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IMPLEMENTING THE EXTENSIBLE BUSINESS REPORTING LANGUAGE(XBRL)ON IMPROVING THE QUALITY AND TRANSPARENCYOF FINANCIALREPORTING

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ABSTRACT

Extensible business reporting language, as a powerful tool, facilitates the efficiency and effectiveness of the financial reporting process, and improves the process of information education and transparency in disclosure. Therefore, the present study examines the role of implementing the Extensible Business Reporting Language (XBRL) on improving the quality of financial reporting and increasing the transparency of financial information. The research is applied, analytical-survey method and statistical society, the auditors are independent and are members of the Iranian Association of Official Accountants in order to obtain their views, a questionnaire was designed for three hypotheses, and 20 questions were designed and randomly among 160 members of the community, in the year 2017, 150 questionnaires were completed and collected by the members and analyzed by statistical methods (binomial test and t test). The results of the research confirmed the research hypotheses and showed that the implementation of the Extensible Business Reporting Language (XBRL) improved the quality of business reporting, improving the transparency of financial information.

Keywords: *Extensible Business Reporting Language (XBRL), Quality Improvement, Transparency of Information, Business Reporting*

INTRODUCTION

Extensible Business Reporting Language (XBRL) is fast moving from the vision phase to a practiced global standard for financial and business reporting information. There is no wonder that the XBRL data standard is setting its foothold around the world since XBRL address the problem of data integrity, timeliness and reusability. Management and other key stakeholders need access to timely, relevant, and accurate financial and business information.

Innovations in the field of information technology caused relevance and transparency of information will be enhanced by methods such as Internet business Reporting and Extensible Business Reporting (XBRL). The XBRL language is a subset of XML that has been created to describe business reporting information. This language is intended to provide, publishing, exchanging, studying and analyzing business and accounting data and provides a standardized way to exchange business reporting information between different software applications. In the XBRL environment, financial information is provided on glue that allows the software to understand the data and can generate user-generated reports (Flowerday et al., 2006). The purpose of using an expanded business reporting language in the capital market is to report the same to financial statements and to provide more assistance to users of information and financial

statements. Using business reporting language, financial information users do not need to convert financial data in a different form. This will increase the speed of reporting as well as the extraction of reliable and efficient information (Bozorg Asl and Poorkani, 2006).

The XBRL Consortium also introduces it as follows: XBRL is a language for electronic exchange of financial and business data that has revolutionized business reporting across the globe and has major benefits in the provision, analyzes and exchanges business information and provides for all those who deal with the provision and use of financial data. It saves costs, improves performance, and improves accuracy and reliability (Alles & Piechocki, 2012). Since section 409 of the Sarbanes Oxley Law provides for the provision of assurance services to verify the accuracy of online reports available. XBRL has the capability to provide a continuous business reporting environment that can increase the accuracy of online reporting of financial reports (Efendi et al., 2014). XBRL also has the ability to accelerate and facilitate the procurement; analysis of accounting information provides auditors with a view to assessing the accuracy and transparency of reporting (Liu et al., 2014).

This reporting language, by standardizing between the content and the context or the context, the use of this information is possible for various purposes. Data that is pasted on the XBRL enables the user to view financial data in different formats, using different assumptions. As a result, users of financial information are no longer limited to viewing data only in the form that companies offered. Therefore, this business reporting language has the potential to facilitate the exchange, collation and analysis of information and also reduces information asymmetry by improving the transparency and reuse of reporting information (Arab Mazar and Sarafaraz, 2016).

Cox a former chairman of the US Securities Exchange Commission, states that XBRL will facilitate the exchange of information; and the ability to erase earnings management by supervisors within the firm, such as the board of directors and internal auditors, the benefits of other uses of this business reporting can be the possibility of transferring information in vivid form; increasing the ability to compare financial reports; providing quick access to all types of information in the defined categories; also, in the field of audit, automatic validation of calculated amounts or their matching with disclosure checklists in other areas, it is also possible to increase the protection of participants in the capital market, detect abusive practices and mistakes made by taxpayers, as well as the creation of assurances for borrowers (Alles & Piechocki, 2012). In recent years, the use of this language by regulatory authorities in various areas of the capital market, banking, financial supervision, taxation, companies responsible for registration of companies, etc., are required and most developed countries have implemented the language (Aziz Khani et al., 2015).

Therefore, XBRL is a major development in business reporting globally and has great benefits in the provision, analysis and exchange of financial information, which increases the efficiency of financial information.

Enachi & Ioan (2015) state that the XBRL reporting system is considered a revolution in business reporting which reduces the error rate, provides faster and cheaper access to information, increases the qualitative relevance of information for producers and users of financial statements.



Statement of the problem

XBRL increases transparency and information quality and significantly reduces the asymmetry of information available in the capital market and the feasibility of comparing business reporting between different companies (Liu et al., 2014). The Chartered Financial Analyst (CFA) Institute in 2007, a survey was conducted to measure XBRL awareness and its applications for business reporting and disclosure for end-users, including analysts, investors, creditors and investment advisors. The results of the survey showed that XBRL increases the ability to assess the matching of information with items extracted from the report. It makes it easier to analyze data and provide timely updates to reports and increase potential human errors in reporting processes. By using XBRL, the comparability of reporting information items with other companies as well as different financial periods increased. In December 2008, the US Security & Exchange Commission (SEC) voted for the need to prepare financial statements using the XBRL. According to this, since June 2009, nearly 500 large companies (based on market value) were required to comply with this new requirement. And the use of this requirement for other companies was completed in June 2011. In this regard, efforts were made in the professional and academic communities to use this language to prepare financial statements (James, 2007). The growing use and use of XBRL in the world is indicative which is considered as a future approach to business reporting and may lead to the abandonment of existing methods for business reporting (Saghafi et al., 2005). XBRL adoption is growing globally. Across the globe, new activities and categories based on this language are emerging (Alice & Gray, 2012). Therefore, if the country does not adapt itself to the advances in technology and do not join this swirling wave, in the not too distant future. It will be marginalized in the international competition and will lose many business opportunities to the benefit of others.



Literature review

The US Securities and Exchange Commission also have the potential benefits of accepting XBRL as follows: the above-mentioned language eliminates the cost of manual information collection and processing and the analysis of financial information and financial comparisons and business performance between companies will facilitate reporting and industry courses (James, 2007). Chowdhuri et al 2014 state that XBRL has the potential to improve information efficiency and reduce its cost. On the other hand, Alles & Piechocki 2012 state that XBRL provides timely reporting and this capability it reduces the delay in the monitoring process, so timely analyzes can also be made. Liu et al. (2014), arguing that financial analysts are the most important and most specialized business reporting users and given the role they play as intermediaries in the capital market and also because they have better ability to process information, they claim that analysts are often a good indicator of the information content of the information environment, hence, with the assumption that if the use of XBRL would increase the analysts' analytical accuracy and the number of analysts who pursue the company's activities, this would also increase the information content of the information environment. They examined this issue experimentally on the US stock exchange by conducting an event study and the result of their research showed that there is a number of analytics that track company information and there is a positive correlation between the increases in the precision of analysts' prediction with the mandatory use of XBRL by the Securities and Exchange Commission. Their findings have also shown that the mandatory use of XBRL by the US Securities and Exchange Commission has made richer and more intelligent information intelligence. Yoon et al. (2011) investigated the effect

of XBRL acceptance on information exchange in the stock market. Research findings suggest that XBRL adoption reduces information asymmetry, as well as the demand for XBRL to be used as a growing trend for the government to promote informal acceptance for business reporting. Russell & Hoag (2004) state that using XBRL is a time when the organization is investing in this technology. This is done in two steps. The first stage, which involves making decisions for the application of this technology at the organization level, the second step involves applying it to the organizational user.

Berger & Hann (2007) and Hope & Thomas (2008) concluded in a similar study providing regular and detailed information through XBRL to stakeholders outside the organization to help them better understand their environment and provides an information symmetry between shareholders outside the organization and within the organization (board of directors).

Blankespoor et al (2012) explored the role of XBRL in information asymmetry among investors. The results of their research showed that in the early years of adopting this language, the companies listed on the US Securities Exchange (SEC) increased information asymmetry among investors and the SEC response, and those who use XBRL format reports, more information is available and their ability to predict future events has increased. Enachi & Ioan (2015) compared the quality of XBRL-based financial data and other financial reports not based on XBRL, using a rating system and concluded that XBRL-based financial data quality is far superior to other data. These advantages include greater access, greater accuracy and timeliness.

Massihabadi and Barzegar Khandoozi in a library research in 2009 entitled "Reducing Information Asymmetry Using Artificial Neural Networks and Extensible Business Reporting Language" they addressed the issue of how to reduce information asymmetry between internal users of financial statements with external users of these forms and the commercial language of expanded business reporting provided an effective tool for creating information symmetry. Of course, they went further and stated that if they built this language using intelligent Artificial intelligence programs, you can use the financial statements of the company to the best of users (Massihabadi and Barzegar Khandoozi, 2009).

Nicomaram and Shekhari (2010) in his study examined the relationship between business reporting (XBRL) with qualitative characteristics of accounting information from the perspective of senior accountants of companies admitted to the stock market. The objectives of this study include examining the relationship between XBRL and the qualitative characteristics of accounting information, identifying XBRL and its application in accounting, describing and presenting how XBRL works and analyzing the disadvantages and advantages of XBRL as the title of XBRL's relationship with the qualitative characteristics of accounting information was formed from the viewpoint of senior accountants of listed companies in Tehran Stock Exchange. The results confirm the association of XBRL with each of the relevancy variables, reliability and comparability of accounting information. Aziz Khani et al. (2015) in a study entitled The effect of extensible business reporting language on auditing, opportunity or challenge found that the use of expanded business reporting language, in three areas, could be compared the accuracy of information and the form of providing information for the audit profession creates opportunities and can improve the quality of the audit.

Arab Mazar and Jaberi Nasab (2009) in an article entitled "XBRL business reporting revolution in the recent decade" an expanded business reporting language is an essential new reporting tool and the period of the traditional paradigm (print reports) is over. Arab Mazar and Sarafraz



(2016) in an article titled "improving corporate governance through Extensible business reporting language" improving the transparency and efficiency of information, there is a direct relationship with improving corporate governance. Therefore, the use of XBRL technology has been instrumental in delivering better corporate governance.

Research hypotheses

First Hypothesis: the implementation of the Extensible Business Reporting Language (XBRL) is effective in improving the quality of business reporting.

Second hypothesis: implementing the Extensible Business Reporting Language (XBRL) will enhance the transparency of business information.

RESEARCH METHOD

In this research, the research method is an analytical survey that analyzes the relationship between variables based on the objectives of the research. Locally this research is a field research and library. The subject of the research is good because it uses the results of fundamental research to improve to complete the behaviors, methods, tools, devices, products, structures and patterns used in the statistical society. Based on research goals that examine the role of implementing the Extensible Business Reporting Language (XBRL) in improving the quality of business reporting, increasing the transparency of financial information, the independent auditors of the Iranian public accountants' community, in 2017, it was selected as a statistical society to investigate using the views and opinions of this specialized group. The method of collecting the research data is through sample sampling, ie, sample is referenced to statistical units and information is collected. The instrument used to collect data in this study was a questionnaire.



Questionnaire structure and research structure

In this research, the validity and reliability of the questionnaire were first studied and the original questionnaire was set up and reviewed by the experts, faculty members and obscure and inappropriate points were removed and some species that were not related to the research hypotheses and objectives were removed or modified. After applying corrective comments, a final questionnaire was set up that expresses its validity. Also, Cronbach's alpha coefficient was used to determine the reliability or reliability of the results. After approving the experts, 160 questionnaires were distributed among the members of the community 150 questionnaires were collected and after correlation test, the reliability of the questionnaire of the output alpha value was determined by SPSS software (83%). This means that the questionnaire has the necessary reliability. For testing 2 research hypotheses, 20 questions were designed and to analyze the hypotheses, first, based on the numerical value of 5 to 1 allocated to the options (very much to very low) the total score of each sample person was determined for the hypothesis and after dividing it into the number of questions, the average is more than 3, indicating agreement with the hypothesis.

Descriptive Statistics

The descriptive findings of the research are as follows:

45% of respondents are between 31 and 40 years of age, and 61% of respondents have a master's or doctorate degree. This makes the research more powerful in terms of theoretical foundations. 46% of the respondents have a history of over 10 years in the audit profession, which is a significant percentage.

73% of respondents have high job titles in the accounting and auditing professions, so their answers can be of considerable reliability.

ANALYTICAL STATISTICS

Study of the first hypothesis:

The hypothesis of zero and the other hypothesis related to the first hypothesis of the research are defined as:

H0: The implementation of the Extensible Business Reporting Language (XBRL) does not affect the quality of business reporting quality.

H1: The implementation of the Extensible Business Reporting Language (XBRL) is effective in improving the quality of business reporting.

The probability of the Kolmogorov-Smirnov test is equal to 0.022, which is smaller than 0.05, therefore, with a confidence of 0.95, the hypothesis of normalization is rejected. Consequently, we cannot use the T-1 test for the first hypothesis. The following table shows the result of the Kolmogorov-Smirnov test, a sample that is used to test the assumption of the normalization of data that is a condition of using the mean comparison of a society with a constant number for the first hypothesis.

Table 1: Table of normality test results of first hypothesis

Probability value (P-value)	Kolmogorov-Smirnov statistics	first hypothesis
0.022	0.101	hypothesis is normal

If the average of the points given to the terms related to the theory that the implementation of the Extensible Business Reporting Language (XBRL) is effective in improving the quality of business reporting" is greater than 3, the hypothesis H0 is rejected, and therefore the assertion stated in the hypothesis H1 is confirmed.

The probability value of the Wilcoxon test is one example to check the statistical hypothesis $H_0 : \mu \leq 3$ versus the value of $H_1 : \mu > 3$ is 0.022 which is smaller than 0.05, so it is assured with a confidence of 0.95 and H_0 is rejected and thus the opposite hypothesis H_1 is confirmed and this means confirming the research first hypothesis. Meanwhile, the mean and average values of the selected options are equal to 14.4 and 4.20 which are roughly equivalent to 4 that will be the equivalent of the option and this is confirmed by the results of the statistical test. The following graph contains information about first hypothesis.

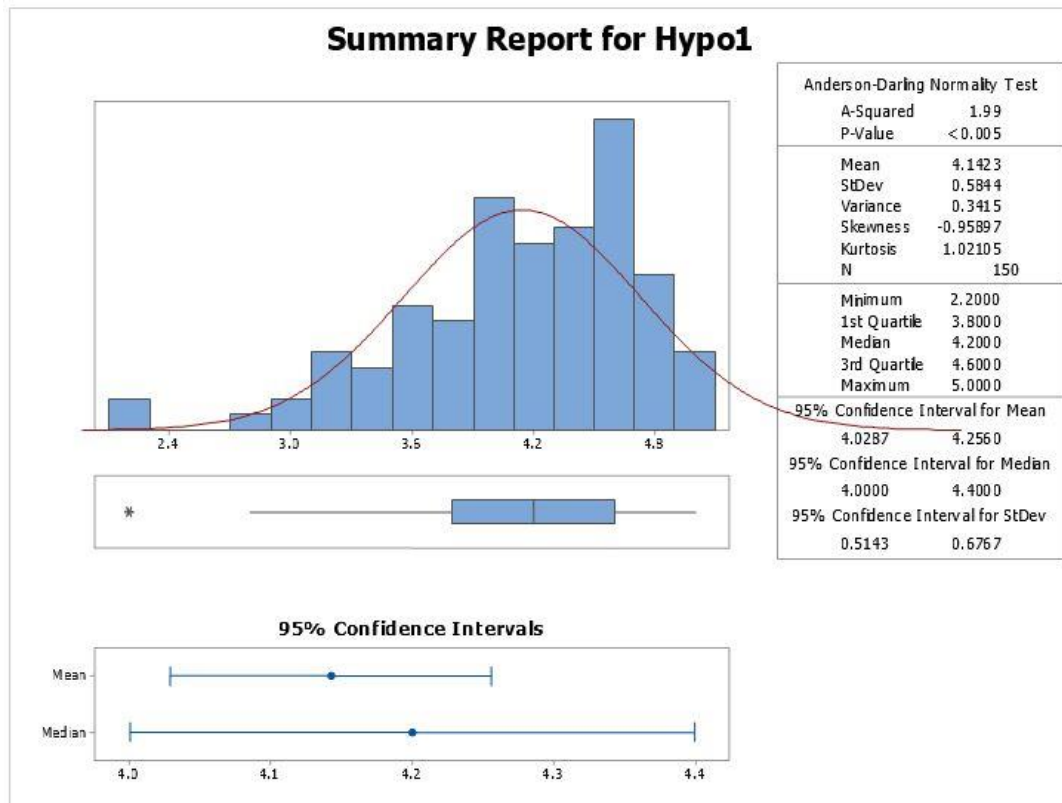


Chart 1: Information on first hypothesis



Conclusion: The implementation of the Extensible Business Reporting Language (XBRL) is effective in improving the quality of business reporting.

Examining the second hypothesis:

The hypothesis of zero and the other hypothesis related to second hypothesis of the research are defined as follows:

H0: Implementing the Extensible Business Reporting Language (XBRL) does not enhance the transparency of financial information.

H1: Implementing the Extensible Business Reporting Language (XBRL) will enhance the transparency of financial information.

The probability of the Kolmogorov-Smirnov test is equal to 0.000, which is smaller than 0.05, therefore, with a confidence of 95%, the hypothesis of normalization is rejected. Consequently, we cannot use the T-1 sample test for second hypothesis. The following table shows the result of the Kolmogorov-Smirnov test, a sample used to test the hypothesis of the normalization of data, which is a condition of using the mean comparison of a society with a fixed number for second hypothesis.

Table 2: Results of the normality test of second hypothesis

Probability value (P-value)	Kolmogorov-Smirnov statistics	second hypothesis
0.000	0.126	hypothesis is normal

If the average of the points given to the terms related to the theory that the implementation of the Extensible Business Reporting Language (XBRL) is effective in improving transparency of

business information" is greater than 3, the hypothesis H_0 is rejected, and therefore the assertion stated in the hypothesis H_1 is confirmed.

The probability value of the Wilcoxon test is one example to check the statistical hypothesis $H_0 : \mu \leq 3$ versus the value of $H_1 : \mu > 3$ is 0.000 which is smaller than 0.05, so it is assured with a confidence of 0.95 and H_0 is rejected and thus the opposite hypothesis H_1 is confirmed and this means confirming the research second hypothesis. Meanwhile, the mean and average values of the selected options are equal to 4.13 and 4.20 which are roughly equivalent to 4 that will be the equivalent of the option and this is confirmed by the results of the statistical test. The following graph contains information about second hypothesis.

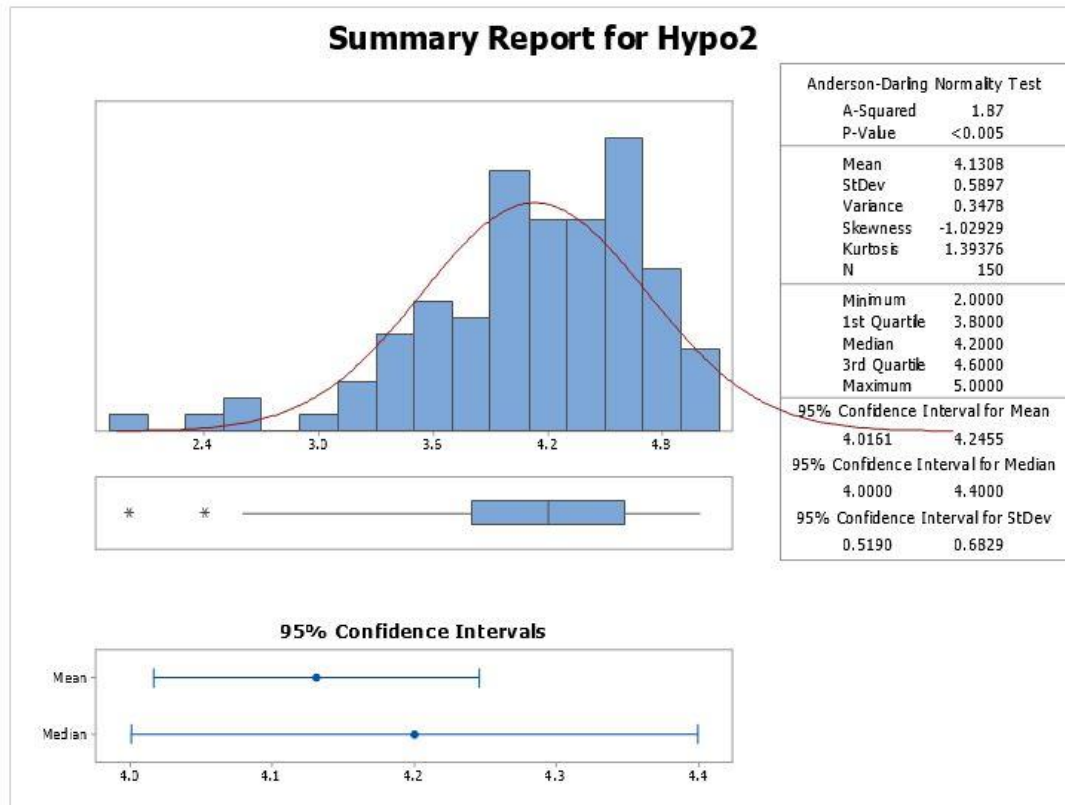


Chart 2: Information on second hypothesis

Conclusion: The implementation of the Extensible Business Reporting Language (XBRL) is effective in improving the transparency of business information.

CONCLUSION

eXtensible Business Reporting Language (XBRL) is an XML-based innovation which has the potential to play an important role in the production and consumption of financial information. XBRL is an Internet-based non-proprietary open standard which is used for the preparation, exchange and publishing of financial information among disparate computer platforms, software applications, and accounting standards. XBRL eliminates time-consuming, labor-intensive and error-prone practices which are currently used for generating and exchanging financial reports. The Extensible Business Reporting System (XBRL) is now considered a

revolution in business reporting which reduces the error rate, provides faster and cheaper access to information, and increases the qualitative relevance of information for producers and users of financial statements. Therefore, the financial reporting language is based on the labeling and labeling of electronic information it provides the opportunity for users and users to provide their financial reports. The implementation of the corporate business reporting language will lead to the clarification of information and significantly reduce the information asymmetry in the capital market and the use of this business reporting language will accelerate the comparability of business information between different companies. In this research, the role of implementing the Extensible Business Reporting Language (XBRL), improving the quality of business reporting, and increasing the transparency of business information has been examined. The results of data analysis and analysis of hypotheses suggest that all hypotheses are validated. The findings of this study showed that the implementation of the Extensible Business Reporting Language (XBRL) by companies, improves the quality of business reporting, improving the transparency of business information.

The results of the first hypothesis of this study, in line with the research; Nikomaram and Shakeri (2010), Enachi & Ioan (2015) and Liu et al. (2014), and the results of testing the second hypothesis of this study in consistent with research; Arab Mazar and Sarafarzan (2016) Alles & Piechocki (2012) and Liu et al. (2014) .It is suggested to the directors and the company's audit committee to learn more about the Extensible Business Reporting Language (XBRL) and the benefits of using it, in line with global developments in the field of business reporting, appropriate strategies to implement this new technology.



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