

ASSESSMENT OF TRUST BUILDING MECHANISMS OF E-COMMERCE: A DISCOURSE ANALYSIS APPROACH

Anna Tikhomirova
anna_tikhomirova@live.ru

Shuai Chuanmin
shuaicm@cug.edu.cn

China University of Geosciences (Wuhan, China)

Nowadays the Internet occupies the primary place in many people's lives. It gives people many different opportunities including online shopping. The deep understanding of all the elements of trust building mechanisms is essential in order to guarantee future prosperous development of the e-commerce sphere as trust seems the key point of e-commerce success. The current study aims to assess trust building mechanisms of online shopping, namely customers' comments, using the linguistic tool. By adopting the discourse analysis methodology this paper explores the language units used in the comments. First of all, the importance of feedbacks (customers' comments) was assessed by means of self-compiled questionnaire and the results of the analyses indicate that feedbacks were proved to be significant for customers while forming the buying intention. Then qualitative data was collected from Amazon website. Customers' comments were collected, systematized and grouped according to the specification of the comment. The following groups were singled out: attitude, duration of usage, quality, price, purpose of usage, function. Comments were divided into positive and negative as well and later on analyzed by means of discourse analysis. Two types of comments were pointed out, namely explanation and evidence (photo). Special features of online comments were pointed out.

Key words: trust, discourse analysis, professional communication, feedback, online, e-commerce

1. INTRODUCTION

Contemporary world is very dynamic. Due to the development and fast spreading of the Internet, online space is becoming more and more important. When talking about younger generations, a dramatic shift can be observed from offline to online. In this context online space is dragging a lot of attention of scientists of many disciplines and can't be put aside.

At the same time the analysis of the existing scientific literature devoted to the online discourse is quite limited and mostly centres on political discourse. The current research work focuses on the analysis of the trust building mechanisms online using discourse analysis (DA).

DA is a mainly linguistic tool for the analysis, meanwhile it can be applied to other disciplines, and marketing is one of them.

Nowadays the Internet gives a lot of opportunities to people such as communication, source of information, and etc. One of the most important online activities is online consumption. It doesn't only make life of customers easier and more convenient; it contributes to the economic development of the country. For example, in China the share of e-commerce in the country's GDP constitutes 30%. Online e-commerce platforms are beneficial both for the customers and entrepreneurs. To make the cooperation more successful it's important to have very detailed understanding of the online environment.

Trust is one of the key points of success of the online platform. The concept has been widely analyzed from different angles. Nevertheless, very few research works are using discourse analysis to assess online trust and its' mechanisms.

The current research work aims to contribute to studies of online trust building mechanisms.

The concept of trust and trust building mechanisms is very wide that's why it was decided to narrow the topic and analyze customers' comments on the online platform.

The subject of the research is the online platform amazon.com. Amazon is the American e-commerce platform located in Seattle, the USA. It was founded in 1994 and currently is the worlds' biggest marketplace. The policy of Amazon related to the users' comments is the following: customers may leave a feedback on the product they purchased earlier. they should give their personal evaluation using stars from 1 to 5. Other customers may feedback on the review by voting or leaving a comment. In 2010, Amazon was reported to be the largest single source of Internet consumer reviews [2010 social shopping study, 2010]. Giving the credit to the size and the experience of the company it seems an interesting subject of the research.

The object of the research is customers' comments on the website.

The research questions are:

1. Do the customers' comments influence other customers' consumption intention?
2. What kind of comments are found on the online platform?
3. What are the peculiarities of the positive / negative comments?

In order to answer the research questions, the following objectives were pointed out:

- explain the difference between online and offline discourse
- Assess online trust building mechanisms
- Assess the concept of trust in online discourse
- Analyze positive customers' comments
- Analyze negative customers' comments

2. BACKGROUND OF THE STUDY

2.1. Discourse analysis of the online content

According to the linguistic society of America, discourse analysis (DA) is defined as "the analysis of language 'beyond the sentence'. Discourse analysts study larger chunks of language as they flow together" [Tannen, 2019].

At the same time analysis of the online content and commonly used printed text has a range of differences.

First of all, online material uses multiple modes of expression, including emoticons, hyperlinks, images, video, moving images (gifs), graphic design, and color, which adds complexity and richness to the discourse analysis.

Second, online content is unstable, instant, and edited in ways unavailable to print.

Third, online posts themselves are not the final object. They can be published, responded to, retweeted, then retracted or edited all within a few hours.

Fourth, in offline discourse the author or the speaker is always familiar, but in online context the author of the post or the comment can decide to stay anonymous which can complicate the analysis process and, in terms of online consumption can create a no-trust environment.

The virtual discourse community is one in which, "enough people carry on those public discussions long enough, with sufficient human feeling, to form webs of personal relationships in cyberspace" [Rheingold, 1993]. Though one may see the World Wide Web as a whole to be its own community, Swales' (1990) criteria above apply more directly to the smaller and more specific communities that exist within the Internet. While the Internet as a whole may have its own lexis, genres, inter-communication and participatory mechanisms, it is only within smaller virtual communities that the level of members and sense of common purpose creates discourse communities of the type literacy educators wish to study.

Fifth, in online discourse participants have more time to reflect, search for additional information, and deliberate on the forms of language they use to express themselves [Wever, Schellens, Valcke, & Keer, 2006].

In addition to those noted earlier, studies of such virtual communities include those by Hauben (1997) and Rheingold (1993). Rheingold's pioneering study of WELL, the Whole Earth 'Lectronic Link, was one of the first to document electronic discourse and he coined the term virtual communities to mean, "social aggregations that emerge from the Net when enough people carry on those public discussions long enough, with sufficient human feeling, to form webs of personal relationships in cyberspace" [Rheingold, 1993, p. 5]. This notion of virtual community is the key focus on much that has been written about the social forces of the Internet, and it is within these smaller contexts made possible by the World Wide Web through writing that individuals and communities are formed and transformed. The context of this study, Teen-Lit.com's eWeb group, is just such a possibility.

2.2. Trust building mechanisms

Trust is a very complex notion and the literature review has shown, trust is one of the concepts in the social sciences that is dragging attention of the scientists belonging to the different disciplines such as journalists, philosophers, politicians, natural scientists, and lately marketers and managers. The most popular definition of trust is "the willingness of a party to be vulnerable to the actions of another party based on the expectation that the other will perform a particular action important to trustor, irrespective of the ability to monitor or control the other party" [Mayer, Davis, & Schoorman, 1995, p. 712]. They advocate that markets, communities, and hierarchies all benefit from high rates of interpersonal trust. True offline and trust online differs greatly. Trust in e-commerce is an essential aspect and the guarantor of the future success or failure. As e-commerce is a fast developing issue, the concept of trust in the context of e-commerce has already been approached by a number of scholars. In this part of the research paper it is important to summarize the existing approaches and to define which approach will be used as basic for the research.

The importance of trust is increasing when it comes to making a transaction online [Azam, Qiang, & Sharif, 2013; Yoon & Occena, 2015] and by previous researches it has been proved that it has a major effect on the willingness of customers to purchase online [Akhlaq & Ahmed, 2013; Grabner-Kräuter & Faullant, 2008; Jones & Leonard, 2007; Li, Ye, Law & Wang, 2010; Yaobin & Tao, 2007], customers are willing to pay higher price when they trust retailer's e-commerce. Lee and Lee (2005) found out that customers' willingness to buy is related to store trust and product trust.

Trust related literature has widely analyzed and proved that for online market trust is the essential element. Scientists point out a wide range of trust-building mechanisms. The most common are the following:

- reputation building – to build credibility through ratings, feedbacks, discussion forums;
- information quality, where it must be ensured that information is correct, valid, up-to-date and potentially validate by third trusted party; certificates and references to provide quality labels and information about past activities – partners or business information;
- online dispute resolution support – is a branch of dispute resolution which uses information and communication technology to replace the traditional out of court processes to facilitate the resolution of disputes between parties. It primarily involves negotiation, mediation or arbitration, or a combination of all three supported by intelligent software solutions, e.g. for automatic negotiation of penalties etc.;

- standardization activities – for ensuring standard, ethic and fair processes and behavior through code of conduct, interoperability in the exchange of business documents with multilingual support based on ontologies etc.
- contract execution support – support to create a legally enforceable agreement in which two or more parties commit to certain obligations in return for certain rights. Efficient support of contract execution support can be achieved for example through contract clauses databases integration with data flow support.
- escrow services – which reduce the potential risk of fraud (for example the breach of contract) by acting as a trusted third party that collects, holds and disburses funds according to buyer and seller instructions [Delina, Vajda & Bednár, 2007].

The current research work focuses on the first point – reputation building. If in offline context, it's closely connect with the word of mouth advertising. In online context feedbacks are also sort of word of mouth. But in online context these are judgments of people customer doesn't know and it's his personal decision to trust or not to trust, to listen to the advice or not.

According to the Social Shopping Study conducted by Business wire and PowerReview that nowadays customers prefer to search for the information about the product online (including reviews and comments) to talk to the shop assistant. Several reasons for that are pointed out: timesaving, more confidence and higher credibility. The main sources of information are search engines, retailer site, brand sites, Amazon platform and social media websites.

Customer feedbacks were evaluated as the number 1 social media tool having a positive to effect on consumption intention. It was also pointed out that User-generated reviews were accounted as a significant source of information overcoming customer service information and buying guides / expert opinions [Tannen, 2019].

3. METHODOLOGY

In order to answer the research questions, the research adopted the deductive approach. It comprises both qualitative and quantitative data for the analysis.

The quantitative data was collected by means of self-compiled questionnaire. It was used to assess if the matter of customers' feedbacks is really an important issue. Questionnaire consists of seven questions. Online questionnaire platform was used to deliver the questionnaire to the respondents and data collection for further analysis.

Qualitative data for the further DA was collected in the form of customers' feedbacks on their purchase online on the Amazon platform. The feedbacks were collected on the goods which price was up to \$15. Both positive and negative comments were collected. These comments were divided into groups according to the content, systematized and then undergone discourse analysis.

Parameters for the DA were established, themes were identified within the content, and the analysis was conducted, representative examples will be used in the data analysis section in order to help illustrate the conclusions.

As there are primary two ways of carrying DA, namely top down and bottom up, the current research adopted a mixed approach.

The analyst looks for what is encoded in sentences (i.e. signification) and its interaction with context (i.e. significance). In this respect, the analyst is merely doing what an ordinary reader would normally do, but with more conscious attention to processes of comprehension, their possible effects, and their relationship to a wider background knowledge than the ordinary reader may assume to be relevant.

4. DATA ANALYSIS

Each comment including all its elements was used as the unit of analysis. the message is an objectively identified unit that the author of the message defines [Rourke, Anderson, Garrison, & Archer, 2001]. Two possible outcomes were pointed out explanation, where the customer describes why he likes or doesn't like the product and evidence, when the customer uploads a picture in order to prove how good/ bad the product is [Chiu, 2008]; [Chiu & Khoo, 2005].

4.1. Quantitative data analysis

As it was mentioned above, data analysis starts with analysis of the questionnaire which aim was to assess whether feedbacks are valuable or not. 137 respondents took part in the questionnaire. All of them are online consumers and used their personal experience in order to answer the questions.

Table 1. Questionnaire summary

Question	Yes	No
Do you pay attention to other users' comments while shopping online?	81 %	19 %
Do you pay attention to positive comments?	84 %	16 %
Can positive comments affect your intention to buy?	81 %	19 %
Do you pay attention to negative comments?	76 %	24 %
Can negative comments affect your intention to buy?	81 %	19 %
Do you leave comments after shopping online?	21 %	79 %
Do you believe comments on the platform are trustful	70 %	30 %

As it can be seen from Table 1, the majority of the respondents pay attention to the feedbacks of other users' while shopping online, both positive and negative, and it can affect their consumption intention. Majority also believes that feedbacks are trustful. But, surprisingly, most of the respondents are reluctant to leave the comments by themselves.

4.2. Qualitative data

The second stage of the data analysis, as it was mentioned in the methodology section, is a quantitative data analysis. Each comment including all its elements was used as the unit of analysis. The message is an objectively identified unit that the author of the message defines [Rourke, Anderson, Garrison, & Archer, 2001]. Two possible outcomes were pointed out explanation, where the customer describes why he likes or doesn't like the product and

evidence, when the customer uploads a picture in order to prove how good/bad the product is [Chiu, 2008; Chiu & Khoo, 2005].

Within the framework of this stage of the analysis 102 samples of users' comments both positive (50) and negative (52) were collected on the Amazon platform. When assessing the comments, the following features were pointed out:

- each comment has an author who can be anonymous, use a nickname or a real name;
- number of stars from 1 to 5, where 1 is equal to the least satisfaction level with the product consumed and 5 is the most;
- verified/not verified purchase, which helps other customers understand if the customer really bought the good he is commenting on, or just leaving positive/negative comment for some other reason;
- evidence / picture (optional);
- the comment itself;
- the number of people found the comment helpful. That is one of the ways of other users to feedback on the feedback.

These comments were systematized in the groups.

Table 2. Types of comments

type of the comment	Positive (4-5 stars)	Negative comments (3 stars and lower)
Attitude	15	5
Duration of usage	2	
Quality	12	18
Price	8	3
Purpose of usage	8	
Function / usage	5	23
Fraud		3

As it can be seen from the table above seven major types of comments were pointed out related to the personal attitude of the consumer, duration of usage of the product, quality price, purpose of usage, function of the product and fraud. From the samples analyzed it can be seen that positive comments are usually long, contain a very detailed description and have very positive emotional description and often include pictures in order to prove the comment. While negative comments tend to be short, sometimes containing one word to one sentence. As it can be seen from the table 2, when giving positive comments customers most likely express their personal attitude towards the product or its quality. Around 30% of the positive comments contain the evidence in the form of a picture in order to prove how good the product is. For the negative comments users most of the time complain about quality of the product or its function. As for the proof, less than 1% of the customers provide the picture.

Here are some of the examples:

Example 1

Carrie E Miller

5.0 out of 5 stars

Obsessed!!!

April 20, 2018

Size: 1 Count

Verified Purchase

After using Lights, Camera, Lashes by Tarte for the past year, I got tired of breaking the bank over mascara. My sister suggested Essence Lash Princess False Lash Effect and I IMMEDIATELY fell in love. It provides dramatic length and great volume. I can honestly say I can't stop looking at my eyelashes in the mirror every single day because of how awesome they look. Also, it is very long wearing. I go from an 8 hour work day right to the gym and sweat like crazy [...] and this stuff doesn't budge! I love it!!

437 people found this helpful.

From this comment it can be seen first of all that the user is using her own name and the picture. She evaluates the product 5/5. It's also seen that the purchase is verified. The title of the comment "Obsessed!!!" gives a very vivid emotional attitude of the customer and three exclamation marks make it more vivid. She gives a detailed information how "After using Lights, Camera, Lashes by Tarte for the past year, I got tired of breaking the bank over mascara", and why she found out about this product: "My sister suggested Essence Lash Princess False Lash Effect". Her emotional attitude is very obvious as well: "I IMMEDIATELY fell in love". She isn't only using very strong emotionally colored word *love*, but also capital letters, which makes it clear that her appreciation of the good is very high. The user applies pictures of her using the product to prove the quality. Under the comment we can see the number of people who found this comment useful (437 people), which tells us that these people can be potential customers of this product and this feedback is very valuable for them.

Example 2

Devon T.

1.0 out of 5 stars

I GOT A STYE

August 11, 2018

Size: 1 Count

Verified Purchase

When I received my mascara it was in an unissued box with a sticker over the seal to show it was new, I'm not actually sure if it was a new bottle. I used it a handful of times, but didn't like it much. It clumped my lashes together, making them look messy and the mascara flakes like crazy!! At night when I go to take it off, it takes FOREVER and even when you think you got it all, you didn't. I don't wear much for makeup and I don't wear it everyday. It had been weeks since I wore any makeup on my face, then 2 days in a row I wore this mascara. Day 1 my left eye was so irritated and by day 2 I had a stye on my bottom lash line that is incredibly painful. I have never had a stye before and I have to chalk it up to it being from this mascara. Not being able to fully clean it off, the flakes, and the fact that I can't say it wasn't used makes me believe my stye is a result of this mascara.

138 people found this helpful.

This is an example of the negative customer's comment about the similar product. In this example we can't see the full name of the customer and her picture which gives a ground for some doubts for other customers about the trustworthiness of the comment. Her personal evaluation is 1/5 which is lowest. The title of the comment "I GOT A STYE" written with the capital letters definitely draws the attention and it's understandable from this point already that the review is not going to be good. Then the customer is giving a negative feedback about packaging "I'm not actually sure if it was a new bottle", quality and usage of the product. She shares her experience using capital letters as well "FOREVER" which in the context of this review has a very negative connotation and the consequences of usage.

Under the comment it's seen that 138 people found the comment helpful, which potentially will affect their future consumption intention.

Example 3

Amazon user

1.0 out of 5 stars

Not recommend this to any lash lift services to use

June 29, 2017

Verified Purchase

Pooooor product, nothing fits even if you cut them. Not recommend this to any lash lift services to use. Waste of \$\$

As it can be seen the comment is left by the amazon user, no name or even nickname is provided. The product is evaluated by 1 star and, as it's common for the majority of the negative comments, the feedback is very short. The title gives other customers the recommendation not to buy the product. The misspelling of the word "Pooooor" shows the attitude towards the quality of the product. In the body of the comments the customer repeats again her advice not to buy the product, meanwhile no detailed explanation or evidence is provided. Here it can also be seen that no user finds this comment useful.

5. CONCLUSION

The current reseal work was devoted to the analysis of the customers' feedback on purchasing products online. Based on the analysis the following conclusions can be made:

It was proved by the quantitative analysis that the impact of both positive and negative comments on customers' intention to purchase online is positive.

Customers comments were summarized and systematized into seven main groups, namely personal attitude of the consumer, duration of usage of the product, quality price, purpose of usage, function of the product and fraud. The main features of the comments were described in the analysis section.

While analyzing the feedbacks the encoded content was pointed out. Mostly conversational language with the elements of some colloquial expression, a great number of emotionally colored words, tendency to the simplification of grammarian sentence structures, modification of spelling, substitution of words with signs or emoticons were observed in the comments. It ensures the effective interaction with the context.

"The findings of the 2010 Social Shopping Survey validate what we are hearing from retailers and brands – that customer reviews have become a critical piece of the marketing puzzle, based not only on consumer demand but also on the sales they deliver," said Pehr Luedtke, CEO of PowerReviews. "The next step for retailers is to now find new ways to maximize the impact and reach of these reviews – such as optimizing them for search engines through products like our In-Line SEO solution." [2010 social shopping study reveals changes in consumers' online shopping habits and usage of customer reviews, 2010].

As it has been already mentioned above, customers' feedback is a very strong element of trust-building mechanisms. Marketers and online shop managers should pay attention to the quality of the product, packaging and logistics and be aware that customers can always leave their feedback which may affect the rating of the shop and its' future profit.

The current research can contribute to the language study disciplines, marketing studies, e-commerce studies, consumer buying behavior studies.

REFERENCES

1. 2010 social shopping study reveals changes in consumers' online shopping habits and usage of customer reviews. (2010). Retrieved from <https://www.businesswire.com/news/home/20100503005110/en/2010-Social-Shopping-Study-Reveals-Consumers'-Online> (accessed: 20 November, 2019).
2. Akhlaq, A., & Ahmed, E. (2013). The effect of motivation on trust in the acceptance of Internet banking in a low income country. *International journal of bank marketing*, 31(2), 115-125.
3. Amazon.com. Retrieved from amazon.com (accessed: 15 November, 2019).
4. Azam, A., Qiang, F., & Sharif, S. (2013). Personality based psychological antecedents of consumers' trust in e-commerce. *Journal of WEI business and economics*, 2(1), 31-40.
5. Chiu, M.M., & Khoo, L. (2005). A new method for analyzing sequential processes: dynamic multilevel analysis. *Small Group Research*, 36(5), 600-631.
6. Chiu, M.M. (2008). Effects of argumentation on group micro-creativity: statistical discourse analyses of algebra students' collaborative problem solving. *Contemporary educational psychology*, 33, 382-402.
7. Delina, R., Vajda, V., & Bednár, P. (2007). Trusted operational scenarios – trust building mechanisms and strategy for electronic marketplaces. Retrieved from <http://www.seamless-eu.org/deliverables/TrustedOperationalScenarios.pdf> (accessed: 10 November, 2019).
8. Grabner-Kräuter, S., & Faullant, R. (2008). Consumer acceptance of internet banking: the influence of internet trust. *International journal of bank marketing*, 26(7), 483-504.
9. Hauben, M., & Hauben, R. (1997). *Netizens: on the history and impact of Usenet and the Internet*. Los Alamitos: IEEE Computer Society Press.
10. Jones, K., & Leonard, L.N.K. (2007). Consumer-to-consumer electronic commerce: a distinct research stream. *Journal of electronic commerce in organizations*, 5(4), 39-54.
11. Lee, S.M., & Lee, S.J. (2005). Consumers' initial trust toward second-hand products in the electronic market. *Journal of computer information systems*, 46(2), 85-98.
12. Li, H., Ye, Q., Law, R., & Wang, Z. (2010). A purchasing-intention model in C2C e-commerce of China: the role of perceived risk, trust, perceived benefit and their antecedents. *ACM International conference proceeding series*, 101-109.
13. Mayer, R.C., Davis, J.H., & Schoorman, F.D. (1995). An integrative model of organizational trust. *The academy of management review*, 20(3), 709-734.
14. Rheingold, H. (1993). *The virtual community: homesteading on the electronic frontier*. Reading, MA: Addison-Wesley.
15. Rourke, L., Anderson, T., Garrison, D.R., & Archer, W. (2001). Methodological issues in the content analysis of computer conference transcripts. *International journal of artificial intelligence in education*, 12, 8-22.
16. Swales, J. (1990). *Genre analysis: English in academic and research settings*. Cambridge: Cambridge University Press.
17. Tannen, D. (2019). *Discourse analysis – what speakers do in conversation*. Retrieved from <https://www.linguisticsociety.org/resource/discourse-analysis-what-speakers-do-conversation> (accessed: 15 November, 2019).
18. Tenorio, E.H. (2011). Critical discourse analysis. An overview. *Nordic journal of English studies*, 10(1), 183-210.
19. Wever, B. de, Schellens, T., Valcke, M., & Keer, H. van. (2006). Content analysis schemes to analyze transcripts of online asynchronous discussion groups: a review. *Computers & education*, 46(1), 6-28.

20. Yaobin, L., & Tao, Z. (2007). A research of consumers' initial trust in online stores in China. *Journal of research and practice in information technology*, 39(3), 167-180.
21. Yoon, H.S., & Occena, L.G. (2015). Influencing factors of trust in consumer-to-consumer electronic commerce with gender and age. *International journal of information management*, 35, 352-363.