Examination of Vroom's motivational theory: A new marketing strategy in consumers of online document delivery services: Case study of Shahid Chamran University of Ahvaz

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Abstract
This study aimed to identify and test expectancy motivational model as a theoretical framework to explain the reasons motivating expected information consumer's behavior for the selection and use of document delivery services of Shahid Chamran University, Ahvaz. In this study, explanatory survey method was used. In order to test the hypotheses and analysis of model's data, covariance structural equation model-driven approach was used by Amos software version 23. Findings of analytical study shows that information consumers motivational model focusing on the three paths of expectancy, instrumentality and valence, and on the basis of the VIE model, is able to explain information consumers' behavior in the document delivery services of Shahid Chamran University; therefore, the VIE model in this study was confirmed. Also according to the proposed table (Newstrom & Davis, 1968), motivation level of information consumers in their behavioral motivation to use document delivery services of Shahid Chamran University of Ahvaz was predicted to be average.

Key Words: *Expectancy theory; Motivation; Information consumers; Behaviors of information consumers; Information need; Document delivery; Marketing Strategy; Vroom's motivational theory.*

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Introduction

The main objective of motivation research was to explain why behaviors occur. A number of motivational research in libraries and information centers by (Bronstein, & Tzivian, 2013; Sigaard & Skov; 2015; Petri & Govern, 2004; Savolain, 2008, 2012a; 2012b; Vansteenkiste et al, 2005; Shoham, & Strauss, 2008; Lee, 2007) have been conducted given the aim of the research. However, studies to explain the motivational behavior from the perspective of emergence of needs as the first source of motivation conducted in libraries and information science are very rare. Motivation, because of its ability to explain why information user behavior occur from the perspective occurrence of behaviors and needs as the first source of motivation are among important issues in the field of library and information science.

Motivation, which means the force causing movement, direction, continuation or stoppage of the behavior of individual, is among the most foundational issues that should be considered in any anthropocentric context which deals with the human nature and existence. To explain and describe human behavior, motivation requires knowledge of the general characteristics of human behavior. From perspective of psychologists, motivation is a force driving motion due the highest levels of internal need, which requires the highest level of motivation to move towards achieving the preset goals. Motivation is based on knowledge and based on this, a person selected from different options one that is associated with the least failure and the most success based on priorities, attractions and using decision making power and his will. Accordingly, explaining reasons behind behaviors and the motivations is based on psychological factors including cognition, perception, beliefs, views, expectations and measures and reliance on future prospect. Satisfaction of need also as driving force of motivation is among important issues and important theories have been

long developed about it and when it comes to identification of informational behavior of users of libraries and its services, it plays an important role. However, library literature review shows that little focus has been there on needs as the first driver of motion or motivation among information users. Motivation in the context of libraries and information centers is faced with questions like the followings: why users use library resources and services? How despite quality information that providers library provide its users, the users, the users choose other competitors such as Web-based databases outside the library over on reliable and quality library resources and services?

These are among the questions to be explained by the motivation research. Since the main goal of this study was to clarify and explain reasons behind information consumer behavior in document delivery services of Shahid Chamran University, Victor Vroom's Expectancy Theory of Motivation as a conceptual framework was appropriate for the purpose of this research. Expectancy theory of motivation titled as Expectancy, Instrumentality, Valence (VIE Model), was introduced in 1964 by Vroom and aims to explain the reason behind the behavior of employees of an organization in order to identify their motivational behavior in organizational and task-oriented environments. Although this theory does not seem new, it has had an efficient performance in various modern areas like teaching, learning and communication studies in the twentieth century (DeBacker & Nelson, 2000; Hodges, 2004; Palmgreen & Rayburn, 1982; Cooper et al., quoted in Savolainen, 2012 a). Motivational theory of Vroom is among other motivational theories one of the most basic motivational theories in recent years because it deems human beings as the main element of any enterprise and treats his behavior as result of internal motivators (Savolainen, 2008, 2012a; 2012b; Liao et al, 2011; Liu & et al, 2007; Lee, 2007; Chiang & Jang, 2008).

This study that aimed to identify and confirm

a theoretical framework to explain the reasons for behavior of information consumer for the selection and use of document delivery services of Shahid Chamran University of Ahvaz was among researches on identification of information user's behaviors and thus it is an important research. Given such necessity and importance, in the following, the authors discuss conceptual model of Vroom's expectancy theory of motivation to explain motivational behaviors of users of document delivery services of Shahid Chamran University of Ahvaz.

Literature

Motivation means the behavior that internally motivates a person to doing some action, activity or behavior. So, review of literature in a fields related to the behavior of library users can help further this study because a number of motivational research similar to this study are focused on information behavior from the perspective of the needs. Cognitive styles are a value dimension of knowledge creation that effects the information seeking behavior. To provide a clear picture of the information behavior, consideration of the conceptual elements that constitute the foundation of such knowledge are of great importance in study of behaviors resulting from needs or motivations of users of information. "Wilson" (1981) believes that psychological mechanisms are involved in the intellectual and rational process of information seeking. In models of information seeking, decision to search for information in the beginning is considered as a motivational move by information seekers that can have a cognitive or emotional cause. In his view, the information seekers should overcome obstacles that in his opinion are rather psychological before they reach their required information (Khosrowjerdi et al., 2007).

Savolainen (2012) conducted a study titled "Beliefs and information needs as motivators of search for task-oriented information" (Savolainen, 2012 a). The aim of that study was to portray motivators for search for information by comparing the concepts of task-oriented information needs concepts and theory of expectancy.

In 2008, a study was done by "Shoham and Strauss" according to "Alfred Motivational Theory" (1972) to study the information needs of immigrants (Shoham & Strauss, quoted in Savolainen, 2012 a). "Savolainen" (2008) also studies the motivations of unemployed people in search of job information. He classified used in the study the classified theory (Decci & Ryan's efficacy, 1985) (Savolainen, 2008). In 2007, a "chat reference" as a means of communication was studied based on motivation theory of Vroom by "Lee" (2007) (Lee, 2007). Among motivational studies that have studied motivational theories in information science is "Brostin and Tzavans" (2013). The two researchers examined the efficacy perceptions among professionals engaged in library and information science (Brostin & Tzavans, 2013; quoted in Sygard and Askav, 2015). "Wilson" (1981) developed information seeking behavior model based on "Bendora self-efficacy theory" (Savolainen, 2012 b). He defined self-efficacy as a confounding factor affecting the selection and use of information resources (ibid). "Savolainen" (2012 A) also used a cognitive theory of psychology which has been first developed by Eccles and Wigfield (Eccles & Wigfield, 2000) in the field of information science (Savolainen, 2012 a). In a conceptual analysis, "Sygard and Askav" (2015) proposed a motivational model based on a cognitive theory. The two researchers evaluated cognitive motivational model developed by Savolainen (Savolainen, 2012 a) in the field of search for information in (Sygard and Askav, 2015).

Conceptual framework and research hypotheses based on Vroom's motivation theory

Motivation Theory of Vroom (1964) states that before a person chooses a behavior or activity, the person evaluates different alternatives. Individual assessment is subjective

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and estimative and based on the elasticity of valences defined in setting priorities as emotional actions and also based on expectations, actions and results as the end of the activity. Based on a cognitive map that contains a set of beliefs and subjective perceptions, one performs feasibility study of the selected option. Then, based on such subjective estimate, one decides which behavior or activity should be preferred over other voluntary activities. Based on this theory, probable or selected behavior or activity of a person forms due to impact of three paths. Or in other words, a person is motivated and shows a motivational behavior when he has estimated threes paths in his mind. Directional hypotheses in Motivation Theory of Vroom are based on the followings:

1) Expectancy path: according to the theory of motivation of Vroom, expectancy is a subjective likelihood of the belief that a certain level of activity or effort by individual will make him able to successfully reach a goal. In other words, expectancy refers to subjective estimate of a person of his performance to ability to perform the task or activity or behavior on the basis of the level of effort (Campbell et al., 1970; quotes Petri and Goverrn, 2012).

So, expectancy path is obtained through the following micro-paths: a) the effect of variable of effort on performance. One of the hypotheses in the conceptual model is that the effort will lead to performance; this component is focused on the individual's subjective estimate of the relationship between an increase efforts and achievement of worthwhile results or rewards. There are two subjective estimate or likelihood in this regard: a) the possibility of further efforts to achieve better performance (Effort→Performance) $(E \rightarrow P)$ that is called expectancy level I and b) the possibility of better performance for achieving valuable rewards that is called performance – reward beliefs or expectancy level II. According to Vroom's motivational

theory, effort refers to perceived probable energy required to perform an activity or show a behavior and performance refers to level of subjective judgment of individuals in a certain activity. Here, variable of expectancy refers to subjective perception of how successfully information user (expectancy belief) achieve such service provider and effort considered by information consumer (effort belief) to perform document delivery service of Shahid Chamran University of Ahvaz through the perception of the least occurrence of probable error (performance belief). Thus, the first hypothesis of this research rises as follows:

The first hypothesis: Expectancy path in model of this research can explain motivational behavior of consumers of document delivery services of Shahid Chamran University of Ahvaz.

2) Instrumentality path: Instrumentality of probabilistic perception holds that individual is able based on his performance beliefs to achieve better result levels. Thus, motivational behavior of consumers of document delivery services of Shahid Chamran University of Ahvaz through instrumentality path can be explained via measuring effect of variable of performance on reward. In this study, instrumentality means that if information consumer is able to run document delivery services page of Shahid Chamran University of Ahvaz, the likelihooh that he can satisfy his information needs through running such services will increase. Thus, second hypothesis of this research is as follows:

The second hypothesis: Instrumentality path in proposed model of the research can explain motivational behavior of consumers of document delivery services of Shahid Chamran University of Ahvaz.

3) Valence path: Vroom defines term valence as subject judgment of people of feasibility of results. Thus, there can be significant difference between predicted valence and actual results (reward) (Vroom, 1964). Thus, this variable is related to importance of reward for
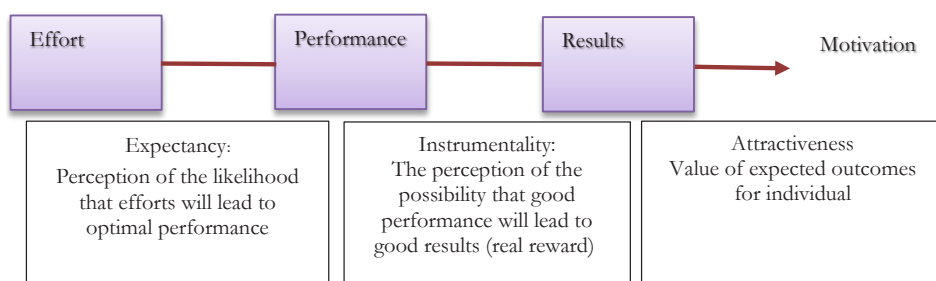
Figure 1. Conceptual model of behavior of information consumers of document delivery services of Shahid Chamran University of Ahvaz based on Vroom's expectancy model of motivation
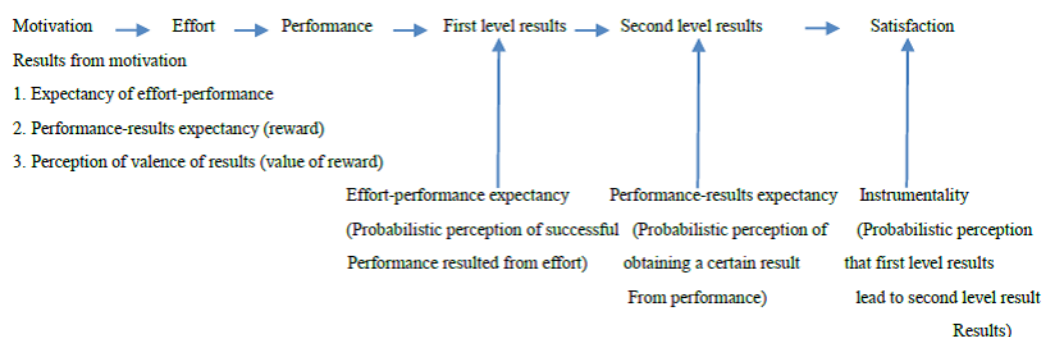
Figure 2. Conceptual Model of Lawler (1968) of Vroom's expectancy theory of motivation (Source: Adapted from the book Organizational behavior 1: Essential theories of motivation and leadership)

individual or valence and the extent to which it satisfies unsatisfied needs of a person (ibid). Thus, valence path can be explained through a) effect of reward on performance and b) effect of valence on reward and c) effect of valence on satisfaction. Here, valence means that information documents have different values, thus consumers of information believe that they reach valuable documents through running page of document services delivery of Shahid Chamran University (performance beliefs) that can satisfy their information need and such process finally satisfies them in interaction with such service provider. Thus, third hypothesis is as follows:

Third hypothesis: Valence path in proposed model can explain motivational behavior of consumers of document delivery services of Shahid Chamran University of Ahvaz.

Given this research aimed to explain reasons behind behavior of information consumers of document delivery services of Shahid Chamran University of Ahvaz, hypotheses four and five are as follows:

Fourth hypothesis: It seems that VIE model can explain motivational behavior of consumers of document delivery services of Shahid Chamran University of Ahvaz.

Fifth hypothesis: It seems that proposed model is sufficiently valid to explain motivational behavior of consumers of document delivery services of Shahid Chamran University of Ahvaz.

Research methodology

Explanatory survey method was used in this study. Explanation in its general sense refers to the explanatio that provides more information about a particular topic. Each explanatory statement is a response to questions starting with "why" (Little, Daniel, 1991; translated by Soroush, 1994). Thus, according to the conditions of this study, explanatory survey method, which is a good way to study the behavior of consumers, was used.

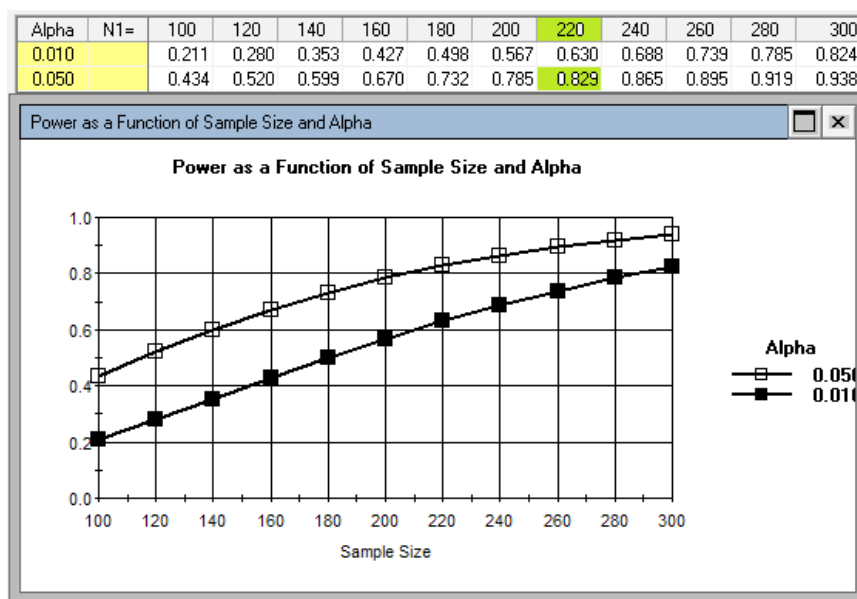## Statistical population, sampling and sample size

The population of this research comprised Shahid Chamran University's consumers. The information consumers refers to graduate students and faculty members of Shahid Chamran University who order ISI papers through document delivery service page that has an indirect service provider. Articles ordered by information consumers are received by document delivery services system, which is an information mediator, and is sent by email to consumer of information after a while.

Borg and Gall (1979) stress that in correlation studies population members should be uniformed based on a common feature to make control of excluded variables by author possible (Borg & Gall, quoted in Lee, 2007). So in this study, the main cause of uniformity and consistency of study population was the attribute of having e-mail as all consumers of information resources services page of Shahid Chamran University share this feature. The population of this study was a total of 6273. To estimate the sample size, software SPSS Sample Power was used; by considering the maximum effective independent variable (five variables) on the dependent variable and error percentage of 0.05, power of higher than 0.80 and 0.05 effect size, sample size was estimated at 220. Optimal percent errors was 0.05, power was 0.80 power and effect size of 0.05 are used for statistical analytical methods based on regression. See Chart (1).

Research Instrument

In order to develop tools of this study, researchers first made a detailed study of models and concepts of Motivational Theory of Vroom and secondly based on literature that had used Vroom's motivational theory, in the fields of communications, marketing, retail, consumer behavior, behavior, intelligence, chat reference, weblog design, authors developed questionnaires. In order to design the questionnaire of this study, researchers designed items of questionnaire based on different questions developed based on motivation theory and models derived from research conducted by Vroom (Porter and Lawler, 1968; Burton et al., 1993; Snead & Harrell, 1994; De Leo and Pritchard, 1974; quoted in Lee, 2007; Liao et al., 2011; Chiang and Zhang, 2008). In this study, First: the valence (Porter and Lawler, 1968), valence ((Pritchard and Sanders, 1973; quoted in Lee, 2007), and goodness of results (Galbraith and Cummings, 1967; quoted Lee , 2007), and secondly, expectancy, which is related to measurement of the con-

Alpha	N1=	100	120	140	160	180	200	220	240	260	280	300
0.010		0.211	0.280	0.353	0.427	0.498	0.567	0.630	0.688	0.739	0.785	0.824
0.050		0.434	0.520	0.599	0.670	0.732	0.785	0.829	0.865	0.895	0.919	0.938

▲Chart 1. Determining the sample size

sumer mindset towards performance information (Burton et al., 1993; Snead & Harrell, 1994; Stahl & Harrell, 1983; quoted in Lee, 2007); and thirdly, rewards as the functional consequences (Schwab, and Cummings, 1979; quoted in Lee, 2007) were defined that were considered in the design of the questionnaire in this study. Then, by comparing concepts of Vroom theory and motivation-oriented research and adaptation of them to conditions and features of studied webpage of Shahid Chamran University, multiple choice questionnaire was developed on Likert scale (5 = very high to 1 = very low) to measure perception of components of motivational theory with regard to document delivery services of Shahid Chamran University of Ahvaz.

Validity and reliability

Factor analysis as one of the ways to check the construct validity is based on the likelihood that many variables that have a few common factors representing their common correlations. In the present study, to verify the factor validity of the construct instrument related to variables of the study, structural equation modeling approach was used. The results of factor validity related to the variable of instru-

mentality and expectancy are shown in Tables (1) and (2).

Indices evaluating the overall indices the overall factor model of variable of instrumentality indicates that the data fitted to the model. Given values of these indices and range of goodness, factor model was good for variable of instrumentality. Based on the estimated amounts in the table above (factor loading, the critical significance level), it can be said that factor loadings of all variables of instrumentality were in favorable condition, in other words, correlation of expectancy with corresponding representatives related to this variable was estimated high and thus instrument related to this variable had factor validity.

Indices evaluating the overall factor model suggest that the data fitted to the model. Based on the estimated amounts in the table above (factor loading, the critical significance level), it can be said that factor loadings of all variables were in favorable condition, in other words, correlation of expectancy with corresponding representatives related to this variable was estimated high and thus instrument related to this variable had factor validity. Also in this study, to examine the factor validity of

Index	DoF	Relative chi square	CFI	PCFI	RMSD	Holter
Value	5	2.30	0.99	0.50	0.07	259

▲ Table 1. Indices evaluating the overall factor model of variable of instrumentality

Index	DoF	Relative chi square	CFI	PCFI	RMSD	Holter
Value	5	2.48	0.99	0.50	0.08	205

▲ Table 2

Variable	Convergent validity	Discriminant validity			Reliability	
	AVE	Fornell and Larcker criterion	Cross load-ing	HTMT	Cronbach's alpha coefficient	Composite reliability
Expectancy	0.72	Confirmed	Confirmed	Confirmed	0.90	0.91
Instrumentality	0.76	Confirmed	Confirmed	Confirmed	0.92	0.92
Valence	0.72	Confirmed	Confirmed	Confirmed	0.90	0.91

▲ Table 3. Indices evaluating factor validity of instrument measuring expectancy, instrumentality and valence constructs

expectancy, valence and reward constructs, confirmatory factor analysis techniques convergent validity index (AVE) and Discriminant Validity (Fornell and Larcker criterion, cross loading and HTMT index were used and to evaluate reliability of instrument of constructs, Cronbach's alpha and composite reliability techniques were used. See Table (3). Based on the values of the table (5): AVE index and indices relating to the discriminant validity indicated that that convergent and discriminant validity of variables of expectancy, valence and instrumentality constructs were in good condition. 2 - Cronbach's alpha coefficient values and composite reliability indicated high measurement precision of instrument of variables of expectancy, valence and instrumentality constructs, thus reliability of such instrument. The validity and reliability of the constructs main components in Motivation Theory of Vroom were reported to be good and similar to those of this research in researches with a structural approach by (Liu et al., 2007; Zaniboni & et al., 2011; Chiang & Jang, 2008) and in experimental researches by (Tin, 2000; Vansteenkiste, , Lens, , Witte, 2005; quoted in Chiang & Jang, 2008).

Data analysis method

Given this research aimed to study motivational behavior of consumers of Shahid Chamran University's document delivery services, authors tested hypothesis of the research developed based on Vroom's mode to explain motivational behaviors of them using analysis of the three main paths of this theory. Given conditions of the model and process nature of the model and the fact that motivation is a hypothetical construct that may not be measured and observed directly, to test the model and for data analysis, AMOS software (edition 23) and Structural Equation Modeling were used.

Results

To test the five main hypothesis, Structural Equation Modeling was used. Estimates of indices evaluating overall Structural Equation

Model to test fifth hypothesis are reported in Figures (3) and (4).

Fourth hypothesis: It seems that model of research is sufficiently valid to explain motivational behavior of information consumers of document delivery services.

Structural model and directional hypotheses are shown in Figure (3):

Given goodness range of these indices, indices evaluating the overall structural equation model indicate that the given model developed is supported by research's data. Or in other words, fitness of data to model holds and all indices indicate goodness of structural equation model. Thus the fourth hypothesis is sufficiently valid and approved. For analysis and test of hypothesis of the three main paths of this research, structural equation model was used again. Estimates are shown in Figure (3). Reports on test of hypothesis 1-3 and 5 are fully presented in Table (5). Table 5, Estimates of the main paths of theoretical model in structural equation model is reported separately in the following table.

Estimated values indicated in the table above are as follows:

- As for expectancy path; 1) Variables of effort and expectancy jointly predicted 34% of the variance in performance variable; and according to values for the size of effect of index of coefficient of determination of this value is estimated to be large; in other words, the variables can predict performance variance in the upper limit; 2) the effect of both variables of effort and expectancy on variable of performance is statistically significant (P. Value ≤ 0.05). In other words, given values of impact factor of these variables, it can be said that impact of variable of effort is reverse and weak while impact of expectancy is direct and upper average; 3) variables of expectancy and performance jointly predicted 17% of variable of result (reward) variable; given values of size of effect of index, coefficient of determination of this value is estimated to be average; in other words, the variables can pre-
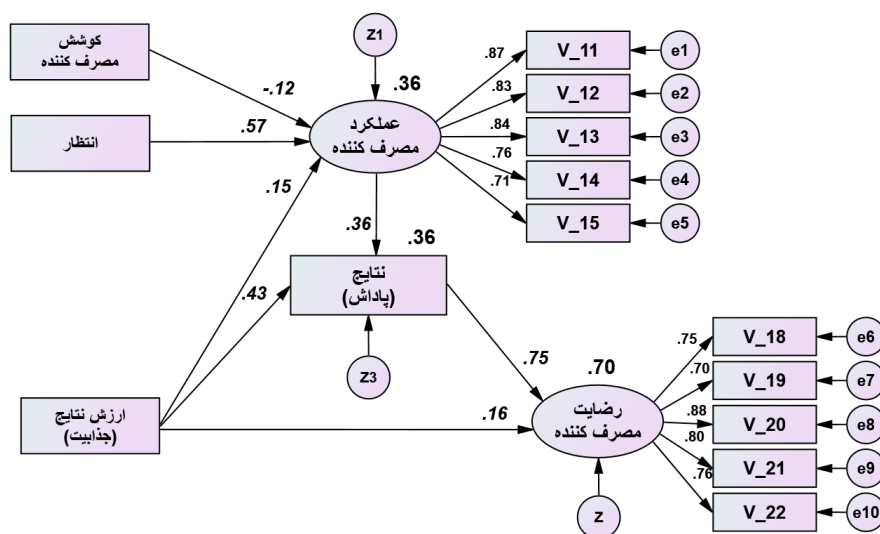
Figure 3. Structural Equation Model Research (VIE model)

Index	DoF	Relative chi square	CFI	PCFI	RMSD	Holter
Value	74	2.42	0.92	0.71	0.07	107

Table 4. indices evaluating the overall structural equation model

dict reward variance averagely. Indirect impact of expectancy variable on reward and direct impact of performance on reward were statistically significant (P. Value ≤ 0.05). Thus it can be said that performance variable not only directly affected reward but affected relationship between expectancy and reward as mediator variable. Given values of impact factor of these two variables, such effects were direct and average. - As for instrumentality path; 1) Variables of performance predicted 13% of the variance in reward variable; and according to values for the size of effect of index of coefficient of determination of this value is estimated to be average; in other words, performance can averagely predict reward; 2) the effect of variable of performance on reward is statistically significant (P. Value ≤ 0.05). In other words, given values of impact factor of these variables, it can be said that impact of variable of effort is direct and average.
- As for valence path; 1) Variables of valence predicted 2% of the variance in performance variable and 18% of variance of reward variable; and according to values for the size of

effect of index of coefficient of determination of this value is estimated to small for performance variable while it was average for variable of reward; in other words, variable of valence can predict valence weakly while it predicted performance averagely; 2) the effect of variable of valence on variables of performance and reward is statistically significant (P. Value ≤ 0.05). In other words, given values of impact factor of these variables, it can be said that impact of variable of valence on variable performance is direct and weak while impact of valence on reward is direct and average.
- As for VIE path; 1) Variables of expectancy predicted 26% of the variance in performance variable; and according to values for the size of effect of index of coefficient of determination of this value is estimated to average; in other words, variable of expectancy can predict valence averagely. The effect of variable of expectancy on variable of performance is statistically significant (P. Value ≤ 0.05). Thus, given values of impact factor of these variables, such impact is direct and weak while impact of valence on reward is di-

Path	Independent variable	Mediator variable	Dependent variable	Coefficient of determination	Estimation		P. Value	Hypothesis
					Non-standard	Standard		
Expectancy	Effort	-	Performance	0.34	-0.14	-0.12	0.031	Confirmed
	Expectancy	-			0.51	0.57	0.001	Confirmed
	Expectancy	Performance	Results	0.17	0.20	0.21	0.005	Confirmed
	Performance	-			0.40	0.36	0.001	Confirmed
Instrumentality	Performance	-	Results	0.13	0.40	0.36	0.001	Confirmed
Valence	Valence	-	Performance	0.02	0.13	0.15	0.009	Confirmed
		-	Results	0.18	0.42	0.43	0.001	Confirmed
VIE path	Expectancy	-	Performance	0.26	0.51	0.57	0.001	Confirmed
	Performance	-	Results	0.13	0.40	0.36	0.001	Confirmed
	Results	-	Satisfaction	0.56	0.67	0.75	0.001	Confirmed
	Expectancy	Performance	Results	0.04	0.20	0.21	0.005	Confirmed
	Performance	Results	Satisfaction	0.07	0.26	0.27	0.009	Confirmed
	Valence	-	Results	0.18	0.42	0.43	0.001	Confirmed
	Valence	-	Satisfaction	0.15	0.14	0.16	0.002	Confirmed
	Valence	Results	Satisfaction		0.32	0.36	0.009	Confirmed

▲ Table 5. Estimating the Effect of the main paths of structural equation model

rect and average. 2) Variables of performance predicted 13% of the variance in reward variable; and according to values for the size of effect of index of coefficient of determination of this value is estimated to average; in other words, variable of performance can predict reward averagely. The effect of variable of performance on variable of reward is

statistically significant (P. Value ≤ 0.05). Thus, given values of impact factor of this variable, such impact is direct and average. 3) Variables of reward predicted 56% of the variance in satisfaction variable; and according to values for the size of effect of index of coefficient of determination of this value is estimated to high; in other words, variable of reward can

predict satisfaction highly. The effect of variable of reward on variable of satisfaction is statistically significant (P. Value ≤ 0.05). Thus, given values of impact factor of these variables, such impact is direct and strong. 4) Variable of expectancy predicted 4% of the variance in reward variable through variable of performance; and according to values for the size of effect of index of coefficient of determination of this value is estimated to small; in other words, variable of expectancy can predict reward through variable performance weakly. The indirect effect of variable of expectancy on variable of reward is statistically significant (P. Value ≤ 0.05). Thus, variable of performance plays the role of mediator in the relationship between expectancy and reward and given values of impact factor of these variables, such mediation was direct and weak. 5) Variable of performance predicted 7% of the variance in satisfaction variable through variable of reward; and according to values for the size of effect of index of coefficient of determination of this value is estimated to small; in other words, variable of performance can predict variable of satisfaction through variable reward weakly. The indirect effect of variable of performance on variable of satisfaction is statistically significant (P. Value ≤ 0.05). Thus, variable of reward plays the role of mediator in the relationship between performance and satisfaction and given values of impact factor of these variables, such mediation was direct and weak. 6) Variable of valence predicted 18% of the variance in reward variable; and according to values for the size of effect of index of coefficient of determination of this value is estimated to average; in other words, variable of valence can predict variable of reward averagely. The effect of variable of valence on variable of reward is statistically significant (P. Value ≤ 0.05). Thus, given values of impact factor of this variable, such impact was direct and average. 7) Valence directly and indirectly (through mediation of reward) jointly predicted 15% of the

variance in satisfaction variable; and according to values for the size of effect of index of coefficient of determination of this value is estimated to average; in other words, variable of reward can directly and indirectly predict variable of satisfaction averagely. The direct and indirect effect of this variable on variable of satisfaction is statistically significant (P. Value ≤ 0.05). Thus, not only variable of valence affects variable of satisfaction but also variable of reward plays the role of mediator in such relationship. Thus, given values of impact factor of this variable, it can be said that direct impact of variable of valence is direct and weak and mediation of variable of reward is direct and average.

According to the results set forth in Table 5, all three paths can explain motivational behavior of consumers of Shahid Chamran University's document delivery services. As for the fifth hypothesis, which states that: It seems that the VIE model can describe and explain the motivational behaviors of information consumers Shahid Chamran University's document delivery services, this hypothesis was also confirmed. This means that VIE paths are capable of description and explanation of motivational behaviors of consumers of Shahid Chamran University's document delivery services. However, among micro-paths, the highest impact factor related to path of micro-path from reward to information customer satisfaction with Shahid Chamran University's document delivery services at 56% and lowest impact factor related to micro-path from valence to performance at 0.02. Also study of micro-paths of expectancy to reward with mediation of performance variable with impact factor of 17% and paths of valance to satisfaction with mediation of variable of reward with at 15% were respectively strong indirect paths and path of performance with mediation of reward to satisfaction with impact factor of 0.07 was the weakest path.

Vroom (1964) believes that, a person's motivation to do a work activity or show a moti-

vational behavior to a work is excited when his motivation is a function of three elements of expectancy, instrumentality and valence. This means that if one of these three components is zero, the motivation behavior does not occur. "Vroom" in this context provides an example. He writes: "even if an individual believes that his efforts will lead to optimal performance and his performance also leads to will reward, but reward considered for such individual is worthless, the individual will not be sparked to have motivational behavior (Vroom, 1964). Therefore, based on the results presented in table 5 and according to all path hypotheses and overall approval of VIE model, Vroom's theory of motivation is deemed able to explain why consumers use document delivery services of Shahid University Chamran.

Conclusion

The main objective of motivation researches is to explain why behaviors occur; accordingly, the present study was based on a conceptual framework of Vroom's motivation theory and based on expectancy model, it tried to explain motivational behavior of consumers of document delivery services of Shahid Chamran University. Overall results indicate that Vroom's motivation theory is able to explain behavior of information consumer of document delivery services of Shahid Chamran **University of Ahvaz.**

The analysis results in explaining the motivational behavior of consumers of Shahid Chamran University's document delivery service based on VIE path showed that: in motivational model of consumers of information, expectancy of the probabilistic perception of consumers of information in successful reaching of document delivery service page of Shahid Chamran University through the implementation of this service provider with the lowest potential problem implies that (belief of expectancy). The expectancy path analysis in this study showed that variable of effort has a reverse effect on performance,

namely by raising or lowering information consumer's efforts, his performance on the successful implementation of the University's document delivery service page changes. So, information consumers, for the purpose of successful implementation of the server, must increase their efforts. On the other hand, both variables of expectancy and effort accounted for 32% of the variance in performance variable, which means that if the consumer of information consider a good level of effort for implementation of the university's document delivery service page and also hold the belief that such level of effort and expected ability to (beliefs on effort- performance), it is able to implement this service provider successfully, then beliefs on effort-performance and beliefs on performance-results (reward) (level I and level II expectancy) of his will increase. This means that he believes that by making a certain level of effort and one's level of ability, it is able to implement document delivery service page of Shahid Chamran University of Ahvaz and reach intended purpose, which is to satisfy the information need. The results of this path of study were consistent with results of "Lee" (2007), who studied beliefs on performance in delivery of chat reference services to perception of user's access to virtual reference desk with minimal problems. So based on motivational model, consumers of document delivery services of Shahid Chamran University, it was assumed that if consumer of information believe that based on the level of effort considered (beliefs on expectancy level I), it will be able to run the document delivery services page of Shahid Chamran University of Ahvaz with the fewest problems, then (beliefs on expectancy level II) of his will increase. This means that he believes that for him to be able to implement document delivery service page of Shahid Chamran University of Ahvaz successfully (expectancy belief level II), it requires a level of effort, and such effort will the important source of belief on performance of such service provider in the con-

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sumer information service in order to provide said service. "Lee" in this regard refers to chat reference service provider. He wrote: "If consumers of information understand for sure that that they can access the virtual reference desk without any problems, then, their expectancy belief on chat reference service provide will rise" Thus, the results of this study in the field of expectancy path analysis were similar to results of (Lee, 2007, Liao et al., 2011; Chang and Zhang, 2008). The most valuable path in this study was identified to be impact of results (reward) on satisfaction of information consumer. Our results in this regard were consistent with result of study by (Lee, 2007; Liu et al., 2007; Chang and Zhang, 2008). So in this study, the hypothesis that it is likely that consumers to be motivated by motivational behavior to use document delivery services of Shahid Chamran University was confirmed according to the proposed table (Newstrom & Davis, 1968), levels of information consumer motivation level in their behavioral motivation to use document delivery services of Shahid Chamran University of Ahvaz was predicted to be average.

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