# BUSINESS AND INFORMATION TECHNOLOGY USE IN LOUISIANA TOURISM

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## INTRODUCTION

During the 1990s, tourism development helped ease the widespread economic slump that had plagued Louisiana in the 1980s. Tourism in the state has expanded by more than 55 percent since 1988. Despite the industry's gains during the last decade, there are indications that it is rapidly maturing and in danger of losing the momentum gained during those years. Some of the more traditional attractions and destinations have begun experiencing slowdowns, and in some instances actual declines, in visitation rates. Tourism interests are justifiably concerned about the outlook for their operations. They are apprehensive about their abilities to respond to increased competition through marketing and new product development with their limited financial and manpower resources.

Information Technology (IT) and its commercial application, electronic commerce (e-commerce), can play a significant role in responding to these concerns. Worldwide, better, faster, and cheaper technology is dramatically transforming the travel and tourism industry. On-line sales for travel, according to the Conference Board of Canada, is the perfect product for e-commerce. It is estimated that one quarter of the Internet sites are travel-related, and that more than 2000 similar sites are being added each month.

As technological change is taking place at leaps and bounds, the number of travelers is growing. According to Business 2.0, a Jupiter Communications study, on-line spending for leisure travel swelled from $274 million in 1996, to $911 million in 1997, surged to $2.1 billion in 1998 and is projected to increase eight-fold, to over $16 billion by 2003. Today's travelers are far more sophisticated, have relatively advanced education, possess substantial discretion in their spending decisions, and are rapidly gaining experience with these technologies. Experience and confidence will make them more analytical, skeptical, and demanding as they gather information and make travel choices and related purchases. Thus, use of on-line technology for travel and tourism purposes will continue to expand briskly.

The pace and scope of the technological changes that are taking place, particularly information delivery, are challenging and demanding. It is thus likely that future distribution of travel information will use electronic means rather than postal or other delivery networks. Sharp business reductions in paper publishing, and third parties who serve as intermediaries (such as travel agents) will have to find new ways to remain competitive. The typical paper brochure will soon become a background visual aid for the on-line version. Access to the Internet and digital television are exploding at such a rapid rate that traditional brochures may soon become virtually unnecessary.

Louisiana's tourism industry--both the public and private sectors-- must be able to remain at the forefront. Louisiana must commit to using technology that can aid efforts to not just retain, but also increase market share. More than any other medium, the Internet and its inherent interactivity enables people to obtain information quickly and precisely on any destination that

captures their interest. Consumers expect instant information and, increasingly, the opportunity to design or customize a tourism product, and pay for it online.

Unfortunately, the readiness of many of Louisiana's smaller tourism enterprises to interface with their virtual clients is lagging. This situation is critical since these enterprises already operate on the margin. There is a need in the state to help accelerate the adoption of information technology and e-commerce innovations.

In order to obtain a better picture of the extent of Louisiana tourism industry's adoption and use of information technology, two surveys were conducted during the 2001 Louisiana Travel and Tourism Summit in Lake Charles between January 23-25.

The authors used intercept survey and written questionnaire techniques at a public booth to gain input from those attending the summit. The former technique used a brief poll format that involved a "sticky dot" balloting technique to gather and publicly display people's spontaneous responses toward a particular subject, in this case IT issues. The latter, a longer, confidential, written survey, obtained information on private actions related to acquiring and using IT.

Aggregated data gathered from Summit survey participants appear in the appendices of this report. The interpretation of survey data was enhanced by subsequent interviews with selected tourism industry leaders and business owner-operators.

The surveys and this report are a joint project of the Sea Grant College Programs in Louisiana and Oregon, with assistance from the Oregon State University (OSU) College of Business and OSU Extension Service. Our project was undertaken in cooperation with Louisiana's Office of Tourism and the Louisiana Travel Promotion Association (LTPA).

The co-investigators gratefully acknowledge the significant contributions of Louisiana Sea Grant colleagues Robert Ray and Bonnie Strate, and the project assistance of LSU students Adam Coreil, Jonathan Fisher and Sushil Karampuri. The survey benefited from the University of Nebraska's instrument on this subject, as shared by University of Nebraska-Lincoln Extension Agent Connie Hancock.

## INTERCEPT SURVEY

An intercept survey was conducted in the Sea Grant booth located in the Lake Charles Civic Center's Exhibit Hall. The booth was open during the Summit's Media Trade Show, Travel Fair, and unstructured break times *(see Figure 1)*.

This intercept survey used a technique that collected and displayed public opinion on specific IT topics. Prospective participants were able to view the responses of their anonymous peers. Participants used colored "sticky dots" to spontaneously ballot on questions having "yes or no" type answers. During 4.5 hours of surveying, 92 summit delegates considered three broad close-ended questions related to IT benefits, concerns and assistance. Results of this balloting were instantly available for review *(see Figure 2)*.

**Before**

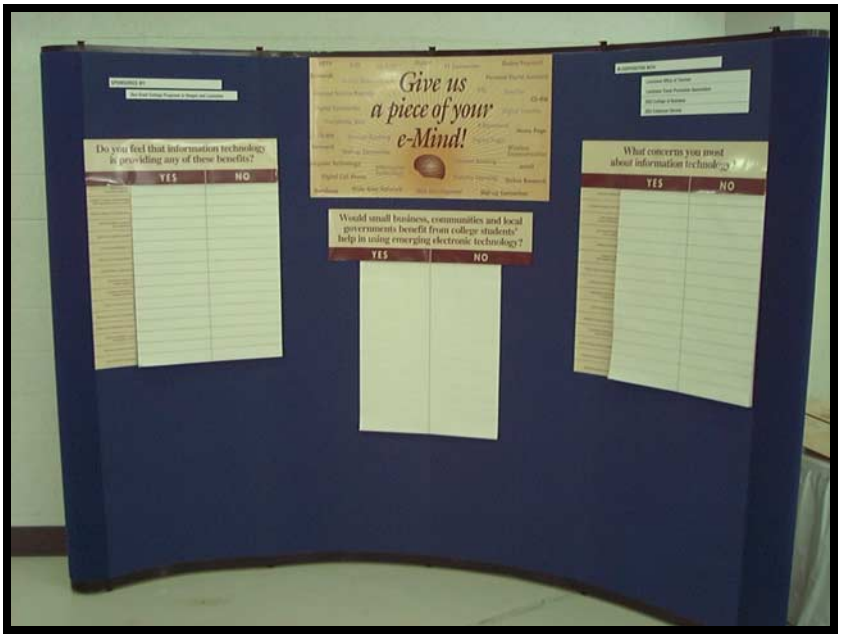



**Figure 1**

**After**

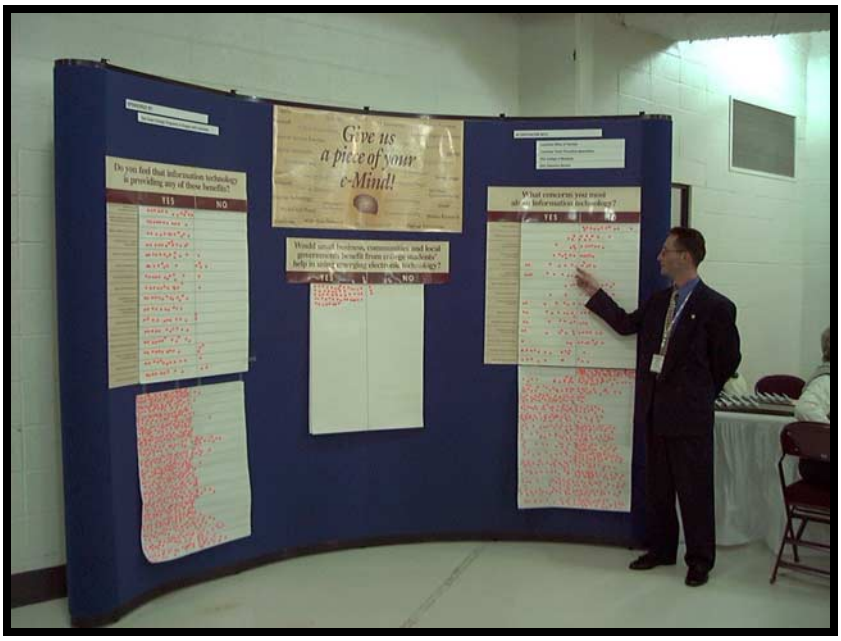



**Figure 2**

**Summary of Results**

The first broad question considered by intercept survey participants was: **"Do you feel that information technology is providing any of these benefits?"** "Sticky dots" were placed in corresponding "yes or no" boxes adjacent to 16 statements of potential IT benefits. *The numerical results appear in data tables provided in Appendix 1.*

More than 70% of the survey respondents indicated that information technology is providing benefits such as:

- Increased access to information
- Increased ability to research competitors
- Greater exposure to potential customers
- Timely information exchanges
- Improved competitive position
- Enhanced image of their organization
- Increased access to vendors and suppliers
- Expanded customer communications prior to arrival
- A better way to sell services
- Lowered costs of doing business
- Increased customer retention

The second general question considered by participants was: **"What concerns you the most about information technology?"** Dots were placed in corresponding "yes or no" boxes adjacent to 15 statements of IT concerns.

More than 50% of survey respondents indicated having IT concerns such as:

- Keeping up with technological change
- Less personal contact with customers
- Training their organization's personnel
- Lack of availability of technical support
- Insuring the security of sensitive information

The third broad question considered by participants was: **"Would small business, communities and local governments benefit from college students help in using emerging electronic technology?"**

Almost all survey respondents (97%) affirmed that college students' help would be useful to small business, communities and local governments wrestling with emerging electronic technology.

Together, the responses to these broad questions show that Summit delegates participating in this survey agreed that information technology provides a wide range of benefits. The benefits -- enhanced access to information, broadened marketing capability, quicker information exchanges with customers and suppliers, and faster business transactions --improve business with each use. Survey respondents indicated less concern about the role of information technology in their personal and work lives than is often depicted in the popular press. For instance, none of the respondents indicated a concern that IT might be a passing fad. Likewise, only 23% of those

surveyed were concerned about customer acceptance and use of information technology. The survey results also indicated that ongoing training in information technology is an important need of tourism industry leaders and their staff. They are also concerned about the availability of technical support in geographically dispersed locations throughout rural Louisiana. Another priority concern is insuring the security of proprietary information at economically feasible levels for the business or organization.

It is noteworthy that after completing this polling exercise, several participants sought out survey facilitators to converse about mechanisms for bringing college students to remote off-campus locations to assist those with information technology issues and training needs. While survey participants were generally aware of the Louisiana Cooperative Extension Service's (LCES) presence in their community, most had not thought of seeking IT training and education information from this source. Nevertheless, they expressed strong support for the LCES conducting IT outreach and facilitating off-campus Louisiana State University (LSU) student assistance to small rural communities struggling with information technology issues.

## WRITTEN QUESTIONNAIRE SURVEY

Some 193 delegates to the Summit completed a longer, written questionnaire on the subject of IT. Of these, 41% are from communities of 50,000 or less in population, 68% are female, 66% are between 36-65 years old, and 53% hold at least a college bachelors degree. Several insights were gained from their responses.

### Insight #1 - Technology Use Mirrored at Work and Home

Tourism leaders use the Internet/Web at both work and home.

### Insight #2: Technology Infrastructure Upgrades Needed

Many of Louisiana's tourism enterprises are on the wrong side of the digital divide. In follow-up case study interviews with industry leaders, it was noted that high-speed (i.e. six times faster) Internet connections are desired but not available. This handicap reflects outdated telecommunications infrastructure that needs upgrading to provide rural locations with digital technology now commonplace in most urban locations.

### Insight #3 - Lack Access to Affordable IT Training

Nearly all tourism leaders completing surveys are strongly interested in upgrading their IT skills, and they are willing to spend time and money. Despite this, almost one-half lack access to readily available, affordable information technology training. This might present an opportunity for educational organizations, state agencies and private industry to explore collaborative opportunities for providing such training on a statewide basis.

### Insight #4: Adequate Rural Technology Support Needed

While many tourism enterprise leaders have mastered elementary computer skills, few are learning more complex IT applications. This will be necessary to compete in the years to come.

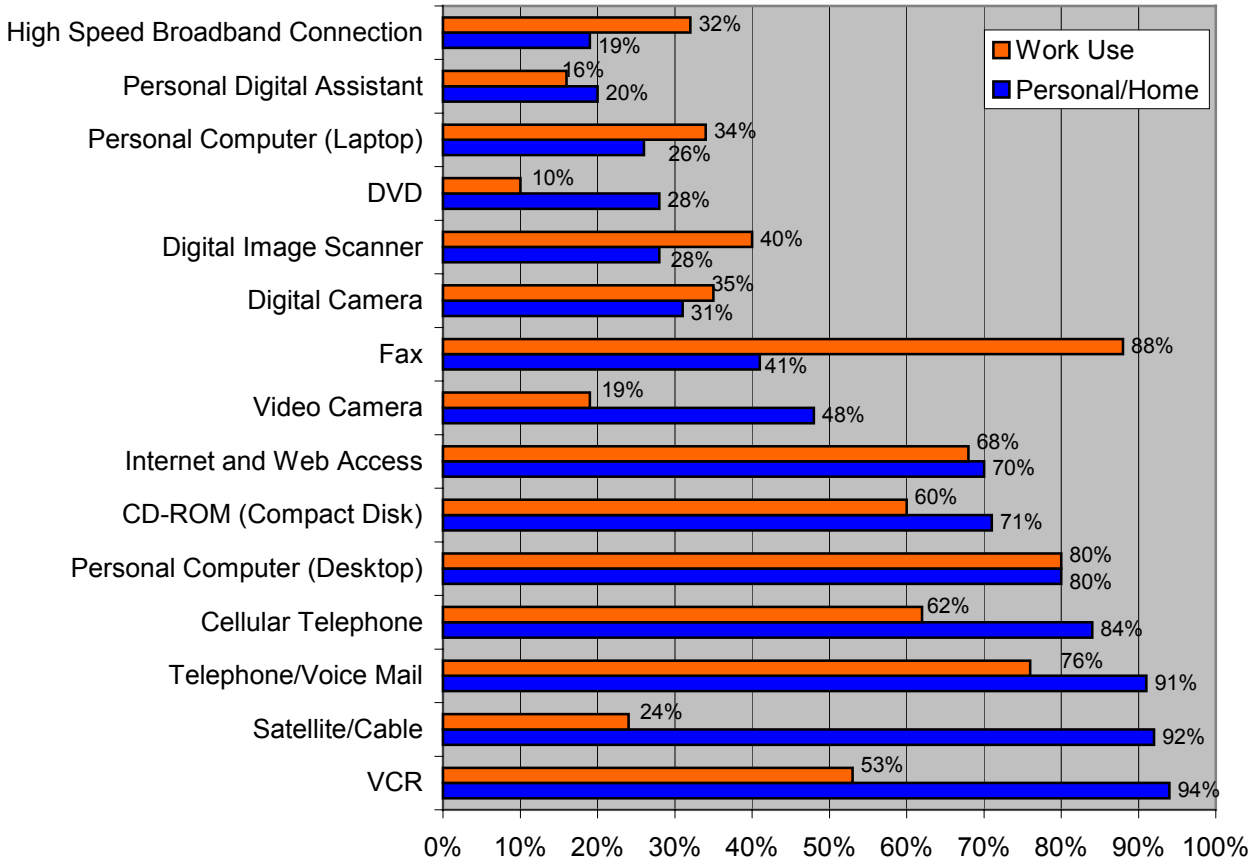
There also appears to be a shortage of skilled professionals located in rural areas to assist with IT questions, issues and troubleshooting.

The following sections contain the analysis of the responses to the written questionnaire. *The numerical results from this written questionnaire survey appear in data tables provided in Appendix 2.*

## Section 1: YOUR TECHNOLOGY USE:

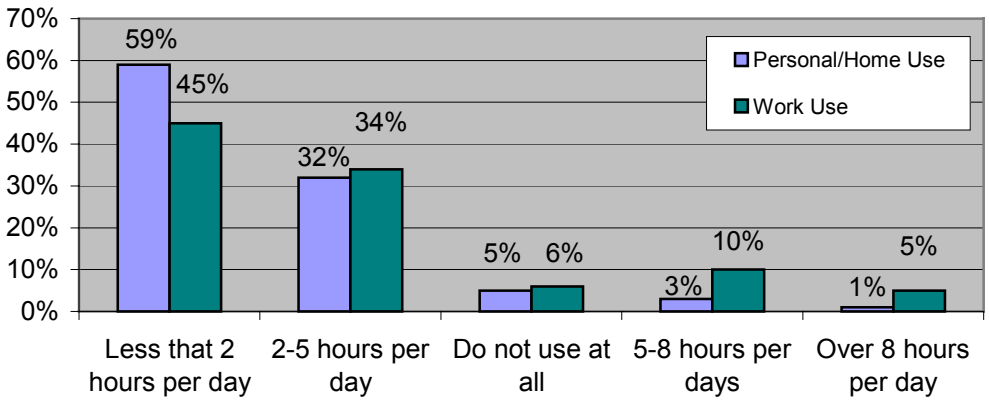
***Which of the following technologies do you use at home and work?***

Tourism is becoming increasingly dependent on modern information technology, yet three out of ten respondents reported not having Internet/Web access and two out of ten still do not have a desktop computer at their place of work. Almost 67% use dial-up Internet connection having a relatively slow, 28.8- 56k baud rate and less than 33% have high-speed broadband access to the Internet. In our estimation, these low figures suggest that few in Louisiana's tourism industry routinely use the most modern business technologies. As pointed out during the intercept survey, many respondents are concerned over keeping up with technological changes.



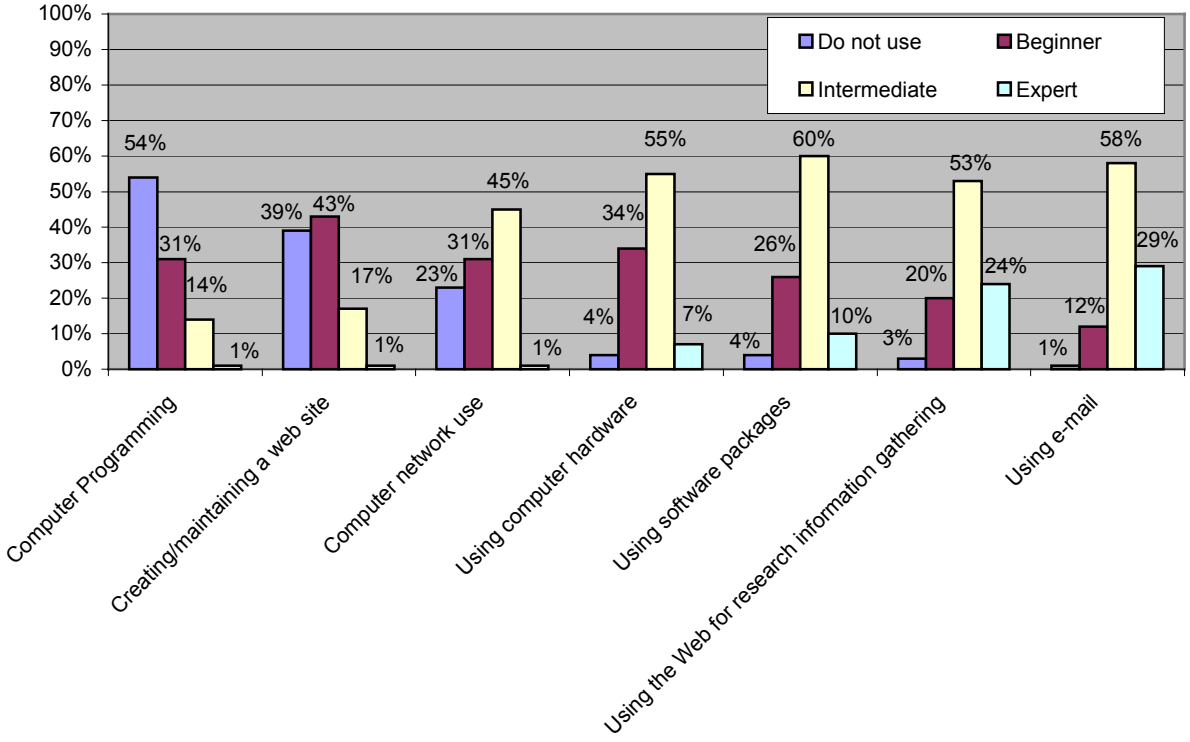

***How many hours per day do you typically use the Internet {including the Web}?***

A majority (59%) uses the Internet less than two hours per day for personal/home use, and 45% stated that they use it less than two hours per day for work purposes. Approximately one-third of all respondents use the Internet between 2-5 hours per day at home and work.




***How would you rate your skill level in using the following tools?***

Respondents were asked to rate their computing skill levels. In excess of sixty percent rated their skills as being "intermediate" or "expert" in matters relating to computer hardware and software. Seventy-seven percent felt that they had adequate web-research skills, while almost ninety percent are adept at using e-mail. Yet, less than one-percent of respondents considered themselves "intermediate" or "expert" in regards to computer programming, and eighteen percent felt that they had some capability in creating/maintaining a web site. Fifty-four percent know little of computer network use.



## Section 2: TECHNOLOGY TRAINING:

A large majority of respondents (82%) indicated interest in upgrading their skills in computing and other information technology usage. Over one-half of those surveyed stated that an organization that provides training in computing and other information technology is readily available to them. However, forty-five percent of respondents answered "no" and "do not know" of an organization readily available to them for computing and information technology training.

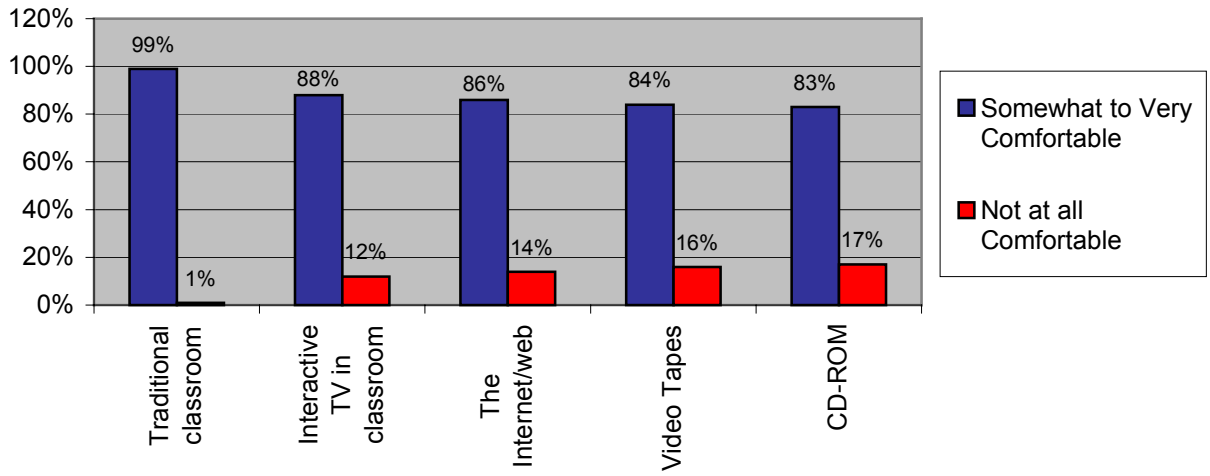
Respondents were asked to provide information regarding an appropriate registration fee for computing and information technology training, and 52% of respondents are willing to pay between $50 and $100 per training course. One-fourth of respondents felt that a registration fee of $50 or less was appropriate.

***How many miles are you willing to travel {ONE-WAY} to attend training on using a computer and other information technology?***

Seventy-six percent of those surveyed are willing to travel a one-way distance of 50 miles or less in order to receive computing and/or information technology training. Within a fifty-mile radius, of Baton Rouge, for instance, the following parishes (or parts thereof) could be served: West Baton Rouge, West Feliciana, East Feliciana, Livingston, St. Helena, Tangipahoa, Ascension, St. John The Baptist, St. James, Assumption, St. Martin, St. Mary, Iberia, Lafayette, Iberville, and St. Landry. Only eight percent of those surveyed indicated a willingness to travel over 100 miles (one-way) for information technology training.

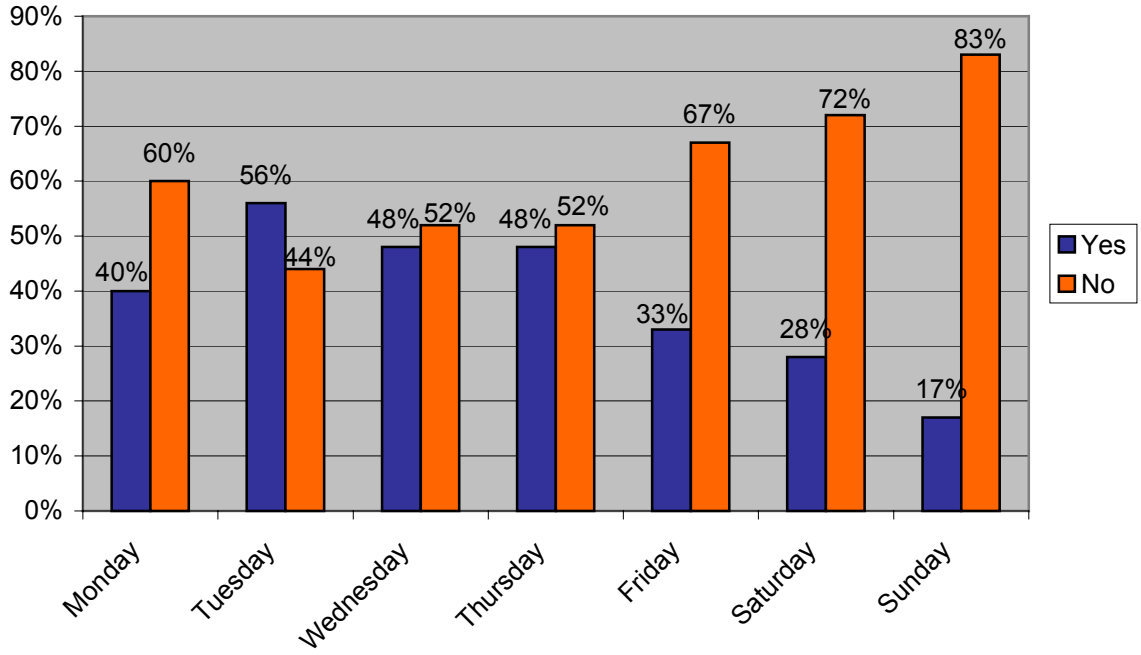
***Would you be comfortable with training on computing and other information technologies through these methods?***

The majority of respondents (99%) are most comfortable with the traditional classroom and instructor setting. Respondents' indicated that their comfort levels decrease when other methods of training, i.e. a more technological or electronic format, are used.



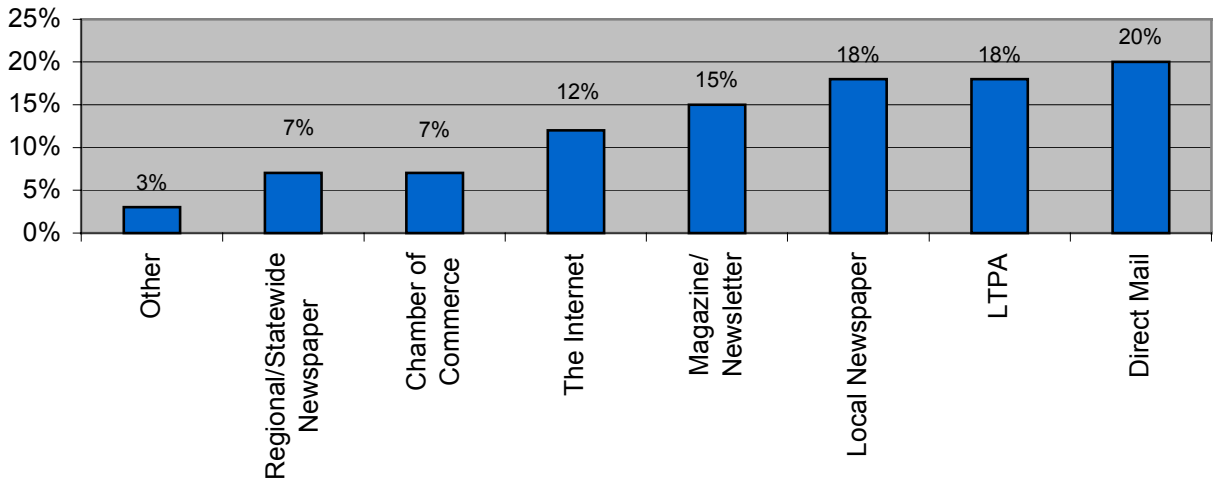

***Which of the following are typically the best days of the week for you to participate in training courses?***

The best appear to be Tuesday, Wednesday, and Thursday. Forty-two percent of respondents indicated that 8 a.m. to 12 p.m. was the best time to participate in training courses. Thirty-eight percent indicated 12 p.m. to 4 p.m.



***From which of the following sources do you learn about various training programs available in your area?***

According to survey respondents, they learn about training programs from many sources. The most popular responses were direct mail, LTPA and local newspapers. But, it may be beneficial for training organizations to use a combination of these sources when advertising such programs.




***Have you attended computing or other information technology training during the past three years?***

Forty-two percent of respondents have not attended any type of IT training in the past three years. Because IT is rapidly changing, three years in "IT time" may create a significant gap between an individual's perceived and actual skill levels.

**Section 3: TECHNOLOGY IN YOUR ORGANIZATION:**

***How would you rank your organization's use of computers and other information technologies?***

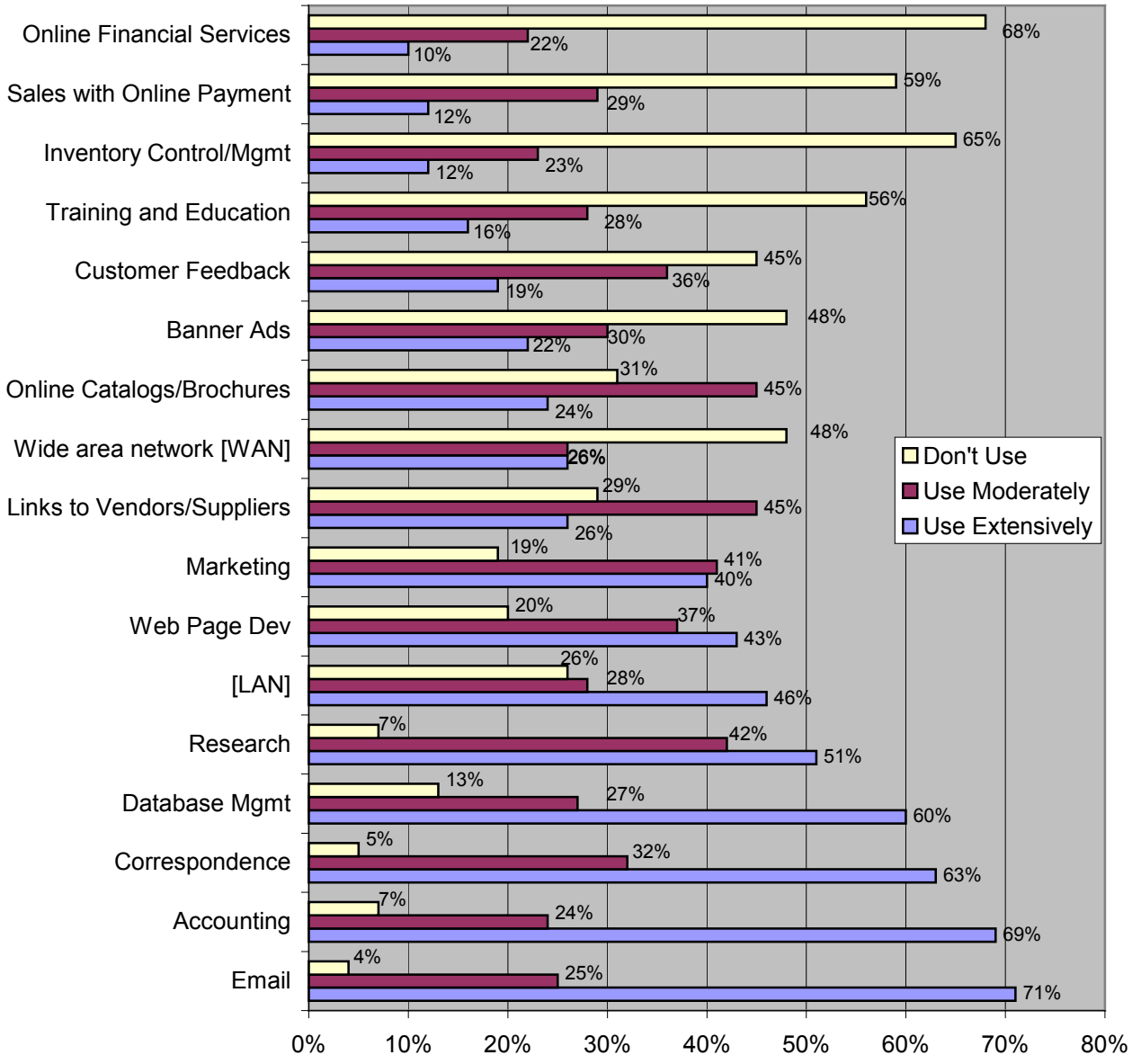
Eighty-one percent of respondents rank their organization's use of computers and other information technologies as proficient to intermediate. This response may merit further attention due to the fact that 42% of respondents stated that they have not received any computing or other IT training in the past three years.

***How often does your organization use technology for the following activities?***

Ninety-five percent of respondents utilize technology for general correspondence/communication in their organization. Twenty percent stated that their organization does not use web page development technology. Respondents stated in the intercept survey that one of the benefits that IT provides is a linkage to vendors and suppliers, yet, twenty-nine percent of the respondents

stated that their organization does not use the Internet to communicate with vendors and suppliers.

A large portion of respondents stated that their organization does not use many of the tools that IT offers. These opportunities involve online catalogs, prices, services, brochures, electronic advertising via banner ads, customer feedback and evaluation, training and education, and completing sales purchases with on-line payments.

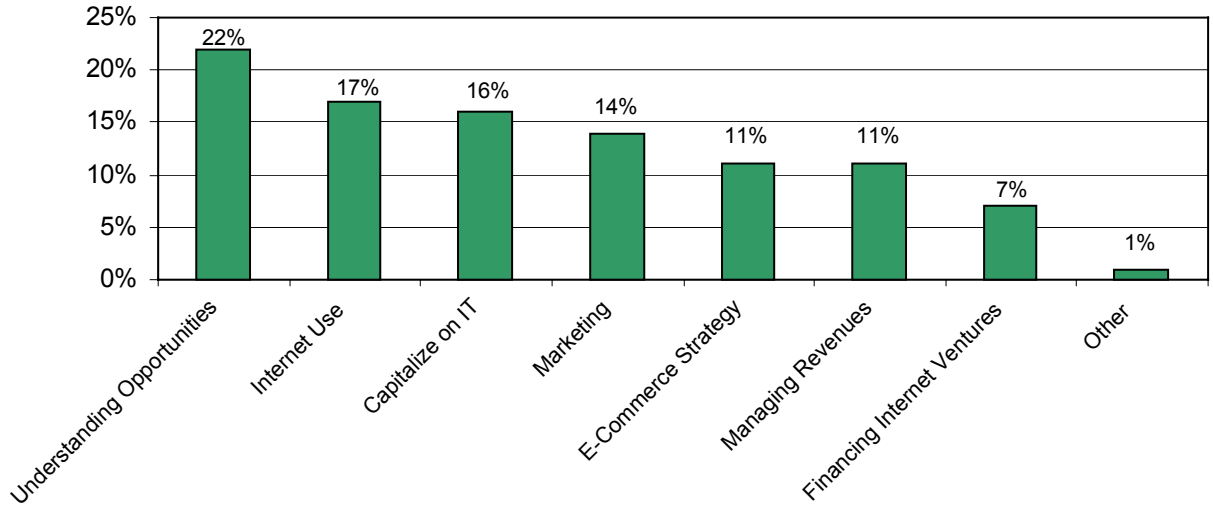



***Is your organization considering expanding its use of information technologies?***

Fifty-seven percent of all respondents stated that their organization is considering expanding IT use. This shift towards a more advanced level of digital inclusion will create an environment of change.

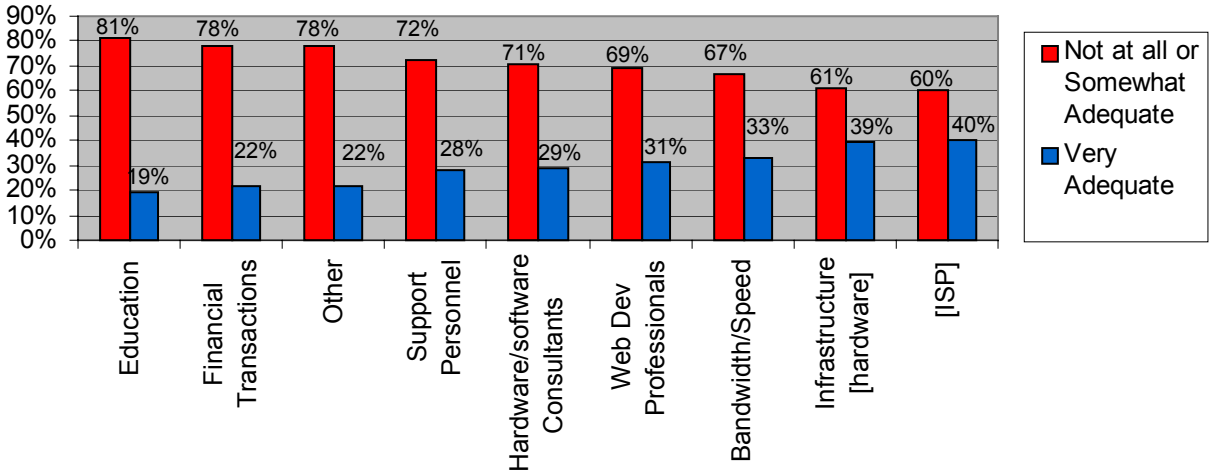
***What are the greatest challenges in expanding your organizations use of information technologies?***

Twenty-two percent of respondents felt that the greatest challenge in expanding their organization's use of IT is understanding the opportunities available via information technology. Seventeen percent felt the greatest challenge was understanding how the industry was using the Internet.




***How adequate is technology support available to your organization?***

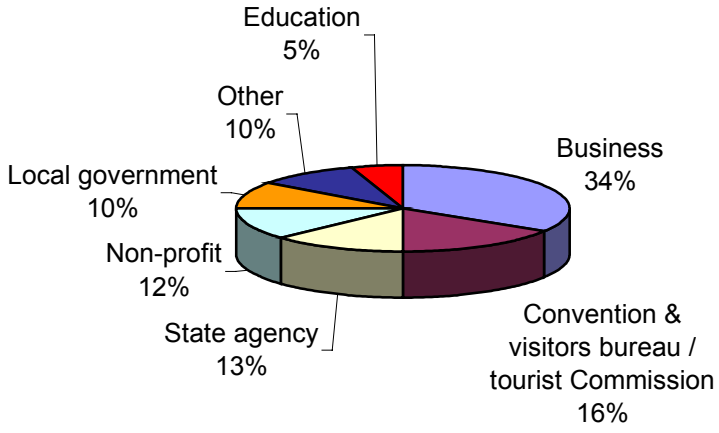
The adequacy of technology support within respondent's organization would appear to be poor. The graph below shows that respondents feel technology support is somewhat or not at all adequate for learning about IT, hardware/software consultations, web development, bandwidth/Internet access speeds, infrastructure (i.e. hardware), and Internet Service Providers (ISP).



## Section 4: ABOUT YOUR ORGANIZATION:

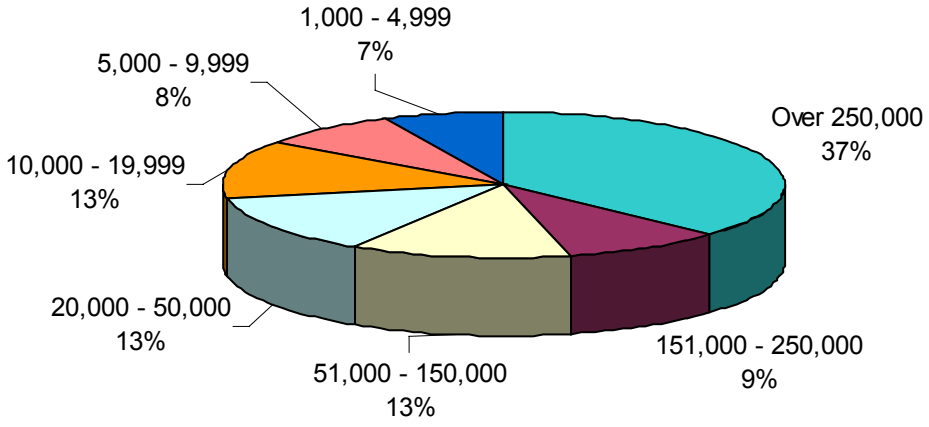
***What is the nature of your organization?***

The largest number of survey respondents (34%) characterized their organization as a business, and 16% as a CVB/Tourist Commission. The third largest number of respondents are associated with state agencies (13%).




***What is the size of the community where your organization is located?***

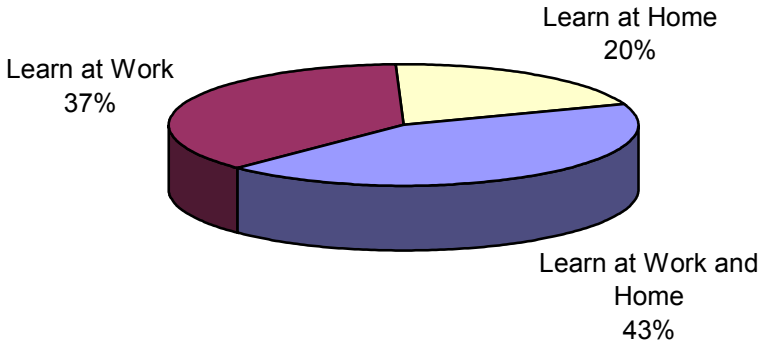
Most respondents (59%) were from metropolitan areas with a population that exceeded 50,000. Forty-one percent of respondent's organizations were from communities with population sizes ranging from 1,000 – 50,000.



**Section 5: ABOUT YOU:**

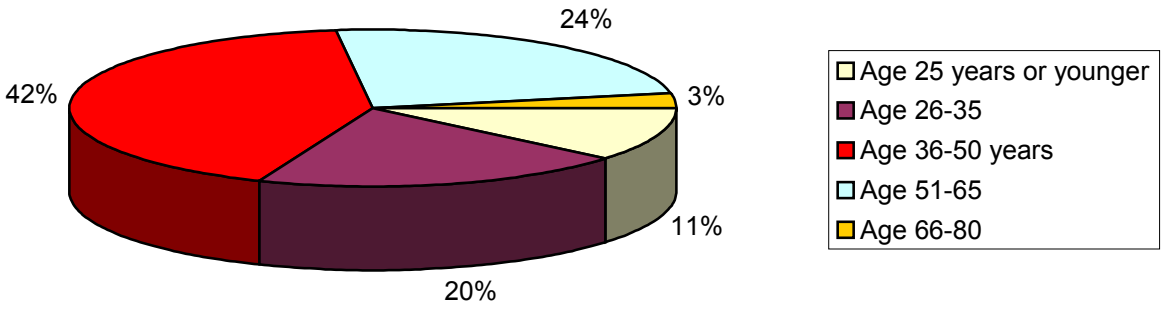
***When learning new information technology skills, do you generally?***

Forty-three percent of all respondents learn new IT skills at home and work, applying these new skills as needed in both arenas. However, over one-third of respondents initially learn new IT skills at work.



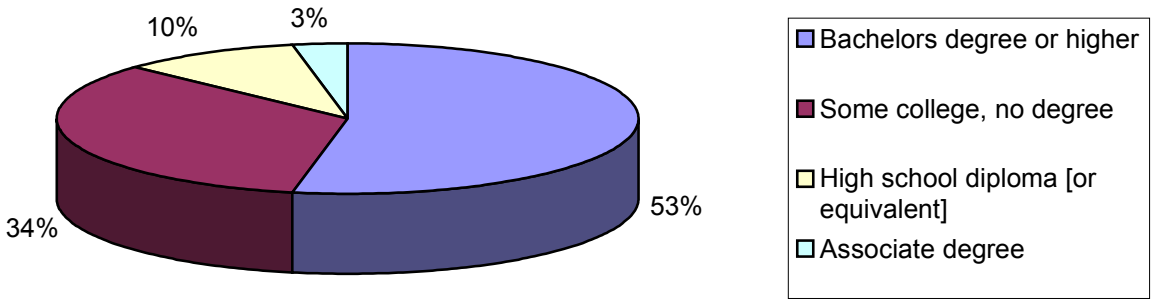

***What is your age?***

Forty-two percent of respondents are between the ages of 36-50, while one-fourth of participants are ages 51-65. Twenty percent are between the ages of 26-35.



***What is your highest level of formal education?***

Over half (53%), of survey respondents have earned their bachelor's degree or higher. One-third of respondents have some college experience, but received no degree and ten percent have earned their high school diploma or equivalent.




## CONCLUSIONS

This report provides a snapshot of the opinions held by a segment of Louisiana's tourism industry concerning their adoption and use of information technology at home and in the workplace. The respondents indicated that they routinely use various information technologies, but that additional assistance is needed to accelerate the process of IT adoption. They noted a distinct need for localized IT training opportunities to allow for continuing education and advancement of their IT skills. It is evident that IT is changing, but the velocity of change is an area of concern and focus. The industry must keep up or be left behind. Because professional development must be offered to all levels of users, a three-tier program may be needed to accommodate beginners, advanced, and intermediate users.

Research has shown that travelers are more sophisticated and increasingly relying on electronic technology to "look and book." Today's travelers want information "on demand" and the industry's organizations must strive to develop web sites with the best and most direct data available. Advances in technological infrastructure are needed, such as the use of GPS (Global Positioning Systems) in all welcome centers and CVB/Tourist Commissions to assist visitors in identifying destinations and housing, securing directions, or finding and transacting for goods and services.

Further research may determine if IT is being used extensively, possibly beyond a primary way. Are computerized reservations a standard in most operations of any size? Is IT permeating the small and medium enterprise industry portions? Is the industry utilizing IT to allow for horizontal communication and interaction amongst all industry professionals?

Small communities and rural areas have traditionally had poor access to expertise and data, because they do not possess critical masses in terms of numbers of residents and other various important facilities. But, with the advancement and adoption of technology, these small communities and rural areas can be on more equal footing and capacity of influence. By making the voices of small or remote participants heard among all in a network, IT helps to level the playing field. However, an automatic "even playing field" is not rendered merely by IT's presence and availability. These modern tools must be continually developed. Constant attention and education/training are essential to capitalize on the many opportunities that IT has to offer.