# **Information Communication Technology Adoption and Efficiency of Student Services**

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> Abstract - The study investigated the influence of information and communication technology on the efficiency of student services of Liceo de Cagayan University. The descriptive research used 20 service providers and 100 clients as respondents. As rated by the clients, the university obtained a satisfactory rating for its ICT practices in terms of system restructuring, system selection, ICT staff's skills and capabilities. For ICT applications, as rated by the service providers, the university got a satisfactory rating on functionality, availability, maintainability, and utilization. As to the efficiency of the different departments' student services, as rated by the service providers, the university got a very satisfactory rating for the Registrar's Office, Cashier's Office, Library, and Internet Services. The predictors of the efficiency of student services were ICT implementation in terms of timely provision of information to other providers with student support roles and ICT practices in terms of ICT as a tool for competitive advantage and survival, as a tool for testing and altering school's administrators' know-how to get things done in the existing system, and as a tool for day-to-day operation.

> Key words - ICT practices and application, effeciency of student services

## INTRODUCTION

Information Communication Technology (ICT) facilitates communication and the processing and transmission of information by electronic means. This broad definition encompasses the full range of ICTs from radio and television to telephones (fixed and mobile), computers, and the Internet (Cummings 2005). The revolutionary potential of Information Communication Technologies lies in their capacity to instantaneously connect vast networks of individuals and organizations across great geographic distances at very little cost. As such, ICTs have been key enablers of development, facilitating flows of information, capital, ideas, people, and products (Cook & Finlayson 1999). An explicit focus on using ICTs in pursuit of development goals allows countries to achieve a wide diffusion of benefits from ICTs and contributes to both broad-based economic growth and specific development goals (Giarola 2004).

Moreover, a holistic approach that sees ICTs as key development enablers recognizes that the potential of ICTs is linked to a complex mixture of international, national, and local conditions. Anumber of interrelated factors should be addressed to maximize the benefits of ICTs for development. These include deploying ICT infrastructure, building human capacity, establishing a transparent and inclusive policy process, creating incentives for enterprise, and developing appropriate content (Pearlson & Saunders 2005).

For all these to be realized, there is a need to understand the critical relationships between various strategic interventions in the context of local conditions and to secure the participation and commitment of all key stakeholders; local communities, non-governmental organizations (NGOs), the government, and the private sector.

The advantages offered by ICTs are the removal of barriers of space and time in learning, opening up of different languages and cultures of the world, and creation of a more equitable learning environment. ICTs provide a means for overcoming historically intractable problems of isolation, lack of access to information and knowledge, and crucial impediments to educational and socioeconomic development (Lucas 1997). ICTs have reshaped the educational landscape by transforming the content and modes of delivery/acquisition of learning as well as how the educational institutions operate (Kallick & Wilcon 2001). The ICTs in the form of hardware and software, network devices, communication and information system development (telephones, fax machines for transmittal of documents on

school to school basis), Internet, Local Area Network (LAN) to provide open communication among school employees, and software applications (Microsoft Word, Microsoft Excel, and MS-DOS programs) are the applications mainly used by the Liceo de Cagayan University.

#### FRAMEWORK

The independent variables included the existing practices of ICT, system restructure that examines and implements redesigned process of an organization, system selection or the procedure adopted in selected applications by ICT for the different vendors, and ICT staff's skills and capabilities that cover experience, training, and educational background. Other independent variables were the performance level of ICT implementation, which refers to how it is implemented; functionality, which refers to the number of ICT supported functions in the system; availability, which is the property that makes data accessible and useable upon demand by the user; maintainability, which is a process that characterizes the design and installation, expressed that an item will be restored in a specific condition in a given period of time; and utilization, which refers to the assessment of the extent that functions are provided to improve process performance, ease of use, and level of knowledge among users. These independent variables were hypothesized to impact directly the efficiency of student services.

The ICT performance level was assessed in terms of its functionality, availability, maintainability, and utilization. Determining ICT performance level also included the evaluation of hardware, software, and network components and services coordination with the service provider (Giarola 2004). Basically, the key components of successful ICT implementation are system restructure, system selection, and ICT staff's skills and capabilities (Lango 2005).

#### **OBJECTIVES OF THE STUDY**

The study aimed at assessing the university's extent of ICT practice and applications as predictors of the efficiency of student services of the Liceo de Cagayan University. Specifically, the study sought to answer the following objectives: (1) to describe the profile of the respondents; (2) to describe the university's extent of the ICT practices for student services; (3) to assess the university's level of the ICT applications; (4) to compare the ratings of service providers and clients on the ICT adoption; (5) to measure the level of efficiency of the student services of the

departments; and (6) to find the predictors of efficiency of student services.

#### **METHODOLOGY**

The descriptive research method was employed in the conduct of the study. Zulueta and Costales (2003) stressed that the descriptive method seeks to provide information about one or more variables and is used to answer the question "what exists?" The study used the correlation technique because it traced the relationship between the independent and dependent variables. The study was conducted at the Liceo de Cagayan University, specifically at the Registrar's Office, Cashier's Office, Library, and the Internet Services that use ICT in their daily operations. The respondents of the study were the 20 employees (service providers) and the students (clients) of the university. The employees use the ICT in performing their assigned tasks. The researchers used the list of office staff to determine the service provider respondents. The quota sampling was employed for student respondents. One hundred students were sampled proportionately by course.

Table 1. Distribution of respondents

Offi	ce	Clients	
Registrar's Office	6	Commerce	24
Cashier's Office	4	Engineering	8
Library	8	Nursing	56
Internet Service	2	Education	7
		Arts and Sciences	5
	Total 20	Total	100

The main instrument used in the collection of data was the standardized questionnaire on the implementation of information and communications technology. Part I of the questionnaire, which had two subparts, dealt with the respondent's profile. Subpart 1 pertained to the employees/service providers' profile in terms of educational attainment, field of specialization, number of inservice trainings/programs attended, and number of years in service, in-service trainings/programs attended, and services offered. Subpart 2 pertained to the clients' profile in terms of age, sex, course, and major. Part II dealt with the practices in ICT in terms of system restructure, system selection, ICT staff skills/capabilities, and editing practices of ICT; ICT applications in terms of functionality, availability, maintainability, utilization, performance level; and the efficiency of student services in the Registrar's Office, Cashier's Office, Library, and Internet Services. The instrument was adapted from "Survival of the Smartest and Do It Smart" as cited by Tiin, (2000), "Funding Guidance for Schools and Local Authorities"

by Bas (2003), and the Internet articles. The researchers secured from the service offices permission to conduct the study. The heads of the service offices were then requested to assist the researchers in the administration of the questionnaires to their staff. The respondents were given half an hour to answer the questionnaires, which were then retrieved immediately.

#### RESULTS AND DISCUSSION

Profile of the Respondents

Table 2 presents the profile of the Liceo service providers. As shown, the majority of the respondents were college graduates (15 or 75.5%), followed by those with units in the masteral study (3 or 15.0%) and those with units in the doctoral study (2 or 10.0%). In terms of field of specialization, more than half of the providers were computer trained when assigned to the office (13 or 65.0%). Only a very few earned a computer-related course such as information technology (4 or 20.0%), short-term computer course (2 or 10.0%), and computer engineering (1 or 2.5%). As to the service providers' number of in-service trainings/programs attended, majority of the respondents attended for 6 to 10 times (7 or 35.0%), followed by those who attended for 10 times or more and for 1 to 5 times (3 or 15.0%). However, there were a few (5 or 25%) who had not attended any in-service trainings at all. On the number of years in service, majority of the respondents have served for 1 to 5 years (7 or 35.0%), followed by those who have served for 6to 10 years (6 or 30.0%), 11 to 15 years (4 or 20.0%), and above 15 years (3 or 15.0%). The findings suggest the staff had limited ICT capabilities who are assigned in offices that utilize ICT in their services.

Table 2. Profile of Liceo service providers

Respondents Profile	Categories	Frequency	Percent
	College Graduate	15	75.5
Educational	College Graduate with Master Units	3	15.0
Attainment	Masteral Degree with doctorate units	2	10.0
	Total	20	100.00
	Computer Engineering (Comp. Eng'g.)	1	2.5
	Short-term Computer Courses	2	10.0
Field of	Information Technology	4	20.0
Specialization	Computer Trained when assigned to		
-	office	13	65.0
	Total	20	100.00
	1 – 5	3	15.0
Number of in-service	6 - 10	7	35.0
trainings/programs attended	None	5	25.0
	Above 10	5	25.0
	Total	20	100.00
	1 to 5 years	7	35.0
	6 to 10 years	6	30.0
Number of Years in service	11 to 15 years	4	20.0
	Above 15 years	3	15.0
	Total	20	100.00
	Overall Total	60	100.00

Table 3 shows the profile of the Liceo clients in terms of age. Majority of the respondents aged 19 to 20 years old (39 or 39.0%), followed by those who aged 21 to 22 years old (30 or 30.0%), 23 to 24 years old (15 or 15.0%), 27 to 28 years old (6 or 6.0%), 17 to 18 years old (5 or 5.0%), 25 to 26 years old (4 or 4.0%), and 29 to 33 years old (1 or 1.0%). In terms of gender, the female clients composed the majority (67 or 67.0%), while the male clients accounted for only 33 percent. As regards the clients' course, majority were Nursing students (56 or 56.0%). Only 24% (24) were Commerce students; 8% (8), Engineering students; 7%, Education students; and 5% (5), Arts and Sciences students. The findings indicate the clients are in the age bracket which is ICT oriented and trained.

Table 3. Profile of Liceo clients

Respondents' Profile	Categories	Frequency	Percen
	17 – 18	5	5.0
	19 - 20	39	39.0
	21 - 22	30	30.0
Age	23 - 24	15	15.0
	25 - 26	4	4.0
	27 - 28	6	6.0
	29 - 33	1	1.0
		100	100.00
	Male	33	33.0
Gender	Female	67	67.0
		100	100.00
	Arts and Sciences	5	5.0
	Commerce	24	24.0
Course	Education	7	7.0
	Engineering	8	8.0
	Nursing	56	56.0
	· ·	100.00	100.00
	Psychology	5	5.0
	Management Acctg.	10	10.0
	Accountancy	2	2.0
	Finance	6	6.0
	Marketing	6	6.0
Major	Elementary Education	7	7.0
-	Electronics and Communication Engineering	2	2.0
	Electrical Engineering	2	2.0
	Industrial Engineering		2.0
	Civil Engineering	2 2	2.0
	Nursing	56	56.0
	•	100.00	100.00

Among those in the library, the in-service trainings/programs attended were on Follet, Excel, Microsoft Word, library method, computer literacy, book indexing, on-line database, and SRC/AC. For those in the Internet Services, the in-service trainings/programs attended were on Flash guard, web page and adobe, web development, and CISCO. Those in the Cashier's Office attended trainings/programs on computer literacy, sales advertising, and other topics conducted by the Human Resource Department. Those in the Registrar's Office

attended trainings/programs on computer literacy and other topics conducted by the Human Resource Department. The library has the following services: use of computer, locating and finding books, inventory, indexing books, use of audiovisual materials, photocopying, publication of newsletters, system updating, online database research, pathfinders (pdf), CD-Rom, book and periodical borrowing, computer-assisted research, searching, reserving books, and library instruction. The Internet services include the Internet, network installation, web development, software and hardware installation, access, downloading, Internet mail, dial-up, computer maintenance, and networking setup. The services of the Cashier's Office are assessment, refunding, fees payment, and issuance of certificates, transcript of records, and diploma. The Registrar's Office offers the following services: processing of grades and NG's and processing and release of the TOR, diploma, and certificate of honorable dismissal.

Table 4. Liceo service providers' in-charge trainings/programs attended and services offered

Departments	In-service trainings/ programs attended	Service(s) offered
Cashier	Training Conducted by Human Resource     Computer literacy     Sales Advertising	- Tuition payments, - Certificates - graduation fee - Transcript of Records Fee
	- Computer literacy	<ul><li>Assessment</li><li>diploma payments</li><li>refunds</li><li>honorable dismissal payments</li></ul>
Registrar	- Computer literacy - Training conducted by Human Resource - Training conducted by CHED with Certificates	<ul> <li>process and release of TOR, diploma, honorable dismissal, process of NG's</li> <li>process of grades</li> </ul>
	- Flash guard seminar	Internet     Network configuration     Web development     Software and hardware installation
Internet Services	- Web page and adobe workshop - Web development - CISCO	- Access to website - Downloading - Internet mail - Dial-up - Computer maintenance
Library	- Librarianship info. Tech. Seminars - Follett Software training - Excel, Microsoft work library method - Computer literacy - Book indexing - On-line data base training - A SRC/AC Training Workshop	- Use of computer for browsing/surfing - Assists student in locating and finding books - Inventory of books/library services - Indexing books - Audio visual - Photocopying - Newsletters - System updates - On-line database searching - Pathfinders (pdf) - CD-Rom uses - Book and periodical borrowing - Computer assisted research - Searching, reserving books

The service providers offer such services to better serve the clients who are the direct beneficiaries of the ICT implementation.

# **Extent of the Existing ICT Practices**

Table 5 shows the Liceo service providers' ratings on the system restructuring. As reflected by the overall mean of 3.21, system restructuring was practiced satisfactorily. The indicators rated very satisfactory were the updating of new software (3.25) and giving importance on the efficiency of the system (3.25). Other indicators rated satisfactory included minimizing complexity (3.22), building a chain of networks (3.20), and involving users intensively in the system restructuring (3.15). The findings imply that the service providers are satisfied with the use of the system.

Table 5. Liceo service providers' ratings on system restructuring

System Restructure	Weighted Mean	Verbal Description
Updates new software in the market	3.25	Very Satisfactory
Involves the users intensively in the system restructure	3.15	Satisfactory
Gives importance on the efficiency of the system.	3.25	Very Satisfactory
Minimizes complexity	3.22	Satisfactory
Builds a chain of networks	3.20	Satisfactory
Mean	3.21	Satisfactory

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Table 6 discloses the Liceo clients' ratings on system restructuring. The overall rating of 2.62 indicates that the system was satisfactory. All the indicators were rated satisfactory as well. The data imply that the clients are not intensively involved in the system restructuring of the ICT. They could hardly make suggestions to improve the system.

Table 6. Liceo clients' ratings on system restructuring

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System Restructure	Weighted Mean	Verbal Description
Uses new software available in the market.	2.71	Satisfactory
Involves the users intensively in the system restructure	2.60	Satisfactory
Minimizes complexity	2.56	Satisfactory
Mean	2.62	Satisfactory

Table 7 reveals the Liceo service providers' ratings on system selection. The indicators rated very satisfactory were ICT system's adjustment to the existing system of the university (3.30), the use of standard software available in the market (3.32), and ICT system's flexibility for any additional functions for needed services (3.25). Only one indicator was rated satisfactory-that is, the involvement of the users in the system selection (3.16). Overall, system selection was rated very satisfactory (3.25) by LDCU service providers as reflected by the overall rating of 3.25. The service providers are very satisfied with the system selection of ICT because it enables them to adjust to the existing system of the university, to get updated with new software in the market, and to add options to the software for additional services. However, they are not widely involved in the selection of the system.

Table 7. Liceo service providers' ratings on system selection

System Selection	Weighted Mean	Verbal Description
The ICT system has been adjusted to the existing system of		
the university	3.30	Very Satisfactory
ICT system is flexible to any additional functions for		
needed services	3.25	Very satisfactory
ICT involves users intensively in the system selection	3.16	Satisfactory
Uses of standard software already available in the market	3.32	Very Satisfactory
Mean	3.25	Very Satisfactory

Table 8 reveals the Liceo clients' ratings on system selection. Overall, system selection was rated satisfactory (2.69). The following indicators were rated satisfactory: the system can adjust to the existing system of the university (2.76), the system has additional functions for additional services (2.68), the system uses standard software available in the market (2.62), and the system intensity involves users in the system selection (2.66). As revealed, the clients are satisfied with the system selection of ICT especially on the system's capacity to adjust to the needs of the clients.

Table 8. Liceo clients' ratings on system selection

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System Selection	Weighted Mean	Verbal Description
The system adjusts to the existing system of the university	2.76	Satisfactory
The system has additional functions for additional services	2.68	Satisfactory
The system involves users intensively in the system selection for the university	2.62	Satisfactory
The system uses standard software available in the market	2.66	Satisfactory
Mean	2.69	Satisfactory

Table 9 shows the Liceo service providers' ratings on ICT staff's skills/capabilities. Rated the highest (very satisfactory) was the ICT staff's ability to communicate with the end user during the project implementation (3.25). However, rated satisfactory were the following indicators: ICT staff's creation of group to handle the operations and maintenance of the system (3.20), a good relationship with the users (3.11), letting ICT professionals handle the system (3.0), and the provision for a continued training regarding hardware and application software (3.00). Overall, the Liceo service providers rated satisfactory the ICT staff's skills/capabilities. As revealed, the Liceo service providers are moderately satisfied with the staff's skills/capabilities in handling the system. Highest satisfaction shown is with the ICT staff's ability to communicate with the users. This implies that their clients understand their methods of servicing them. The ICT staff's trainings and number of years in service enable them to maintain the system well and effectively relate themselves to the clients.

Table 9. Liceo service providers' ratings on ICT staff's skills/capabilities

Table 9. Liceo service providers Talings on TCT stag		
ICT Staff Skills/ Capabilities	Weighted Mean	Verbal Description
The staff that handles the system are mainly composed if IT		
professionals with experience and capabilities of run the system	3.00	Satisfactory
ICT Staff communicates with the end users during project		
implementation	3.25	Very Satisfactory
ICT staff has continuous training regarding hardware and application		
software	3.00	Satisfactory
Creates the group to handle the operation and maintenance of the	3.20	Satisfactory
system		
ICT Staff has a good relationship with the users.	3.11	Satisfactory
Mean	3.11	Satisfactory

Table 10 shows the Liceo clients' ratings on ICT staff's skills/capabilities. The overall mean of 2.69 reveals that the ICT staff's skills/capabilities were perceived satisfactory by the clients. All indicators were likewise rated satisfactory. These included the staff's expertise in handling the system (2.89), staff's ability to handle the operations and the maintenance of the system effectively (2.70), staff's ability to communicate with the end users during the project implementation (2.63), and staff's having good relationships with the users (2.54). The highly rated staff's skill is the ability to handle the systems. They can easily fix any malfunctions, thus ensuring quick normal resumption of the operation. With the lowest rating was the staff's ability to establish good relationship with the clients. They are perceived strict when serving the clients.

Table 10. Distribution of Liceo clients in terms of ICT staff skills/capabilities

ICT Staff Skills/ Capabilities	Weighted Mean	Verbal Description
The staff that handles the system is with experience and capabilities to	2.89	Satisfactory
run the system.		
ICT Staff communicates with the end users during project	2.63	Satisfactory
implementation.		
Staff handles the operation and the maintenance of the system	2.70	Satisfactory
effectively.		
ICT Staff has good relationship with the users.	2.54	Satisfactory
Mean	2.69	Satisfactory

Table 11 shows the Liceo service providers' perception on the existing ICT practices. Rated very satisfactory were ICT as a tool in using resources more flexibly and economically (3.40) and as a tool for competition advantage and survival (3.40). However, rated satisfactory were the following indicators: ICT as a tool for day to day activity (3.15) and as a tool for communicating users and clients (3.05). Overall, the existing ICT practices were rated very satisfactory (3.26). The findings imply that the service providers have easy access to the system. The existing ICT practices give the school competition advantage, thus the school attracts more customers.

Table 11. Liceo service providers' ratings on existing practices of ICT

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Existing Practices	Weighted Mean	Verbal Description
ICT as a tool in day-to-day activity	3.15	Satisfactory
ICT as a tool for communicating users, and clients.	3.05	Satisfactory
ICT as a tool for competition advantage and survival	3.40	Very Satisfactory
Make ICT as a tool for using resources more flexibly and economically	3.40	Very Satisfactory
Mean	3.26	Very Satisfactory

Table 12 shows the Liceo clients' ratings on the existing ICT practices. All the existing ICT practices were rated satisfactory by the clients. Rated the highest was ICT as a tool for day-to-day activity (2.71), followed by ICT as a tool for using resources more flexibly and economically (2.66), as a tool for communicating users and clients (2.64), and as a tool for competition advantage and survival (2.64). The findings imply that the clients have not maximized the use of ICT as tool for day-

to-day activity, for communicating other users, and for accessing information.

Table 12. Liceo client's ratings on existing practices of ICT

Existing Practices	Weighted Mean	Verbal Description
ICT is a tool for day-to-day activity	2.71	Satisfactory
ICT as a tool for communicating users, and clients.	2.64	Satisfactory
Make ICT as a tool for competition advantage and survival	2.64	Satisfactory
Make ICT as a tool in using resources more flexibly and economically	2.66	Satisfactory
Mean	2.80	Satisfactory

Table 13 shows the summary on LDCU service providers' ratings on the extent of ICT practices. Rated very satisfactory were the existing ICT practices (3.26). However, rated satisfactory were the following indicators: system selection (3.25), system restructuring (3.21), and ICT staff skills/capabilities (3.11). Overall, the extents of ICT practices were rated satisfactory. The findings imply that the ICT practices of the service providers have enhanced student services.

Table 13. Summary on LDCU service providers' ratings on the extent of ICT practice

ICT Practices		Weighted Mean	Verbal
			Description
System restructuring		3.21	Satisfactory
System selection		3.25	Satisfactory
ICT staff's skills/capabilities		3.11	Satisfactory
Existing practices of ICT		3.26	Very Satisfactory
	Mean	3.20	Satisfactory

Table 14 shows the summary of Liceo clients' ratings on the extent of ICT practices. The overall mean of 2.70 reveals that the extents of ICT practices were perceived satisfactory by the clients. All indicators were likewise rated satisfactory. These included the existing ICT practices (2.80), ICT staff's skills/capabilities (2.69), system selection (2.69), and system restructuring (2.62). Rated the highest were the existing ICT practices. This implies that the clients understand the service system used to serve them. On the other hand, rated the lowest is the system restructuring. The clients find themselves less involved in designing the system.

Table 14. Summary on Liceo clients' ratings on the extent of ICT practices

ICT Practices		Weighted Mean	Verbal
			Description
System restructuring		2.62	Satisfactory
System selection		2.69	Satisfactory
ICT staff's skills/capabilities		2.69	Satisfactory
Existing practices of ICT		2.80	Satisfactory
	Mean	2.70	Satisfactory

# Level of the ICT Applications

Table 15 shows the Liceo service providers' ratings on ICT applications in terms of functionality. The ICT applications with very satisfactory rating were word processing (3.40), spreadsheets (3.20), and Internet downloads (3.20).

Presentations (3.00), project management (2.58), visual basic programming (2.47), java programming (2.22), power builder programming (2.22), and c++ programming (2.24) were rated satisfactory. Overall, the ICT applications were rated satisfactory (2.73) by Liceo service providers. Moreover, on information functionality, paper communication (3.40) and information sharing (3.30) were rated very satisfactory while updating and following up transactions and documents (3.00) was rated satisfactory. Word processing was rated the highest for it is used in their daily work. It is used for writing memos and reports and for compiling information. Spreadsheet is also widely used for figures and budget. The Internet is used for accessing and downloading files. Among the indicators of information functionality, paper communication is widely used. Such communication includes memos, letters, reports, and other important manuscripts.

Table 15. *Liceo services providers' ratings on ICT application in terms of functionality* 

Functionality		Weighted Mean	Verbal Description
Windows-based Applications			
Word Processing (e.g. MS Word, Open Office writer)		3.40	Very Satisfactory
Spreadsheet (e.g. Excel, Open office Calc)		3.20	Very Satisfactory
Presentations (e.g.Powerpoint, Open Office Impress)		3.00	Satisfactory
Project Management (e.g. MS Project, Project Planner		2.58	Satisfactory
Visual Basic Programming		2.47	Satisfactory
Power builder Programming		2.22	Fair
Java Programming		2.22	Satisfactory
C++ Programming		2.24	Satisfactory
Internet(Search, downloads)		3.20	Very Satisfactory
	Mean	2.73	Satisfactory
Information Functionality			
Updates and follow ups transaction, documents		3.00	Satisfactory
Information Sharing		3.30	Very Satisfactory
Paper communication (memos, letters and faxes)		3.40	Satisfactory
	Mean	3.11	Satisfactory

Table 16 presents the Liceo clients' ratings on ICT applications in terms of functionality. Overall the functionality of ICT application was satisfactory (2.77). As revealed, all Windows-based applications, such as word processing (3.03), spreadsheet (2.89), Internet (2.88), presentations (2.85), visual basic programming (2.84), project management (2.63), power builder programming (2.66), java programming (2.65), and C++ programming (2.61) were rated satisfactory by the Liceo clients. In terms of information functionality, updating and following up transactions and documents (2.84), information sharing (2.57) and paper communication (2.49) were all rated a satisfactory. As revealed, the clients widely use word processing and Windows-based applications for updating and following up transactions and documents and for processing paper communications.

Table 16. Liceo clients' ratings on ICT application in terms of functionality

Functionality		Weighted Mean	Verbal Description
Windows-based Applications			
Word Processing (e.g. MS Word, Open Office writer)		3.03	Satisfactory
Spreadsheet (e.g. Excel, Open office Calc)		2.89	Satisfactory
Presentations (e.g.Powerpoint, Open Office Impress)		2.85	Satisfactory
Project Management (e.g. MS Project, Project Planner		2.63	Satisfactory
Visual Basic Programming		2.84	Satisfactory
Power builder Programming		2.66	Satisfactory
Java Programming		2.65	Satisfactory
C++ Programming		2.61	Satisfactory
Internet(Search, downloads)		2.88	Satisfactory
	Mean	2.77	Satisfactory
Information Functionality			
Updates and follow ups transaction, and documents		2.84	Satisfactory
Information Sharing		2.57	Satisfactory
Paper communication (memos, letters and faxes)		2.49	Satisfactory
•	Mean	2.77	Satisfactory

Table 17 shows the Liceo service providers' ratings on ICT applications in terms of availability. The availability of Windows-based applications, the availability of assistance in the event problems will occur (3.30), and the quality of data provided (3.30) were rated very satisfactory. However, the availability of data across business functions (3.16) and of workstation per user (3.15) was rated satisfactory. Overall, the service providers of Liceo rated satisfactory the availability of ICT applications...

In terms of information performance, workstation per user (3.20), availability of database and network (3.20), speed of sending and receiving information (3.20), quality of data provided (3.10), and availability across business functions (3.05) were all rated satisfactory.

The findings imply that the service providers of LDCU are highly satisfied with the quality of data being provided to their clients since the clients are always updated on matters concerning the school institution via the Internet. Also, they are highly satisfied with the availability of assistance desk since a standby unit is in place to assist whenever a problem takes place.

Table 17. Liceo service providers' ratings on ICT applications in terms of availability

Availability	Weighted Mean	Verbal Description
Windows-based applications	-	
Quality of data provided	3.30	Very Satisfactory
Availability of assistance desk in the event problems will come out.	3.30	Very Satisfactory
Workstation per user	3.15	Satisfactory
Availability of data across business functions	3.16	Satisfactory
Mean	3.22	Very Satisfactory
Information performance		
Quality of data/reports provided	3.10	Satisfactory
Availability of database and network	3.20	Satisfactory
Workstation per user	3.20	Satisfactory
Speed of sending and receiving information	3.20	Satisfactory
Availability across business functions	3.05	Satisfactory
Mean	3.15	Satisfactory

Table 18 shows the Liceo clients' ratings on ICT applications in terms of availability. Overall, the availability of all Windows-based applications was satisfactory as reflected by the overall mean of 2.59. The availability of assistance

desk (2.69), workstation per user (2.63), quality of data provided (2.54), and availability of data across business functions (2.49) were rated satisfactory. In terms of information performance, availability of database and network (2.73), workstation per user (2.64), quality of data/reports provided (2.58), speed of sending and receiving information (2.56), and availability of across business functions (2.50) were rated satisfactory. The clients' low satisfaction level implies that the service providers do not respond immediately to the clients' concerns and needs, the workstations cannot accommodate all users, and the data needed cannot be accessed fast.

Table 18. Liceo clients' ratings on ICT application in terms of availability

Availability	Weighted Mean	Verbal Description
Windows-based applications		
Quality of data provided	2.54	Satisfactory
Availability of assistance desk in the event problems will come out	2.69	Satisfactory
Workstation per user	2.63	Satisfactory
Availability of data across business functions	2.49	Satisfactory
Mean	2.59	Satisfactory
Information performance		
Quality of data/reports provided	2.58	Satisfactory
Availability of database and network	2.73	Satisfactory
Workstation per user	2.64	Satisfactory
Speed of sending and receiving information	2.56	Satisfactory
Availability across business functions	2.50	Satisfactory
Mean	2.60	Satisfactory

Table 19 presents the Liceo service providers' ratings on ICT applications in terms of maintainability. Overall, the maintainability of the ICT applications was rated satisfactory (3.10). Among the indicators, expandability of the system (3.25) and service maintenance (3.25) were rated very satisfactory while spares backup (hardware and software) and level of knowledge of personnel handling the system (2.95) were rated satisfactory. The findings suggest that the service providers of Liceo are able to maintain a high efficient system because of the availability of spares backup and the personnel's knowledge on handling the system.

Table 19. *Liceo service providers' ratings on ICT applications in terms of maintainability* 

Maintainability	Weighted Mean	Verbal Description
Knowledge of personnel handling the system	2.95	Satisfactory
Spares backup (hardware and software)	2.95	Satisfactory
Service Maintenance	3.25	Very Satisfactory
Expandability of the system	3.25	Very Satisfactory
Mean	3.10	Satisfactory

Table 20 shows the Liceo clients' ratings on ICT applications in terms of maintainability of the system. Overall, the level of maintainability of ICT applications was rated satisfactory (2.60). As revealed, the uses of the current system (2.65), the observance of standards of customer care and institutional policies and regulations (2.55), and the knowledge of the personnel on handling the system (2.50) were rated satisfactory by the Liceo clients. As perceived by the clients, the

system is satisfactorily maintained, the uses of the current system are satisfactorily tapped, the standards of customer care and institutional policies and regulations are satisfactorily observed, and the system is satisfactorily maintained.

Table 20. Liceo clients' ratings on ICT application in terms of maintainability

Maintainability	Weighted Mean	Verbal
·	_	Description
Personnel handling the system are knowledgeable.	2.50	Satisfactory
The system is well maintained	2.71	Satisfactory
The uses of the current system are expanded.	2.65	Satisfactory
Knows and applies the standards of customer care and institutional	2.55	
policies and regulations are observed.		Satisfactory
Mean	2.60	Satisfactory

Table 21 presents the Liceo service providers' ratings on ICT applications in terms of utilization. As to the level of knowledge on applications, the overall rating was satisfactory (2.67). Rated very satisfactory was the spreadsheet (3.40), while rated satisfactory were presentations (3.15), word processing and project management (2.95), visual basic programming (2.58), Internet (2.42), power builder programming (2.37), java programming (2.28), and C++ programming (2.26). As to the system's functions, all the indicators were rated satisfactory. Rated the highest among the indicators was the spreadsheet (3.11), while power builder programming and java programming (2.32) were rated the lowest. Moreover, the evaluation of trained staff that use Windows-based applications (3.16) and the speed of providing data (2.67) were rated satisfactory.

The service providers' knowledge on the ICT applications is acquired through trainings and seminars they attended. Their knowledge has equipped them for the use of the system. The functions commonly used are spreadsheet for financial reports, figures, charts, and tables; presentations for presenting the required output of the department; word processing for letters, faxes, and other communications; project management for planning, and implementing; visual basic programming for the basic programming language of the system; and the Internet for downloading and searching files in the web. Power builder programming, java programming, and C++ programming are available in the system but are seldom being used.

Table 21. Liceo service providers' ratings on ICT application in terms of utilization

Utilization	Weighted Mean	Verbal Description
Level of Knowledge on Applications		
Word Processing (e.g. MS Word, Open Office writer)	2.95	Satisfactory
Spreadsheet (e.g. Excel, Open office Calc)	3.40	Very Satisfactory
Presentations (e.g. Powerpoint, Open Office Impress)	3.15	Satisfactory
Project Management (e.g. MS Project, Project Planner	2.95	Satisfactory
Visual Basic Programming	2.58	Satisfactory
Power builder Programming	2.37	Satisfactory
Java Programming	2.28	Satisfactory
C++ Programming	2.26	Satisfactory
Internet(Search, downloads)	2.42	Satisfactory
	2.67	Satisfactory
Functionality (Functions of the System)		
Word Processing (e.g. MS Word, Open Office writer)	3.05	Satisfactory
Spreadsheet (e.g. Excel, Open office Calc)	3.11	Satisfactory

(Table 21. Continued)

Utilization	Weighted Mean	Verbal Description
Presentations (e.g. PowerPoint, Open Office Impress)	3.05	Satisfactory
Project Management (e.g. MS Project, Project Planner	2.80	Satisfactory
Visual Basic Programming	2.63	Satisfactory
Power builder Programming	2.32	Fair
Java Programming	2.32	Fair
C++ Programming	2.53	Satisfactory
Internet(Search, downloads)	2.59	Satisfactory
Mean	2.59	Satisfactory
Evaluation of trained staff who use Windows-based applications	3.16	Satisfactory
Speedy provision of data	2.67	Satisfactory
Mean	2.56	Satisfactory

	rean	2.30	Satisfactory
Table 22. Liceo clients' ratings on ICT a	pplicati	on in terms of util	'ization
Utilization		Weighted Mean	Verbal Description
Level of Knowledge Applications			
Word Processing (e.g. MS Word, Open Office writer)		2.52	Satisfactory
Spreadsheet (e.g. Excel, Open office Calc)		2.87	Satisfactory
Presentations (e.g.Powerpoint, Open Office Impress)		2.83	Satisfactory
Project Management (e.g. MS Project, Project Planner		2.72	Satisfactory
Visual Basic Programming		2.68	Satisfactory
Power builder Programming		2.66	Satisfactory
Java Programming		2.60	Satisfactory
C++ Programming		2.54	Satisfactory
Internet(Search, downloads)		2.56	Satisfactory
	Mean	2.65	Satisfactory
Functionality (Functions of the System)			
Word Processing (e.g. MS Word, Open Office writer)		2.81	Satisfactory
Spreadsheet (e.g. Excel, Open office Calc)		2.85	Satisfactory
Presentations (e.g. PowerPoint, Open Office Impress)		2.78	Satisfactory
Project Management (e.g. MS Project, Project Planner		2.69	Satisfactory
Visual Basic Programming		2.75	Satisfactory
Power builder Programming		2.65	Satisfactory
Java Programming		2.55	Satisfactory
C++ Programming		2.53	Satisfactory
Internet(Search, downloads)		2.42	Satisfactory
	Mean	2.93	Satisfactory
Evaluation of trained staff that use Windows -based applications		2.48	Satisfactory
Speed provision of data		2.69	Ť
	Mean	2.59	Satisfactory

Table 22 presents the Liceo clients' ratings on ICT applications in terms of utilization. As to the knowledge on the applications, all ICT applications were known satisfactorily as revealed by the overall rating of 2.65. All indicators of utilization were rated satisfactory. There were spreadsheet, 2.65; presentations, 2.83; project management, 2.72; visual basic programming, 2.68; power builder programming, 2.66; word processing, 2.52; java programming, 2.60; Internet, 2.56; and C++ programming, 2.54. In terms of the functions of the system, all the applications were rated satisfactory (2.93). Rated the highest was the spreadsheet (2.85), while the Internet was rated the lowest. On the other hand, the evaluation of trained staff that use Windows-based applications (2.48) and the speed in providing data (2.69) were rated satisfactory. As found out, the service providers were trained in the proper use of the system and the proper way of serving the clients. The staffs that use Windows-based applications were evaluated satisfactorily for they were able to meet the clients' needs.

The Liceo service providers' ratings on ICT applications in terms of performance level is presented in Table 3. As revealed, administrative and operational process (3.35), maintenance of operation process (3.35), ICT creating and altering employees' know-how to get things done in the existing system (3.32), and better production process (3.26) were all rated very satisfactory. However, generating and submitting timely report to the management for decision-making (3.05) was rated satisfactory. Overall, the performance level of ICT applications was rated very satisfactory. As cited by the service providers, performance level is high because the service policies and procedures are properly implemented.

Table 23. Liceo service providers' ratings on ICT applications in terms of performance level

Performance Level	Weighted Mean	Verbal Description
Administrative and operational process	3.35	Very Satisfactory
Maintenance and operation process	3.35	Very Satisfactory
Creating and altering employees to get things done in the existing system	3.32	Very Satisfactory
Availability of data across business functions	3.26	Very Satisfactory
Better production process	3.26	Very Satisfactory
Generating and submitting timely report to the management for decision making	3.05	Satisfactory
Mean	3.27	Very Satisfactory

Table 24 shows the Liceo clients' ratings on the performance level of ICT. Overall, the ICT's performance level was satisfactory (2.75). "Maintenance of ICT makes the school more efficient" (2.90), "ICT creates and alters school administrations' know-how to get things done in the existing system" (2.85), "ICT improves the operation of the school" (2.76), "data across business functions are available" (2.75), "Research and processing of students' complaints are undertaken" (2.72), "Timely information is provided to other staff with student support roles" (2.70), "School policy on student exception is implemented" (2.69), and "Cases under consideration are prepared and processed" (2.64) were indicators rated satisfactory by the clients. The findings reveal that the Liceo clients are moderately satisfied with the service providers' level of performance in the use of ICT.

Table 24. Liceo clients' ratings on ICT applications in terms of performance level

Performance Level	Weighted Mean	Verbal Description
ICT improves the operation of the school	2.76	Satisfactory
Maintenance of ICT makes the school more efficient	2.90	Satisfactory
ICT creates and alters school administration's on know-how to get		
things done in the existing system	2.85	Satisfactory
Availability of data across business functions	2.75	Satisfactory
Implement the school policy on student exceptions such as fee		
waiver	2.69	Satisfactory
Prepare and process cases under consideration.	2.64	Satisfactory
Undertake research and processing of student complaint cases	2.72	Satisfactory
Provide timely information to other staff with student support roles	2.70	Satisfactory
Mean	2.75	Satisfactory

Table 25 shows the summary of Liceo service providers' ratings on the ICT applications. Overall, the ICT applications were rated satisfactory (3.01). Among these indicators, performance level (3.27) was rated very satisfactory, while availability (3.18), maintainability (3.10), functionality (2.92), and utilization (2.60) were rated satisfactory. The findings suggest that the service providers of Liceo are highly efficient in doing their tasks and handling the system.

Table 25. Summary on Liceo service providers' ratings on the ICT applications

1 4010 23.	Summary on Liceo service providers	raings on me ici	ippiicuiions
	ICT Applications	Weighted Mean	Verbal Description
Functionality		2.92	Satisfactory
Availability		3.18	Satisfactory
Maintainability		3.10	Satisfactory
Utilization		2.60	Satisfactory
Performance level		3.27	Very Satisfactory
	Me	an 3.01	Satisfactory

Table 26 shows the summary of Liceo clients' ratings on the ICT applications. Overall, the ICT applications were rated satisfactory (2.68). As revealed, functionality (2.77), performance level (2.75), utilization (2.72), maintainability (2.60), and availability (2.59) were rated satisfactory by the clients.

Table 26. Summary of Liceo clients' ratings on the ICT applications

ICT Applicatio	ns	Weighted Mean	Verbal Description
Functionality		2.77	Satisfactory
Availability		2.59	Satisfactory
Maintainability		2.60	Satisfactory
Utilization		2.72	Satisfactory
Performance level		2.75	Satisfactory
	Mean	2.68	Satisfactory

Table 27 presents the results of the t-test on the ratings of the Liceo service providers and clients on ICT adoption in terms of the existing practices. The calculated t-value of 0.53 was lower than the critical t value of 2.015; therefore, there was no significant difference in the ratings of the service providers and the clients on ICT adoption in terms of the existing practices. The clients had higher satisfaction level on the existing practices than the employees. Such is so since the students are happy to see ICT being used while employees may want a better kind of ICT being used.

Table 27. Results of T-Test on the ratings of service providers and clients on ICT Adoption in terms of existing practices

existing practices				
Clien	nts	Ser	vice providers	
Average (mean)	Qualitative Description	Average (mean)	qualitative Description	
2.58	Satisfactory	2.37	Fair	
T Calculated value = 0.53	T Critical (table) value = 2.01	.5   df = 5	Prob. = .616	
Conclusion: T calculated value	ue is < T critical (table) value			
Interpretation : Not Significant	nt Decision on Ho: Not Reje	cted		

Table 28 shows the results of the t-test on the ratings of the Liceo service providers and clients on the ICT adoption in terms of performance level. The calculated t-value of 3.12 was higher than the t critical value of 1.671; herefore, there was a significant difference in the ratings of the clients and providers. The higher ratings on ICT perform by clients indicate a satisfaction on the efficiency of service to match the needs of clients.

Table 28. Result of T-test on the ratings of service providers and clients on ICT adoption in terms of performance

Cli	ents		Service Pro	viders
Average (mean)	Qualitative Description	Average (m	ean)	Qualitative Description
2.90	Satisfactory	2.55		Satisfactory
T Calculated value = 3.12	T Critical (table) value = 1.671	df = 53	Prob = .003	3
Conclusion: T calculated va	lue is > T critical (table) value			
Interpretation : Significant	Decision on Ho: Rejected			

# Level of Efficiency of the Student Services

Table 29 shows the efficiency ratings for the Registrar's Office. As revealed, updating followed-up transactions and documents, knowledge on operating the system, and processing of enrollment were rated very satisfactory. However, the processing of Transcript of Records (TOR), diploma, and honorable dismissal was rated satisfactory (3.21). Overall, the rating on the efficiency of the student services of the Registrar's Office was satisfactory. The Registrar's Office effectively updates followed-up documents and transactions needed by the clients and processes the enrollment fast. The enrollment would take just half of the day. However, the release of records, diploma, and honorable dismissal would take a few days.

Table 29. Liceo service providers' ratings on the efficiency of students services of the registrar's office

Registrar's Office	Weighted Mean	Verbal Description
Fast processing of transcript of records (TOR), diploma and	3.21	Satisfactory
honorable dismissal		
Updates and following up of transactions, documents	3.26	Very Satisfactory
Knowledge in operating the system	3.26	Very Satisfactory
Processing of enrollment	3.26	Very Satisfactory
Mean	3.24	Satisfactory

Table 30 presents the Liceo clients' ratings on the efficiency of the student services of the Registrar's Office. Overall, the efficiency rating for the Registrar's student services was satisfactory (2.45). As rated by the Liceo clients, the processing of enrollment (2.60), processing of Transcript of Records (TOR) and diploma and honorable dismissal (2.56), and knowledge on operating the system (2.35) were satisfactory. However, updating transactions and followed-up documents (2.31) was rated fair. The clients know for a fact that enrollment can be completed for just half of the day and that records, diploma, and honorable dismissal can be obtained within few days. However, the fair rating for the knowledge on operating the system indicates that there are times when errors are committed in the processing of their documents.

Table 30. Liceo clients' ratings on the efficiency of student services of the registrar's office

Registrar's Office	Weighted Mean	Verbal Description
Processing of transcript of records (TOR), diploma and honorable	2.56	Satisfactory
dismissal		
Updating and following up of transactions, documents	2.31	Fair
Knowledge in operating the system	2.35	Satisfactory
Processing of enrollment	2.60	Satisfactory
Mean	2.45	Satisfactory

Table 31 reveals that the overall efficiency rating for the student services of the Cashier's Office was satisfactory (3.21). Rated the highest (very satisfactory) was the updating of followed-up transactions or documents (3.26). Knowledge on operating the system (3.21) and processing of payments (3.16) were rated

satisfactory. The findings imply that the Cashier's Office performs its tasks to the satisfaction of the clients. Clients' accounts are updated before the payments are processed fast. As observed by the clients, it would take seconds to pay their fees.

Table 31. Liceo service providers' rating on the efficiency of students' services of the cashier's office

Cashier		Weighted Mean	Verbal Description
Fast processing of payments		3.16	Satisfactory
Updates and follow-ups of transactions, documents		3.26	Very Satisfactory
Level of knowledge in operating the system		3.21	Satisfactory
	Mean	3.21	Satisfactory

Table 32 reveals that the clients' overall efficiency rating for the student services of the Cashier's Office was fair (2.30). Updating followed-up transactions or documents (2.69), knowledge on operating the system (2.66), processing of payments (2.62), and fast processing of refunds (2.60) were poorly rated. The findings imply that the LDCU clients are not satisfied with the student services of the Cashier's Office. As observed by the clients, the updating of their accounts is delayed, the processing of their fees is erroneous, and the processing of their payments and refund is slow.

Table 32. Liceo clients' ratings on the efficiency of student services of the cashier's office

Cashier		Weighted Mean	Verbal Description
Fast processing of payments		2.30	Fair
Updates and follow-ups of transactions, documents		2.34	Fair
Level of knowledge in operating the system		2.30	Fair
Fast processing of payments		2.29	Fair
	Mean	2.30	Fair

Table 33 reveals that the Liceo service providers' overall efficiency rating for the Library's student services was satisfactory (3.21). The only indicator rated very satisfactory was updating followed-up transactions or documents (3.26). Quality of data provided (3.21) and knowledge on operating the system (3.16) was rated satisfactory. As reported by the service providers of Liceo, the library efficiently updates followed-up transactions or documents to facilitate early release of available books in the market. Library materials provided are of latest edition. The Library staff is moderately confident in operating the system.

Table 33. Liceo service providers' rating on the efficiency of student services of the library

Library	Weighted Mean	Verbal Description
Quality of data provided (e.g. electronic documents, periodicals)	3.21	Satisfactory
Updating followed-up transactions or documents	3.26	Very Satisfactory
Knowledge in operating the system	3.16	Satisfactory
Mean	3.21	Satisfactory

Table 34 reveals that the Liceo's clients' overall efficiency rating for the library's student services was fair (2.39). Quality of data provided (3.15) and updating followed-up transactions or documents were rated satisfactory. However, knowledge on operating the system (2.46) was rated fair. The findings imply that the Liceo client's are not satisfied with the student services of the library. As

reported by the clients, it taken time before a requested book is handed to them and there are only few providers who are highly able to operate the system.

Table 34. Liceo clients' ratings on the efficiency of student services of the library

Library	Weighted Mean	Verbal Description
Quality of data provided (e.g. electronic documents, periodicals)	3.15	Satisfactory
Updating followed-up transactions or documents	2.55	Satisfactory
Knowledge in operating the system	2.46	Fair
Mean	2.39	Fair

Table 35 reveals that the Licean service providers' overall efficiency rating for the Internet Services was satisfactory (3.14). The indicator rated very satisfactory was the processing of data from the web (3.26). The indicators rated satisfactory were monitoring the performance of the school through questionnaires (3.21), updating followed-up transactions and documents (3.11), advertising school programs (3.11), and knowledge on operating the system (3.00). As cited by the service providers, the processing of data from the web is done using advanced hardware and software. Monitoring the performance of the school through questionnaires has a big impact on the current status of the institution. Updating transactions or documents is made fast using the system. Advertising school programs has attracted students to enroll in the university.

Table 35. Liceo service providers' ratings on the efficiency of students services of the internet services

Internet Services	Weighted Mean	Verbal Description
Processing of data from the web	3.26	Very Satisfactory
Updating followed-up transactions and documents	3.11	Satisfactory
Knowledge in operating the system	3.00	Satisfactory
Advertising the school programs	3.11	Satisfactory
Monitoring the performance of the school through questionnaires	3.21	Satisfactory
Mean	3.14	Satisfactory

Table 36 reveals that the Liceo clients' overall efficiency rating for the Internet Services was satisfactory (2.51). Monitoring the performance of the school through questionnaires (2.60), advertising school programs (2.56), processing of data from the web (2.51), and updating followed-up transactions or documents (2.50) were rated satisfactory. However, knowledge on operating the system (2.36) was rated fair.

As reported by the clients, the Internet Services enables them to know the school better. The processing of data from the web is made fast using a highly upgraded hardware and software. Also made fast is the updating of transactions or documents through the dial-up system. However, the clients reported that only the student assistant does the supervision, not the provider.

Table 36. Liceo clients' ratings on the efficiency of student services of the internet services

Internet Services	Weighted Mean	Verbal Description	
Processing of data from the web	2.51	Satisfactory	
Updating followed-up transactions and documents	2.50	Satisfactory	
Knowledge in operating the system	2.36	Fair	
Advertising the school programs	2.56	Satisfactory	
Monitoring the performance of the school through questionnaires	2.60	Satisfactory	
Mean	2.51	Satisfactory	

# Comparison of Ratings of the Service Providers and the Clients on the Efficiency of Student Services of the Different Departments

Table 37 shows the t-test results on the ratings of the clients and service providers on the efficiency of student services of the different departments. The calculated t value of 3.23 was greater than the t critical value of 1.671; thus, there was a significant difference in the clients' and providers' ratings on the efficiency of student services of the different departments. A comparison of means indicates that the clients had a higher efficiency rating for students' services than the service providers had.

Table 37. T-test results on the ratings of clients and services providers on the efficiency of student services

CLIENTS		SERVICE PROVIDERS			
Average (mean)	Qualitative Description	Average (mean)	Qualitative Description		
2.60	Satisfactory	2.20	Fair		
T Calculated value = 3.23	T Critical (table) value = 1.67	df = 45	Prob. = .002		
Conclusion: T calculated value is > T critical (table) value					
Interpretation : Not Significa	ant Decision on Ho: Not Rejected				

### Predictors of the efficiency of student services

Table 38 presents the results of multiple regression on the ratings of the service providers and clients on the existing practices of ICT, ICT implementation performance, and efficiency of student services. As shown by the data, only four variables predicted the efficiency of student services. These predictors included ICT's timely provision of information to other staff with student support roles, ICT as a tool for competition advantage and survival, ICT's capacity to create and alter school administrators' know-how to get things done in the existing system, and ICT as a tool for day-to-day activity. Any increase of these existing practices and performance level of ICT implementation means higher efficiency of student services.

Table 38. Results of multiple regression analysis on the ratings for existing practices of ICT, ICT implementation

	Regression		Beta	F		Interpretation	Decision
Variables	Coefficients	R <sup>2</sup>	Coefficient	Value	Prob.	-	on Ho:
Timely Provision of							
information to other staff	.722500	.76726	.360696	22.306	.0000	Significant	Reject
with student support roles							
ICT as a tool for competitive							
advantage and survival	.695827	.79341	.364771	26.857	.0000	Significant	Reject
ICT creates and alters							
administrators know-how to							
get things done in the existing							
system	.640488	.814065	.231654	10.823	.0018	Significant	Reject
ICT as a tool in your day-to-							
day activity.	.696597	.82955	.227921	8.575	.0051	Significant	Reject

The respondents' socio-demographic variables did not have any interaction effect on the relationship between the independent variables and efficiency of student services. The service providers and the clients are focused on the efficiency of student services.

#### CONCLUSIONS

The ICT practices have satisfactorily met the clients' needs, indicating that the clients have little awareness of the service delivery mechanisms. The service staffs have the basic skills, but have not acquired advanced trainings to hoist services to an excellent level.

The practices and applications of ICT predict the efficiency of student services.

The personal characteristics of the service providers have no bearing on the relationship between the practical applications of ICT and the efficiency of student services.

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