A Model of E-Loyalty and Word-Of-Mouth based on e-trust in E-banking services (Case Study: Mellat Bank)

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Abstract  
Customers extend robust trust to a business when they believe the business puts their interests first. Good experience of banking services and recommendations of other customers can increase trust. Loyalty and Word of mouth (WOM) is accepted as key factors successes of marketing. This paper seeks to discover the affecting factors on positive word of mouth and loyalty based on trust enhancement that might be influenced by results of service quality in internet banking context. In fact, purpose of this research is presenting A Model of E-Loyalty, E-trust and Word of Mouth, whit Emphasize on E-ServQual Model and e-satisfaction and bank image. A structural equation model was developed and was tested by data surveyed from Iranian customers that used internet service of Mellat Bank. The sample composed of customers who were belonging to different states. Path analysis was applied to test the proposed model. The findings are belonging to one bank only; but, they give a valuable framework for future research into
WOM, E-Trust and e-Loyalty in Electronic Banking context. The importance of Trust, WOM and loyalty in professional services marketing is widely acknowledged; however, knowledge about how to enhance their Prerequisite is little. Present study provides a better understanding of affecting factor on customer loyalty, trust and WOM for marketing. Final presented model of this research in first research about Trust, WOM and Loyalty in internet banking that measure e-SQ and its effect on loyalty and word of mouth with by e-trust respect to satisfaction and corporate image. Previous research attended to loyalty only and limited to a few factors. Whereas, this paper provides insights on related factors of WOM, trust and loyalty that is currently a part of black box in the marketing literature and internet banking context.

**Keywords:** Trust, Word of mouth, e-Loyalty, Corporate Image, e-satisfaction, e-Service Quality.

**INTRODUCTION**

This Competitiveness in electronic commerce is increasing for its benefits that make customer attraction and retention difficult, as a result, the enhancement of customer loyalty and positive word-of-mouth (WOM) have been two of the key goals by online marketing managers. To be precise, customer loyalty favours greater future purchase intention [1] a loyal customer base is thus a central success factor and can be a better indicator of success in terms of profitability than more traditional financial measures such as market share and cost structure [2]. The consequence of word-of-mouth communication (WOM) has been an issue of considerable to marketing researchers and practitioners. WOM have a considerable impact on consumers’ choice [3], and their perceptions of post-purchase product [4]. Researchers [5] believe word-of-mouth marketing is more credible than other marketing techniques. Many of researchers have confirmed importance of WOM in marketing in their studies. (e.g. [6], [7], [8], [9], [10], [11] companies have a good opportunity to increase their market share by developing positive WOM among customers [6]. On other hand marketing practitioners have traditionally recognized the general importance of loyalty (e.g. [12], [13], [14], [15]) Some of studies have considered analyse loyalty development (e.g. [16], [17], [18], [19]), and WOM (e.g. [20], [21], [22], [23]) in the online context, but according to [24] a lack of studies is about relationships between customers and internet banking that analyse the formation of both concepts. Thus, there is a call for studies that will help us to understand how customer loyalty and positive WOM are formed in the e-banking business in detail.

One of the variables that can have effect on WOM and loyalty is trust. Since online transactions involve many uncertainties for the customer, trust is a condition for exchange. Trust in the electronic medium – here called “e-trust” – is believed to increase online customer loyalty, but empirical confirmations are scarce. [25]

So, this study seeks to presentation a descriptive model that explains customer loyalty and trust are influence on positive WOM formation in the context of electronic
banking and are affected from corporate image and customer satisfaction based on customer perception of e-service quality.

Based on review of relevant literature, customer satisfaction in terms of previous experiences is a considered key antecedent of customer loyalty and WOM in online financial services provider. Moreover, corporate image is affected on customer loyalty and WOM, too.

Trust has effect on loyalty and WOM and is affected from bank image and e-satisfaction. Besides, our model proposes that loyalty have positive effect on WOM, too.

Lastly, we take in perceived e-service quality in proposed model as a determinant factor of the level of customer satisfaction and bank image that can confirm indirect effect it on trust, customer loyalty and WOM.

**CONCEPTUAL MODEL**

In the services literature, strong emphasis is placed on the relationship between service quality and customer satisfaction [26]. Previous research indicated that the effect of perceived quality by customers on customer satisfaction is positive and significant [27, 28]. In particular, research in banking sector confirmed a link between service quality dimensions and customer satisfaction, too [29-32]. As results, considering these considerations, we propose that:

**H1: service quality has positive effect on Customer satisfaction in the internet banking.**

According to attitude theory, service evaluation is effecting to building a corporate image [33]. Oliver [34] confirms that a consumer's attitude to a product/service choice is affected by consumer's initial attitude at the time of purchase/encounter and his or her satisfaction from consumption experience. Ostrowski et al [35] arguing that positive image is affected by positive ultimately. So, all of a customer's consumption experiences, and service quality is representative of these consumption experiences have significant effect on corporate image. Hence, Aydin and Ozer [36] claim the perception corporate image directly affected by perception of service quality. Lai et al [37] indicated higher service quality significantly enhance corporate image. So, we propose our second hypothesis:

**H2: Service quality has positive effect on bank image in the internet banking.**

Customer satisfaction is considered an antecedent of trust [38]. A positive effect of satisfaction on trust can be expected in the online environment as well, though empirical research in this domain is scarce. A positive effect of customer satisfaction on trust with respect to the service provider has been demonstrated for e-commerce. (e.g. [39,40]. In analogy with these findings, customers’ satisfactory experiences with a specific e-tailer are expected to increase their willingness to make more online purchases from that e-tailer (loyalty), as well as their trust in the online medium as such (system-based trust). Satisfaction with a specific application of the system (the e-tailer) will increase confidence in the system as a whole. It is therefore expected that:
**H3. E-satisfaction has positive effect on e-trust in the internet banking.**

Some of the researchers suggest that corporate image is one of the most influential factors in consumer trust. Yoon [41] believe that the variables related to corporate image significantly have effect on consumer trust towards a specific website. This relationship confirmed in internet banking too. For example Ba [42] showed reputation internet banking is one of the effective principal factors to use of this new channel of communication. Also, Flavián et al [43] investigates the influence of corporate image on consumer trust. They compared this relationship in traditional versus internet banking and confirmed the relationship between corporate image and customer trust is stronger in internet banking. Thus it was assumed that:

**H4: corporate image has positive effect on e-trust in the internet banking.**

From a theoretical point of view, Receive the orders from friends and customers who have experienced service can reduces risk when receiver will select a brand. Although many previous studies have not considered but there are assumed that:

**H5: word of mouth (receiver) has positive effect on e-trust in the internet banking.**

About effect of e-trust on e-loyalty is some evidence that used terms of increased spending [44], and intentions to purchase [39] or repurchase [45] for results of e-trust. Morgan and Hunt [46] believe that trust leads to loyalty or commitment because trust creates exchange relationships that are highly valued. So, It is expected that customers that trust to e-services be willingness to purchase online [47], but there are not enough empirical evidences. For example, Kim and Prabhakar [48] found in their study that e-trust had a significant effect on the usage of internet banking, whereas trust in the bank itself had no effect. Previous studies prove that trust has a positive impact on customer’s loyalty. (e.g [48,49]). According to the effect of e-trust on customer loyalty, it can be expected that:

**H6: e-trust has positive effect on e-loyalty in the internet banking.**

Word-of-mouth behaviour is one of the key success factors in many markets (e.g. [50], [51], [52]) but researcher analysing trust have paid little attention to the impact of trust on this behaviour. Hence, Sichtmann [49] believes that it seems essential to close this research gap. From a theoretical point of view, trust can reduces the social risk associated with a recommendation and "trustor” recommended a brand to others whit more confidently. Therefore, can expect that:

**H7: word of mouth (receiver) has a positive effect on E-trust in the internet banking.**

Some of the researcher defined loyalty as favourable attitudes toward the brand or organization (e.g. [53]). Notion to this definition showed loyalty associated to positive WOM [54]. A loyal customer usually promotes the firm by emphasizing the key attributes of its products/services. Therefore, we propose that loyalty may favour positive WOM in the e-banking business by considering these considerations and say:

**H8: Customer loyalty has a positive effect on word of mouth in the internet banking.**

According to what was said, fallowing figure shows conceptual model for this research:
A Model of E-Loyalty and Word-Of-Mouth based on e-trust in ...

**Fig 1 conceptual model of research**

**METHODODOGY**

A. *Survey Instrument*

Our sample selected based on following parameters:

1- Consumers who had an online service experience in banking context, since we were interested in the entire online service experience, not just interaction with the website

2- Our respondents must be customers of Mellat Bank.

Respondents we selected using random sampling method in three major cities in Iran. Three thousand questionnaires were distributed and 650 analysis. (Other questionnaires have not received or had incompletely completed). The survey instrument consisted of two sections. Part A captured data about demographic characteristics such as age, Education and sex. Part B included constructs measuring the research variables and consisted of closed-end questions. They were measured on five-point-likert scale (1 = strongly disagree, 5 = strongly agree). In fallowing, measurement of these constructs was developed:

- e-service quality: [55,56]
- e-Satisfaction: [1,37,57,58]
- Bank Image: [1,37,59]
- E-trust: [43]
- E- Loyalty: [37,60,61]
- WOM: [28,62,63]

The survey instrument reviewed and modified by the researchers and final 44 items selected that those included 17 items for e-service quality, 23 items for measuring WOM, e-loyalty, e-satisfaction and bank image.

B. *Reliability and Validity*

Confirmatory factor analysis was used to determine reliability of respective construct. Results of CFA have shown on table 1 for e-satisfaction, bank image, e-trust, e-loyalty and WOM, and on table 2 for e-service quality.
Similarity, by CFA, we could confirm the presence of the 17 dimensions of e-service quality (i.e. Product Variety/ diverse features, Aesthetics, Security, Timeliness, Ease of use, Accuracy Contents, Continuous improvement, Collaboration, Understanding the Customer, Communication, Access, Reliability, Responsiveness, Competence, Courtesy and Credibility) that are classified in three categories (see Table 2).

<table>
<thead>
<tr>
<th>Item</th>
<th>Coefficient</th>
<th>t-value</th>
<th>Cronbach’s α</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>E-Loyalty</strong></td>
<td></td>
<td></td>
<td>0.859</td>
</tr>
<tr>
<td>LOY1</td>
<td>0.96</td>
<td>51.53</td>
<td></td>
</tr>
<tr>
<td>LOY2</td>
<td>0.97</td>
<td>52.57</td>
<td></td>
</tr>
<tr>
<td>LOY3</td>
<td>0.88</td>
<td>44.37</td>
<td></td>
</tr>
<tr>
<td><strong>E-Trust</strong></td>
<td></td>
<td></td>
<td>0.815</td>
</tr>
<tr>
<td>TRU1</td>
<td>0.82</td>
<td>39.61</td>
<td></td>
</tr>
<tr>
<td>TRU2</td>
<td>0.92</td>
<td>48.64</td>
<td></td>
</tr>
<tr>
<td>TRU3</td>
<td>0.85</td>
<td>41.38</td>
<td></td>
</tr>
<tr>
<td>TRU4</td>
<td>0.64</td>
<td>29.12</td>
<td></td>
</tr>
<tr>
<td>TRU5</td>
<td>0.74</td>
<td>35.05</td>
<td></td>
</tr>
<tr>
<td>TRU6</td>
<td>0.81</td>
<td>39.52</td>
<td></td>
</tr>
<tr>
<td>TRU7</td>
<td>0.76</td>
<td>36.01</td>
<td></td>
</tr>
<tr>
<td>TRU8</td>
<td>0.83</td>
<td>39.91</td>
<td></td>
</tr>
<tr>
<td><strong>E-Satisfaction</strong></td>
<td></td>
<td></td>
<td>0.805</td>
</tr>
<tr>
<td>SAT1</td>
<td>0.81</td>
<td>38.65</td>
<td></td>
</tr>
<tr>
<td>SAT2</td>
<td>0.97</td>
<td>52.20</td>
<td></td>
</tr>
<tr>
<td>SAT3</td>
<td>0.79</td>
<td>37.25</td>
<td></td>
</tr>
<tr>
<td><strong>E-word of mouth (S)</strong></td>
<td></td>
<td></td>
<td>0.753</td>
</tr>
<tr>
<td>WOMS1</td>
<td>0.62</td>
<td>28.20</td>
<td></td>
</tr>
<tr>
<td>WOMS2</td>
<td>0.63</td>
<td>28.74</td>
<td></td>
</tr>
<tr>
<td>WOMS3</td>
<td>0.98</td>
<td>53.13</td>
<td></td>
</tr>
<tr>
<td><strong>E-word of mouth (R)</strong></td>
<td></td>
<td></td>
<td>0.753</td>
</tr>
<tr>
<td>WOMR1</td>
<td>0.74</td>
<td>35.06</td>
<td></td>
</tr>
<tr>
<td>WOMR2</td>
<td>0.81</td>
<td>38.82</td>
<td></td>
</tr>
<tr>
<td>WOMR3</td>
<td>0.92</td>
<td>50.42</td>
<td></td>
</tr>
<tr>
<td><strong>Bank Image</strong></td>
<td></td>
<td></td>
<td>0.799</td>
</tr>
<tr>
<td>IMG1</td>
<td>0.69</td>
<td>31.81</td>
<td></td>
</tr>
<tr>
<td>IMG2</td>
<td>0.98</td>
<td>53.49</td>
<td></td>
</tr>
<tr>
<td>IMG3</td>
<td>0.72</td>
<td>34.50</td>
<td></td>
</tr>
</tbody>
</table>

$\chi^2 = 207.11$  
$df=22$  
GFI=0.92  
AGFI=0.90

RMSEA= 0.07  
CFI=0.95  
RMR=0.05  
NFI=0.96
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TABLE 2 CONFIRMATORY FACTOR ANALYSIS ON E-SERVICE QUALITY ITEMS

<table>
<thead>
<tr>
<th>Item</th>
<th>Coefficient</th>
<th>t-value</th>
<th>Cronbach’s α</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Customer SQ:</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Reliability</td>
<td>0.86</td>
<td>25.16</td>
<td>0.718 (4items)</td>
</tr>
<tr>
<td>Responsiveness</td>
<td>0.59</td>
<td>16.35</td>
<td>0.612 (3items)</td>
</tr>
<tr>
<td>Competence</td>
<td>0.81</td>
<td>23.42</td>
<td>0.727 (2items)</td>
</tr>
<tr>
<td>Courtesy</td>
<td>0.88</td>
<td>25.88</td>
<td>0.867 (2items)</td>
</tr>
<tr>
<td>Credibility</td>
<td>0.74</td>
<td>21.12</td>
<td>0.644 (2items)</td>
</tr>
<tr>
<td>Access</td>
<td>0.83</td>
<td>23.97</td>
<td>0.795 (5items)</td>
</tr>
<tr>
<td>Communication</td>
<td>0.80</td>
<td>23.15</td>
<td>0.805 (3items)</td>
</tr>
<tr>
<td>Understanding</td>
<td>0.88</td>
<td>25.75</td>
<td>1 item</td>
</tr>
<tr>
<td>Collaboration</td>
<td>0.80</td>
<td>22.98</td>
<td>1 item</td>
</tr>
<tr>
<td>Continuous improvement</td>
<td>0.86</td>
<td>25.17</td>
<td>0.825 (3items)</td>
</tr>
<tr>
<td><strong>Online SQ:</strong></td>
<td></td>
<td></td>
<td>0.856 (16items)</td>
</tr>
<tr>
<td>Contents</td>
<td>0.77</td>
<td>22.08</td>
<td>0.664 (2items)</td>
</tr>
<tr>
<td>Accuracy</td>
<td>0.72</td>
<td>20.33</td>
<td>0.662 (3items)</td>
</tr>
<tr>
<td>Ease of use</td>
<td>0.82</td>
<td>23.80</td>
<td>0.669 (7items)</td>
</tr>
<tr>
<td>Timeliness</td>
<td>0.80</td>
<td>22.96</td>
<td>1 item</td>
</tr>
<tr>
<td>Aesthetics</td>
<td>0.85</td>
<td>25.03</td>
<td>1 item</td>
</tr>
<tr>
<td>Security</td>
<td>0.89</td>
<td>25.98</td>
<td>0.851 (2items)</td>
</tr>
<tr>
<td><strong>Banking Service Product quality:</strong></td>
<td></td>
<td></td>
<td>0.603 (2items)</td>
</tr>
<tr>
<td>Product Variety/diverse features</td>
<td>0.34</td>
<td>9.02</td>
<td>0.603 (2items)</td>
</tr>
</tbody>
</table>

χ²= 523.21  df=54  GFI=0.98  AGFI=0.96  NFI=0.94  CFI=0.95  RMR=0.012  RMSEA=0.011

Findings
The hypothesized model is tested employing structural equation modelling using LISREL software. The overall fit of the model is acceptable (χ² = 783.02, df = 62, GFI = 0.97, AGFI = 0.94, NFI = 0.96, CFI = 0.98, RMSEA = 0.021, RMR = 0.013). All the hypothesized paths are supported. (table 3)

TABLE 3 PARAMETER OF MODEL TEST

<table>
<thead>
<tr>
<th>Path</th>
<th>Coefficient</th>
<th>t-value</th>
<th>Supported</th>
</tr>
</thead>
<tbody>
<tr>
<td>H1</td>
<td>e-SQ → e-satisfaction</td>
<td>0.762</td>
<td>46.266</td>
</tr>
<tr>
<td>H2</td>
<td>e-SQ → Bank image</td>
<td>0.568</td>
<td>27.152</td>
</tr>
<tr>
<td>H4</td>
<td>e-satisfaction → e-trust</td>
<td>0.724</td>
<td>41.257</td>
</tr>
<tr>
<td>H5</td>
<td>Bank image → e-trust</td>
<td>0.608</td>
<td>30.136</td>
</tr>
<tr>
<td>H6</td>
<td>WOM(Receiver) → e-trust</td>
<td>0.502</td>
<td>23.341</td>
</tr>
<tr>
<td>H7</td>
<td>e-trust → e-loyalty</td>
<td>0.803</td>
<td>52.955</td>
</tr>
<tr>
<td>H8</td>
<td>e-trust → WOM(Sender)</td>
<td>0.708</td>
<td>39.460</td>
</tr>
<tr>
<td>H9</td>
<td>e-loyalty → WOM(Sender)</td>
<td>0.664</td>
<td>34.918</td>
</tr>
</tbody>
</table>
As shown in Table 3, e-service quality has a positive impact on e-satisfaction (0.762) and bank image (0.568) that support of H1 and H2.

H3, H4, H5 test indicate that three of influential factors on e-trust are e-satisfaction (0.724), bank image (0.608) and word-of-mouth (Receiver) (0.502).

According to H6 and H7 test, be approved that word-of-mouth (Sender) (0.708) and e-loyalty (0.803) are results of e-trust.

Finally, finding confirmed e-loyalty has a positive effect on word-of-mouth (Sender).

CONCLUSIONS

Findings of this research have several key implications for developing theoretical knowledge and creating strategies to attract and retain customers.

We examine the influence of e-service quality in creation e-satisfaction that is a key issue. Results reveal e-service quality has a significant effect on customer satisfaction. These results are also consistent with empirical studies showing that greater degree of service quality will lead to customer’s satisfaction [30, 64].

We find that service quality has positive and significant effect on bank image but it is weaker than Intensity of relationship between e-service quality and e-satisfaction. According to lai et al [37] higher service quality enhances corporate image.

Previous research that examined trust based on satisfaction (e.g., [39]). This result shows a strong and positive link between e-satisfaction and e-trust. It is consistent with other research. In fact, Satisfaction is an important prerequisite for creating long term customer relationships and finally to enhance loyalty [65, 66].

We investigate the influence of corporate image on consumer trust and found a positive effect. Flavián et al [43] also confirmed this relationship. According to our exception, person that receives recommendation of family, friends and others, gains higher trust.

We expected that "trustor" speaks with friends, family, classmate and etc. about good feeling from experience. Thus we examine relationship between e-trust and WOM (as sender). Results demonstrated that e-trust has a significant and positive effect on WOM.

Although conformation of influence customer loyalty on long-term financial performance in competitive markets [67, 68], now clear gaps are in our knowledge about antecedents of loyalty. Previous studies and marketing theories argue service quality, consumer satisfaction, and corporate image are seemed as key prerequisite of customer loyalty [69, 70], our findings demonstrate these results and add to these factor e-trust. In moreover we investigate influence of e-loyalty on WOM. Many of researches measure some of WOM’s items as some of e-loyalty. But in this research we identify WOM and loyalty as 2 variables. Our findings indicate e-loyalty has a significant and positive effect on WOM that is consistent with related literature. (e.g. [53])

IMPLICATIONS

Results of this study help to marketing practitioners to better understanding the relationship among e-service quality, e-satisfaction, corporate image, e-trust, e-loyalty,
and word of mouth. It also explains mechanism of enhancing loyalty and WOM in service industries. While the context of the study is limited to a single Iranian bank, results generally confirmed and reinforced previous studies relating services in other cultures.

Our findings showed e-service quality has effect on both WOM and e-loyalty indirectly. More ever, e-service quality affects e-satisfaction and image, two important factors determining e-trust. Thus, e-service quality is a key input for building and improving e-satisfaction and image, which enhances e-trust and finally WOM and e-loyalty.

Finding also demonstrates e-satisfaction and image are key and direct determinants of e-trust. Noticeably, service providers must be concerned with these results. Mellat bank manager should build and monitor both e-satisfaction and image as well as e-service quality. So if goal of Mellat bank is maintaining current customers, it must attend to customer satisfaction by improvement of e-service quality and a number of its dimensions that have most effect on e-satisfaction.

Other our finding is the role of corporate image and satisfaction in WOM extension as sender by e-trust. So if goal of Mellat bank is attracting new customers, it must attend to corporate image. In other hands, it must improve dimensions of e-service quality that are more important for corporate image formation. In social culture (e.g. Iran) WOM has more effect than individual culture (e.g. U.S), so attending to WOM and creating WOM communication is vital for this country. Similarity, it is necessary for Iranian banks, which attend to WOM, Because of internet service banking in Iran is developing and is in primal stage of innovation development. This research shows attendances and affects factors on loyalty and WOM in internet banking for Mellat bank. Results of research can use by other banks too.

REFERENCES


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