Fall 10-5-2021

The status of support in Iranian library software

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Abstract

The main purpose of this study is to identify the status of support in Iranian library software. This research is among the survey-analytical researches. The statistical population of the present study included commercial library software design companies active in Iran and also the managers of central libraries of public universities in Tehran. Descriptive statistics (frequency, mean) and inferential statistics with SPSS software (mean, standard deviation, t-test) were used to analyze the data. The status of library software support in the surveyed universities is such that the quality of services with an average of 3.49 and a standard deviation of 0.43 is average, the status of support types with an average of 3.64 and a standard deviation of 0.53 is average, development and maintenance with an average 3.49 and the standard deviation is 0.61 on average, software guidance with an average of 3.25 and the standard deviation is 0.40 on average. In general, the support situation in Iranian library software is average. It seems that companies can increase the quality of services provided by adjusting the costs of support services, especially by increasing the speed of diagnosing and solving customer problems, and increase and improve the capabilities and features of software guides, as well as upgrade maintenance levels. And software development to be effective in changing this situation.

Key words: Support, library software, after sales service, development and maintenance, software guide

Introduction

Library software should have the necessary capabilities and performance for librarians as well as end users. If librarians become more familiar with the capabilities, facilities and features of library software, they can help software designers to provide more efficient and complete products (Tahmasebi Limoni, Emami, Ghiyasi, 2017). According to Gronroes (1999), after-sales service is often the answer to a customer problem. These problems include inefficiency of the product, problem diagnosis, help of experts in solving the problem, lack of knowledge about how the product is used by the customer and other factors. Many libraries find library software support status unsatisfactory. One of the main problems in after-sales service and support is the poor performance of some companies in fulfilling their obligations to the customer. Some companies cause customers to be unmotivated and distrustful of support contracts and manufacturing companies. As a result, customers are reluctant to pay for contract renewals. Finally, this can lead to software upgrades, poor library performance, wasted time and money designing or purchasing new software. The high cost of support is one of the problems that most libraries face. In the past, most researchers have paid attention to software production, design and usability, and no special attention has been paid to software support.

Adamonis (2006) in a research model of user support processes and software maintenance support and process model introduced the main elements (basic methods) of the process. This model is defined in terms of basic practices and products related to their work. Kilina, Maurice, Grossman, and Fitz (2011) in their study stated that Support specialists still face difficulties in resolving remote software problems. Most of these

studies have briefly mentioned the importance of support services, the need for training in the use of software, easy access to support experts and software upgrades and maintenance. This issue does not seem to have been widely addressed. Support seems to be an area of service that has received very little attention so far, both domestically and in other countries.

While support is a bridge between software designers and software users, on the one hand, users express their needs and desires to the support team, and on the other hand, the support team to the weaknesses, strengths of software and users' demands. Designers say. This allows the software capabilities to be developed according to the wishes and needs of the customer and leads to the design of user-friendly software. Thus, this study seeks to answer this fundamental question: What is the status of support in Iranian library software?

Research objectives

1. Identify the quality of services in the support of Iranian library software

2. Identify the status of support types (email, phone call, online, etc.) in Iranian library software

3. Identify the status of development and maintenance services (preventive, corrective, adaptive, complementary) in the support of Iranian library software

4. Identify the status of the software guide in supporting Iranian library software

Research questions

1. How is the quality of services in supporting Iranian library software?

2. How is the status of various types of support in Iranian library software?

3. What is the status of development and maintenance of Iranian library software support?

4. What is the status of the software guide in supporting Iranian library software?

Research Methods
Current research was a survey-analytical and was conducted in a mixed way (quantitatively and qualitatively). To analyze the data obtained from the questionnaires according to the research questions, descriptive statistics include; Frequency, mean and inferential statistics were used using SPSS software and t-test, mean, standard deviation. Interviews with software company support managers were conducted with the aim of gaining more in-depth information about support commitments and processes.
Distribution and collection of research questionnaire among the managers of the central library system of Tehran universities and interviews with the support managers of library software design companies have been done simultaneously.
In order to evaluate the reliability and reliability of the questionnaire, the kappa coefficient was calculated to be 0.509, which has a relatively high reliability. Given that the reliability coefficient is more than 0.4; The reliability of the questionnaire is acceptable.

Findings

Question 1: What is the quality of services in supporting Iranian library software?

Table 1- Support status in each of the Iranian library software

Very high	High	Medium	Low	Very Low	Kind of Support	Software
1	5	2	0	0	The quality of service	A
3	5	0	0	0	Types of support	
2	4	2	0	0	Development and maintenance	
4	4	0	0	0	Software Tips	
1	0	0	0	0	The quality of service	B
0	1	0	0	0	Types of support	
1	0	0	0	0	Development and maintenance	
0	0	1	0	0	Software Tips	
1	0	0	0	0	The quality of service	C
1	0	0	0	0	Types of support	
0	1	0	0	0	Development and maintenance	
0	1	0	0	0	Software Tips	
1	2	1	0	0	The quality of service	D
1	2	1	0	0	Types of support	
0	4	0	0	0	Development and maintenance	
2	2	0	0	0	Software Tips	

Regarding the status of software support (A), it should be said that 8 of the surveyed universities use this software for their libraries, in their opinion, the quality of software services (A) in two cases is average, 5 are good and 1 very good case, types of software support (A) in 5 good cases and 3 very good cases, software development and maintenance (A) in 2 average cases, 4 good cases and 2 very good cases and software tips (A) It is good in 4 cases and very good in 4 cases.

Regarding the status of software support (B), it should be said that 1 of the surveyed universities use this software for their library, which in the opinion of this university is very good quality of software services (B), types of soft services Software (B) is good, software development and maintenance (B) is very good and software guidance (B) is medium.

Regarding the status of software support (C), it should be said that 1 of the surveyed universities uses this software for their library, which in the opinion of this university is very good quality of software services (C), types of software support (D) Very good, software development and maintenance (D) Good and software guidance (D) good.

Regarding the status of software support (E), it should be said that 4 of the surveyed universities use this software for their libraries. Types of software support (E) in 1 medium case, 2 good cases and 1 very good case, software development and maintenance (E) in all 4 good cases and software tips (E) in 2 good cases and 2 items are very good.

Question 2: How is the quality of services in supporting Iranian library software?

Table 4- Status of service quality in library software support

Significance level	Degrees of freedom	Standard deviation	Average	The quality of services
0.000	13	0.60	3.59	Education
0.000	13	0.75	3.19	Cost
0.000	13	0.42	3.58	Behavioral aspects
0.000	13	0.48	3.60	Professional judgment
0.000	13	0.62	3.48	responsiveness
0.000	13	0.46	3.47	Reliability

According to Table 4, the quality of services in the support of library software in the surveyed universities is such that education with an average of 3.59 (approximately equal to the statistical average of "3") and a standard deviation of 0.60 is average, the cost is an average of 3.19 (Approximately equal to the statistical average of "3") and the standard deviation is 0.75 on average, Behavioral aspects with the average of 3.58 (approximately equal to the statistical average of "3") and the standard deviation of 0.42 to the average, professional judgment with the average of 3.60 (Approximately equal to the statistical average of "3") and the standard deviation is 0.48 on average, the response with the average of 3.48 (approximately equal to the statistical average of "3") and the standard deviation of 0.62 is on average, the reliability with the average of 3.47 (approximately equal With a statistical average of "3") and a standard deviation of 0.46 on average.

Question 3: What is the status of various types of support in Iranian library software?

Table 5 - Status of types of support in library software

Types of services	Significance level	Degrees of freedom	Standard deviation	Average
24-hour service	0.000	13	0.74	3.36
Telephone service	0.000	13	0.78	4.00
Email service	0.000	13	0.75	3.43
Online Chat	0.000	13	1.28	3.36
Presence on site	0.000	13	0.99	3.28
Remote service	0.000	13	0.65	4.43

According to Table 5, the status of various services in support of library software in the surveyed universities is such that 24-hour service with an average of 3.36 (approximately equal to the statistical average of "3") and a standard deviation of 0.74 is average, telephone with an average of 4.00 (More than the statistical average of "3") and the standard deviation of 0.78 is high, via email with an average of 3.43

(approximately equal to the statistical average of "3") and the standard deviation of 0.75 is average, online chat with an average of 3.36 (approximately Is equal to the statistical mean "3") and the standard deviation is 1.28 on average, the on-site presence is on average 3.28 (approximately equal to the statistical mean "3") and the standard deviation is 0.99 on average, remotely on average 4.43 (more The statistical mean is "3" and the standard deviation is 0.65.

Question 4: How is the status of development and maintenance of library software support?

Table 4- Software development and maintenance status in library software support

Significance level	Degrees of freedom	Standard deviation	Average	Maintenance and updating
0.000	13	0.46	3.68	Supplementary maintenance
0.000	13	0.94	3.43	Adaptive maintenance
0.000	13	1.31	3.21	Corrective maintenance
0.000	13	0.93	3.64	Preventive Maintenance

According to Table 4, the status of updating and maintenance of library software support in the studied universities is as follows: Supplementary maintenance with an average of 3.68 (approximately equal to the statistical average of "3") and standard deviation of 0.46 is average, adaptive maintenance With an average of 3.43 (approximately equal to the statistical average of "3") and a standard deviation of 0.94, the correctional maintenance with an average of 3.21 (approximately equal to the statistical average of "3") and a standard deviation of 1.31 is average, preventive maintenance with an average 3.64 (approximately equal to the statistical average of "3") and the standard deviation of 0.93 is average.

Question 5: How is the status of the software guide in library software support?

Table 5: The status of the software help in library software support

Significance level	Degrees of freedom	Standard deviation	Average	Software Help
0.000	13	0.81	3.11	Format
0.000	13	0.50	3.32	Style
0.000	13	0.43	3.67	Software tips
0.000	13	0.81	2.89	Content

According to Table 5, the status of the software help of library software support in the studied universities is such that the format with an average of 3.11 (approximately equal to the statistical average of "3") and a standard deviation of 0.81 is average, light with an average 3.32 (approximately equal to the statistical average of "3") and the standard deviation is 0.50 on average, the software guidance is on average 3.67 (approximately equal to the statistical average of "3") and the standard deviation is on average 0.43, the

content is on average 2.89 (less than the statistical average of "3") and the standard deviation is 0.81.

Conclusion

The present study showed that the support situation in Iranian library software is moderate. The reason for this functional similarity can be attributed to the commonalities in the types of needs and expectations, the extent of libraries, the level of skill and literacy of library staff, and the goals of academic libraries. The findings showed that telephones, portals and remote access software are the most widely used and important means of communication with companies. Companies that only design and produce library software are better equipped with up-to-date knowledge of librarianship and computer science, and strive to maintain more software. But in the end, it is the costs and policies of companies in relation to the customer that determine the development and maintenance steps. Maintenance and especially development costs are high and libraries are often forced to ignore them due to lack of funding. Help features in the software are not in good condition. Many end users of the software do not use or ignore the features and capabilities of the software guide when they need them.

However, software companies are advised to try to change and improve this situation and better consider the expectations and needs of their customers. On the other hand, library administrators can also be effective in improving support. In other words, library managers by understanding the importance and role of support services in improving the performance of librarians in providing services to end users, as well as increasing the software life cycle and more and more useful use of software and prevent wasting budget and time for purchases and ways. Launching new software can motivate software companies to improve and upgrade support services. Based on the research findings, it is suggested that software companies, in order to deal with customer problems in a timely and better manner, level requests and problems according to their urgency. Also, for better response, according to the level of requests, separate the ways of contacting support to reduce traffic using a tool.

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