

## Cuba and the computerization of the “Servicios Jurídicos”

***Abstract :** With the continuous growth of the population, increase in demand for the “Servicios Jurídicos” ( similar to the Court Service in our judicial system) and the need to hasten the legal procedures and give a better service, over and above the notable(?) need to make technological advances available in every part of the country, the project “Red Ciudadana” (Citizen’s Network) for the computerization of Cuban Legal Services.*

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Introduction.

There is practically no sector of Cuban society that is outside of the accelerated process of computerization that exists today in Cuba, for that reason, computerization of the Legal Services is starting to become a real event in Cuba. In order to implement this work, a ‘Citizen’s Network Project’ has been created for the computerization of the Legal Services and to bring this to the country. This same Project will be extended in the whole national territory. Said project initially began with the computerization and connection between five of the municipalities from the Guantanamo Province. This project has served as an experimental base from which it will be subsequently extended to all municipalities and province capitals of the country, reaching even the most deserted and mountainous regions of Cuban geography. The development of the I.T. bases “Grupo de Software” (Software group), in order to automate all Legal Services offered by “Direcciones de Justicia”, is being developed in the “Universidad de Ciencias Informaticas de Cuba, (UCI)” (the university in Cuba which specializes in Information Technology). A high quality of programming and software design are thus guaranteed. With the implementation of this project, an increase in the quality of the Legal Services and rapprochement to peoples who live in far-off territories has been achieved.

## **1. The Citizen's Network 'Red Ciudadana' Project as a means to insertion into the Cuban Society IT Programme**

Cuba has, from the beginnings of the revolution, identified the convenience and the need to dominate and introduce Information Technology and Communications in social practice and to achieve a digital culture as one of the essential characteristics of modern man. This would facilitate Cuban society to get even closer to an objective of sustainable development. For this, the "Proyecto de Desarrollo" (Development Program<sup>1</sup>) has been created, which has as its foundation social justice, public participation, equality and solidarity. The application of strategies has been designed and started, which allows knowledge, information technology and communications to be converted into instruments which are at the disposition of the advances and profound revolutionary transformations, consisting of:

- Boosting the massive use of new Information Technology and Communications in favour of the development of the national economy, the society and service to the citizen. Special attention is given to the development programs for national infrastructure for telecommunications both fixed and mobile.
  
- Boosting the development of the National Industry of New Information Technology with excellence (I.T., Communications, both Electronic and Automatic), taking into account that, as a rule, feasibility of using products and services of national industry in view of adequate loan, quality, time and price options will have to be contemplated.

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<sup>1</sup> <http://www.monografias.com/trabajos24/informatizacion-cuba/informatizacion-cuba.shtml>  
Impacto de la Informatización en la Sociedad Cubana. Ciencia, tecnología y Sociedad.

- Facilitating every type of project from the government organisms, departments of the government or institutions, directed at supporting the computerization process towards the *interior or exterior* of the same, and that they would contribute to the development of the “Programa Rector de Informatización de la Sociedad.”
- Promoting the extended use of E-mail and the development of corporate intranets. The increase in virtual networks about the already existing infrastructure in Cuba is recommended, by means of the principal providers of public services.
- Encouraging the expansion of projects that should speed up and make the procedures of the different processes more efficient and that should enable first hand access to information for citizens; as is the case in relationships between the Organisms of the Central State Administration, the business sector and the governmental departments. Driving the development of service information applications to the exterior, encouraging the use of Web technologies, as much for the global network as for the Cuban Internet.
- Stimulating Electronic Business as one of the new forms of work and decmercialization. Boosting projects, that promote development of information contents and services in which achievements of the Revolution and its main social programs are circulated, making use of modern technology.

These, amongst others, are some of the “Políticas a seguir” (Policies to follow<sup>2</sup>) for computerization of Cuban society and they have a final aim of being able to bring the possibility of having access to Information Technology and

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<sup>2</sup> <http://unpan1.un.org/intradoc/groups/public/documents/CARICAD/UNPAN008420.pdf>

Policies to follow for the of the Computerisation of Cuban Society.

computerization of public services, companies and Cuban organisms to every corner of the Island and for every citizen. For that reason, the Citizen's Network project forms a part of this said process of computerization.

## **2. Beginnings of the Project.**

This project arises from the needs, identified by the population and the "Comunidad Jurídica" (Judicial Community), to have access to all public services and to legal documentation from any geographical location, the need for a quicker procedure turn around time and availability of legal certificates, such as Birth, Death, Divorce Certificates and others. There is also a need to quicken up further services that normally take up to a fortnight to give back an answer, like for example the "Antecedentes Penales" and the releasing of "Certificados de Actos de Ultima Voluntad". In the beginning, the majority of the Legal Services were only available in the Provincial Capitals, later, extensions of some of these services to the majority of the municipalities were created, but even still, it was still a problem because the time taken to give an answer to any of these procedures resulted being excessive. Stepping aside from these problems, the idea arose of creating a project through which, with the implementation of Information Technology, it would be possible to solve all these existing problems.

The proposal was brought about initially in the province of Guantanamo which, from the point of view of access, with 75% of its territory being mountainous, brings with it the problem of having many difficult to access areas. Added to this characteristic is the difficult transport situation, which complicates communication between municipalities and makes the transferal of people to the provincial capital difficult. This unfavorably has an effect on the access of the people to legal services, with the consequential excessive delay of any process or procedure of this nature; this is how and why the "Proyecto de red Ciudadana" (Citizen's network Project) arises. For this said

project to be possible funding was necessary, which was given by the “Fondo Financiero para las Tecnologías de Información y Comunicación del PNUD (Programa de las Naciones Unidas para el Desarrollo)” and was called through their “Programa de Desarrollo Humano Local<sup>3</sup> (PDHL/CUBA), an organization created for the decentralized development of Projects.

### **3. Benefits of the Project.**

This is one more of the projects that the country’s “Dirección de Informática Jurídica” (Management of Legal I.T.) has developed for the computerization of legal activity and the insertion of said “Sector en el Programa Nacional de Informatización de la Sociedad Cubana” (Sector in the National Program of the Computerisation of Cuban Society).

With the development and the putting in place of the same various achievements have been made, like, for example as MSc. Yarina Amoroso, the project director and president of the “Sociedad de Informática de la Unión Nacional de Juristas de Cuba” (I.T. Society of the National Cuban Union of Legal Workers), said in an interview “...*the project was capable of adding to the contribution of Italian funds and assessments by universities in Belfast (Northern Ireland), Zaragoza (Spain) and Munster (Germany), we have managed to facilitate that the citizens are able to satisfy their documentary needs, while at the same time we incorporated into the province a superior management capacity. The success in Guantanamo shows that the success is possible in the rest of the country.*”<sup>4</sup>

Other benefits of the project are having the possibility of having access to e-mail at the disposition of all our legal operators, systematic reception of “Gaceta

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<sup>3</sup> <http://www.undp.org/rblac/wssd/documents/cuba.PDF>  
PDHL/CUBA

<sup>4</sup> [http://www.undp.org/cu/noticias/enet\\_sp.html](http://www.undp.org/cu/noticias/enet_sp.html)  
Article about the project “Citizen’s Network”, Interview to Yarina Amoroso project director.

Digital” which also helps to raise the level of preparation of the aforementioned people. Access to internet increases the potential sources of information for self preparation and development for post-graduate, masters and Phd students in Cuba. All of this will be a big leap in technological advances for the “Comunidad Juridica Cubana” (the Cuban Legal Community), for with these possibilities the potential of each legal person in Cuba is increased, communication between them is improved and in this way allowing for a better team work from having the possibility to create electronic consultations, exchange up-dated documentations and research work, increasing the motivation to provide a better, more efficient and higher quality service, and at the same time increasing their academic and documental level aswell.

This said project also has as its missive, being yet another channel of disclosure for Women’s, Children’s and Teenager’s rights in Cuba. Besides favoring the preparation of 600 law operators to lending a specialized and highly qualified legal service to the population, developing tools for online work. Qualifying the population, in particular women children and vulnerable groups, in the knowledge of their rights and in the techniques needed in order to access information and computerized legal services.

The acquiring of latest technology, placement of modern computers and equipment and installation of a modern computer network for centralized work in all offices belonging to this said project has also been possible.

#### **4. Development, Assembly and Administration of I.T. Bases using “Free Software” technology.**

The technological bases of this project have been created solely by using “Free Software”, taking into account its advantages as we can use it without having to incur into any fees or inform a proprietor.

We have chosen PHP and MYSQL as development Web-oriented platforms; in other words, the final product can be visualised on any working platform (Operating System). Currently, only the servers are operating in Linux, but in future stages the work stations will too, because it is a powerful, secure and reliable Operating System. The software will be implanted in provincial nodes with free operating systems (GNU/Linux) –preferably Debian<sup>5</sup>, White box<sup>6</sup> and Apaches<sup>7</sup> Web servers- linked to a web where these dynamic sites will be published with centralised databases accessible to any user (Judicial Operators).

The development of the Software group with which Judicial activities such as Register Offices, Notary services, Property Registers, Consultancy, etc., has been carried out in the Universidad de Ciencias Informaticas de Cuba (**UCI**), where several teams of specialised programmers have worked on the development of free software systems. Thus we can expect to get a package of great design quality and programming.

### ➤ What is Free Software?

“**Free Software**<sup>8</sup>” refers to the freedom users have to run, copy, distribute, study, modify and improve the software. More precisely, it refers to the four freedoms users have:

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<sup>5</sup> <http://es.wikipedia.org/wiki/Debian>

**Debian** or, more appropriately, **Debian GNU/Linux** is a [Linux Distribution](#), based upon the principles and objectives of [free software](#). Created by the [Debian Project](#) in 1993, the organisation responsible for the creation and maintenance of its [distribution](#), centred on [GNU/Linux](#) and [GNU](#) utility programmes.

<sup>6</sup> <http://www.whiteboxlinux.com>

*White Box Linux, this project consists in "providing an RPM-based distribution compatible with RedHat Linux ..." and in order to obtain this, all the packages in code language that RedHat releases from [RedHat Enterprise Linux 3.0](#), have been compiled. Thus, broadly speaking, we get a 'freely' available [RedHat Enterprise Linux 3.0](#)*

<sup>7</sup> [APACHE](#) is the Web page server. A Web page server is a programme to get access to Web pages in a PC.

<sup>8</sup> <http://pulsar.unizar.es/gluz/manual-sl/index.html>

Historia y Cultura del Software Libre.

- The freedom to use the programme irrespective of the purpose
- The freedom to study how the programme Works and to adapt it to their needs. Accessing the programme in code language is a necessary condition.
- The freedom to distribute any copies, which can be of help to other projects
- The freedom to improve the programme and publicise the improvements

The freedom to use a programme means that any person or organisation is free to use it on any information system, for any kind of tasks, without having to inform either the developer or a specific firm about this.

- **Why Linux?**

Linux is a well-known system given its versatility. Its use is widespread among Internet servers and powerful computers because it makes the most of all the available resources. Furthermore, it can be set up without a graphic system which usually slows down a computer. Also, it can be used as a desktop system to work or navigate, etc.

### **GENERAL ADVANTAGES**

- It is the fastest available system
  - It is free of charge
  - It is free to use
  - It is reliable
  - Advanced graphic environment
- **What does Linux have that Windows does not?**

There is nothing that can be done in Windows but not in Linux. That is, we can edit documents in Windows; so can we in Linux. We can edit web pages, use it as a server, listen to audio, watch videos, edit images, surf the Net, work, play,

etc. Moreover, Linux has a better graphic environment, it is more user-friendly, and it provides increasingly more professional solutions to office users, such as Openoffice<sup>9</sup>.

- **It is free of charge:** Linux installation programmes are available on different sites on the Internet<sup>10</sup> and can be downloaded at any time. It is completely free of charge.
  
- **It is more stable:** Linux, once it is set up will remain as such until it is set up again: it is never reset “by magic”. If a programme is installed, the operating system installation will never be lost. Furthermore, each time you switch on the computer, all the hardware will be detected. It never fails to detect a modem, mouse or any other hardware. Linux can crash, as any other piece of software, but it contains “millions of eyes” continually watching it over. It provides maximum stability.
  
- **It is Virus-free:** So far, there are no active viruses for Linux. If there were, they would probably not work, because of how the system has been developed. There are no Trojans and it is extremely difficult to break in. No Antivirus software is needed. Nevertheless, there are some Antivirus software for Linux given that GNU/Linux is widely used in servers to exchange files (for example, email or shared files servers). Consequently, it is useful to have Antivirus software for other systems.

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<sup>9</sup> This is one of Linux Word processors. It is a multi-platform programme, which makes it possible to set it up on different operating systems. It is fully compatible with Microsoft Office, which means that any file written in MS Office can be read in Openoffice. For further information, see <http://www.openoffice.org/> and download the install programmes free of charge.

<sup>10</sup> Some sites from where Linux distributions can be downloaded free of charge:

<http://www.linuxiso.org/>

<http://mirrors.azc.uam.mx/mirrors/redhat/>

<http://bulma.net/body.phtml?nIdNoticia=1971>

- **It is Free:** You can have a look ‘inside’ the programme, although if you are not a programmer it will not be of much use. Anyway, we need to bear in mind that more and more people use this system, and that even though anyone can see how it works, it is impossible that someone can spy on your data and send them to other firms or people.
  
- **It is more advanced:** Linux provides the necessary power to use our PC to its full. It is highly configurable and adaptable to any needs.

Many cost-free pieces of software can be used in Windows, but ‘cost-free’ is not the same as ‘free’. ‘Free’ means that it can be modified and adapted to the users’ needs and preferences. If the user is not a programmer, then the distinction between cost-free and free will probably not make much difference, but if the user is a person or firm which uses their systems intensively, it may be preferable that they use a more useful system by being able to change some options or to know its programming language in order to write new programmes without having to start from scratch.

There is a caption that sums it up: ***GNU/Linux has it all:*** stability, support and software. Besides, GNU/Linux is the key to keep our firms competitive, both technologically and economically.

## **5. Belfast’s Courts IT System (ICOS)**

During my stay in Belfast, I had the opportunity to visit the Courts, where I was given a thorough explanation about how its IT system works, and how it was developed and set up.

The computerisation of Belfast’s Courts started in 1987. The process began with a system for the County Courts (low courts) which helped hasten most clerical tasks. In 1995, similar systems were set up in the High Courts.

Despite their usefulness, a new system was needed –unified for all Courts and which could be used on-line. The main problem was that there were over 30 different and unconnected systems throughout Northern Ireland, which caused several problems such as:

- Delays in transfers of cases from one Court to another (this used to take several weeks)
- Multiple data entry for a same case, one for each point and stage
- Multiple register numbers for a same case, one for each point and stage
- Complex for users, which implied long, expensive and burdensome training

In order to solve these issues, a new unified system for all the Courts was developed. It runs on-line and in real time: ICOS (Integrate Courts Operation System - *Sistema Operativo Integrado de las Cortes*). The system was partially set up in 2002 and nowadays it is almost fully developed. It basically consists of a server and work stations, fully interconnected, which means that all the Courts in Northern Ireland are now linked to one single system.

This system is solving all the problems the Courts faced and it also gives the chance to persons and firms to make queries, start claims, obtain legally valid certificates, etc., totally on-line. It also incorporates a centralised database which contains all the cases that are being dealt with in all the Courts in Northern Ireland. Furthermore, there is a database of all the legal firms and practitioners registered in Northern Ireland, a database of all the valid addresses including name of proprietor/occupier –either a firm or individual-, and a database of all the main companies and public bodies which are more likely to be taken to the Court. These databases allow for more transparency and effectiveness in the whole process.

These data are kept in two servers which are physically apart one from the other in two high security buildings to preserve the physical integrity of the information; moreover, there are some back up copies on UNIX platforms.

In my opinion, this is a very complete management information system, of the highest security, from which we can draw a lot of experience. In Cuba, we have recently started to implement IT systems in our Judiciary system. Northern Ireland's could well be the mirrors our systems may reflect upon.