Member Universities Project. This proposal aims at joining industrial members in the task of Science and Technology knowledge formation of professionals. Similarly, ISTEAC has among its industrial members 23 businesses, which could be invited to join the task of formation of professionals that Universities have. We will send more information as it becomes available.

### **Universidad de Málaga Announcement, Spain**

The Universidad de Málaga, through Prof. José Cárdenas Cadierno, inform about the opportunity of doctorate degrees and agreements within an inter-university framework. For more information, please contact José Cárdenas Cadierno: [cardenas@ctima.uma.es](mailto:cardenas@ctima.uma.es)