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context. *REBE* encourages cross-disciplinary research work of Romanian and foreign scholars.

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1.1.1 Author Information

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Dr. Bogdan Glăvan
Romanian-American University
Bulevardul Expoziției nr. 1B
București
E-mail: bogdan.n.glavan@gmail.com

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CONCEPTUAL APPROACHES TO TAX EVASION IN ROMANIA

Mihai Aristotel UNGUREANU

Mirela CĂLUGĂREANU

Mădălina CARAUS

Anne-Marie BARTALIS *

Abstract

Concisely, tax evasion involves the avoidance of lawfully assessed taxes owed to the general consolidated budget of Romania. Although literature related to tax evasion created the notions of "legal tax evasions" and "illegal tax evasion", this distinction between the two concepts is incorrect as tax evasion = breaking the tax laws, and therefore cannot be legal by definition. As tax evasion cannot be measured, tax authorities can only provide estimates in their reports. Measures taken in order to detect, fight against and prevent tax evasion serve the purpose of controlling the consequences of this socio-economic phenomenon.

Keywords: state budget revenues, fiscal risks, tax evasion, measures to fight and prevent

JEL Classification: H20, H21, H26

1. Introduction

Fighting against and preventing tax evasion represents every state's strategic objective. The global financial crisis determined a rising trend in tax evasion by diminishing the tax base or by concealing it. In this case, improving the tax collection system for the general consolidated budget of Romania can mainly be achieved through firm and permanent actions aimed at fighting against and preventing tax evasion.

2. Provisions regarding the tax evasion offences

The concept of tax evasion is subject to multiple definitions, their content being based on the historic period one refers to. According to the Explanatory dictionary of the Romanian Language, tax evasion refers to the avoidance, through any means, by a person or corporation organized under the Romanian law, of lawfully assessed taxes

Mihai Aristotel Ungureanu is Professor at the Romanian American University, Bucharest. E-mail address: m_a_ungureanu@yahoo.com

Mirela Calugareanu is PhD. student at the Lucian Blaga University of Sibiu, Sibiu

Madalina Caraus is PhD. student at the Lucian Blaga University of Sibiu, Sibiu

Anne-Marie Bartalis is PhD. student at the Lucian Blaga University of Sibiu, Sibiu

owed to the general consolidated budget of Romania. Dictionary of the modern Romanian language defines tax evasion as a practice of avoiding to pay the true tax liability, whereas the Explanatory dictionary of the English language provides a similar definition. Tax evasion consists of all legal and illegal practices through which the interested parties understate their taxable income in order to partially or fully circumvent tax obligations [Saguna, Tutungiu, (1995)]. From a tax doctrine point of view, it is believed that understating the taxable income and breaking the equal tax justice for all principle can either be legal or illegal [Muzellec, (1993)]. The academician Iulian Vacarel considers the tax evasion to be avoiding to include a part of the taxable income in the tax base [Vacarel, (1999)]. According to Law no. 87/1994 on fighting tax evasion, Tax evasion is the avoiding by any means, totally or in part, from the payment of taxes, duties and other amounts owed to the state budget, local budgets, the state social insurance budget and the outside the budget special funds by the natural and juridical persons, Romanian or foreign persons further on called taxpayers. Unfortunately, Law. no. 241/2005 on preventing and combating tax evasion, which is still in effect, does not provide a definition for tax evasion. The literature distinguishes between the notions of legal/licit tax evasions and illegal/illicit tax evasion. Moreover, French and Anglo-Saxon doctrines make the same categorization. In the recent articles authors refer to legal tax evasion as tax optimization. Most of the opinions expressed on this matter define licit tax evasion as the practice of circumventing the legal provisions of the tax law, by speculating the imprecise/ambiguous articles in the law. More recent voices state that legal tax evasion represents a tax optimisation mode through which the taxpayers gain competitive advantage through the favorable interpretation of legal loopholes. Our opinion on tax evasion is that the above-stated views on legal tax evasion are incorrect as the literature clearly states that tax evasion involves breaking the tax law.

Tax evasion developed as a hard to control socio-economic phenomenon mainly determined by: imperfect tax laws, low standard of living, the culture and public conscience of the population, aggressive taxation policies and corruption.

According to article 9 paragraph 1 of Law no. 241/2005, the following deeds are deemed tax evasion crimes and are punished with imprisonment from 2 to 8 years and the interdiction of certain rights:

- a) hiding the taxable asset or source;
- b) omitting, in full or in part, to indicate in the accounting books or in any other legal documents, the commercial operations performed or the realized income;
- c) including, in the accounting books or in any other legal documents, expenses which do not rely on real operations, or other fictitious operations;
- d) the alteration, destruction or hiding of accounting books, storage memories of cash registers or any other means of data storage;
- e) keeping two sets of accounting books, using documents or other means of data storage;
- f) avoiding to make financial and tax audits or the customs checks either through failure to declare or the fictitious or inaccurate declarations regarding the headquarters or branch offices of the checked persons;

- g) substitution, damage or estrangement by debtors or third persons of any assets seized in compliance with the provisions of the Fiscal Procedure Code and the Criminal Procedure Code.

A deed constitutes tax evasion if it was performed with the clear intention of evading the payment of tax obligations. The tax payer's setting, in bad faith, taxes, fees or contributions which result in obtaining, without any lawful right, amounts as returns or refunds from the general consolidated budget or compensations due to the general consolidated budget; the punishment is imprisonment from 3 and 10 years and the interdiction of certain rights (art. 7 paragraph 1). Association with the purpose of committing these offences is punished with imprisonment from 5 and 15 years and the interdiction of certain rights (art. 7 paragraph 2). Law no. 241/2005 on preventing and fighting tax evasion also set the auxiliary offences related to tax evasion. The same normative act defined the situations for the mitigation of sentences, the interdictions, but also the deeds for which the minimum and maximum jail time has been raised. Law no. 241/2005 on preventing and fighting tax evasion defines fictitious transactions as being the alteration of reality by creating the false image that a transaction took place which in fact never existed. This is useful in the process of punishing taxpayers acting in bad-faith by using bogus shell corporations. In most of the cases, this tax evasion technique is used in order to artificially raise the deductible VAT in the whole supply chain. In some cases, this tax evasion scheme has been used to illegally claim VAT refunds.

Although by passing the Law no. 241/2005 on preventing and fighting tax evasion the authorities attempted to increase the scope of the legal means through which the State checks the economic activity of the taxpayers, we consider that more coherent, clearer and more efficient regulations are required and should also govern the tax authority's responsibility. We support our position based on the reality that there are many instances regarding transfers of shares undertaken in order to evade taxation, many cases of fake business addresses in order to avoid tax audits and numerous insolvencies with the aim of avoiding the payment of tax liabilities owed to the general consolidated budget. On the other hand, we argument that the law should accommodate a new chapter on fines and penalties for the offences presenting a low social risk.

2.1. Methods to estimate tax evasion

Literature holds different views regarding the dimension of tax evasion and the methods used to measure it. Almost all recent researches and articles conclude that tax evasion cannot be measured and that tax authorities can only provide estimates in their reports.

According to the Fiscal Council's calculations based on National Institute of Statistics data, tax evasion has a large share in the Romanian economy, accounting for 16.2% of GDP in 2013. VAT recorded the most widespread tax evasion for 2013, amounting to a staggering 12.21% of total GDP and generates 75% of the total tax fraud. Fiscal Council holds the view that VAT tax evasion represents the difference between the theoretical level of the implicit VAT from of the economic activity, including the unobserved economy, and the VAT revenues collected by the State

according to ESA95 methodology. This assessment for the VAT tax evasion is not necessarily the result of tax evasion exclusively, and can be explained by other factors such as: (i) legal practices of VAT elusion, (ii) the entry of companies into insolvency, leading to a reduction of VAT revenues collected by the State, and (iii) the accuracy of the national accounts data, on which the theoretical VAT was estimated¹.

The theoretical VAT is calculated by identifying those categories of expenditures that should generate final non-refundable VAT. At the macroeconomic level, these expenditures can be divided into three categories :

- Final consumption expenditure of households and government;
- Intermediate consumption of goods and services required to produce other goods and services;
- Gross fixed capital formation (GFCF) (investments) made by companies (i) not subject to VAT or (ii) that produce goods and services exempted from VAT.

In order to identify the unobserved economy in Romania, the economy can be divided into two sectors: formal and informal. For the formal sector, it is considered the underreporting of labor force employment and also the tax evasion in the case of non-financial corporations, with an impact on gross value added underreporting. Tax evasion is calculated as the variation between the theoretical and the (actual) VAT collected. In the case of the informal sector, the evaluation of the unobserved economy is done by accounting for all activities performed by family associations and self-employed entrepreneurs. The appraisal of the social security contribution and the personal income tax evasion has taken into account NIS' estimation regarding the employees' remuneration corresponding to the added value related to the undeclared work and to the informal sector. Regarding the tax evasion on corporate income tax, it was considered the NIS² estimate on gross operating surplus of the unobserved economy (as a proxy for the profit corresponding to the unobserved economy) and its share in the total gross operating surplus of the economy. Regarding the excise duty evasion, according to the estimates of the Fiscal Council, cigarettes are attributed the largest contribution to the evasion as, on the average, the illicit trade with cigarettes accounted for a 20% market share in the period 2003 – 2013.

2.2. Measures taken in order to detect, fight against and prevent tax evasion in Romania

By analyzing at the data presented by the Fiscal Council, one can draw the conclusion that the degree of tax compliance in 2013 was 55.8%.

Based on the Fiscal Council's calculations for tax evasion, one can calculate the degree of compliance with the major tax categories as a ratio between the reported income submitted to the budget and the theoretical revenues or true income (reported income plus tax evasion). Tax revenue to GDP (taxes and social contributions) in Romania was equal to 27.5% in 2013, 13 percentage points of GDP lower than the EU

¹ Romanian Fiscal Council, Annual report 2013

² National Institute of Statistics

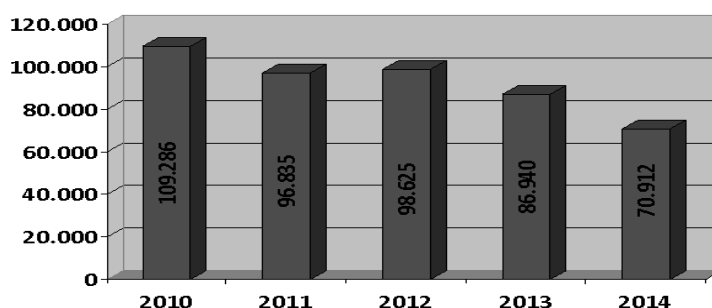
average (40.5%). Main causes for this poor performance are: deficitary tax collection system, an inefficient tax authority, ambiguous tax laws and a widespread tax evasion. Although initial measures to reform the tax collection system have been taken by NAFA³ and the institution underwent an extensive reorganization in 2013, we believe that the expected results are yet to come. The efforts to reform the tax collection system and to create a modern tax authority constitute, in our opinion, an essential requirement for ensuring the proper functioning of the state. We also acknowledge the fact that this is a long-term procedure, with medium and long term consequences. In this given context detecting, fighting against and preventing tax evasion is crucial for reaching the structural budget deficit targets set for Romania. Furthermore, lower tax rates can reduce the tax fraud levels. Measures taken in order to fight against tax evasion are closely linked to the underlying cause of this socio-economic phenomenon.

Among traditional approaches to reduce tax fraud we can invoke the following:

- tax reform – simplifying tax laws, creating a clearer, more coherent tax law and cutting on the number of tax returns;
- rethinking the working procedures;
- reducing tax rates;
- fighting corruption;
- creating campaigns aimed at promoting the importance of tax compliance;
- public expenditure transparency.

In order to support the need for such measures we have carried out a quick analysis of NAFA's performance regarding the efficiency of the tax audit department inside the institution. In the time period 01.01.2010 – 31.12.2014 the tax audit and tax inspection personnel carried out checks as part of the campaign to prevent and fight against tax fraud. The evolution of the tax audits is highlighted in Figure 1.

Figure 1 – Number of tax audits and tax inspections for the time period 2010 – 2014



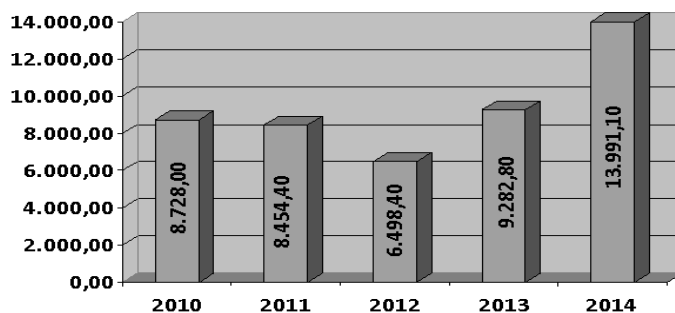
Source: data collected by the authors from NAFA's internal records

The data presented indicates that the tax audit department carried out 28% fewer inspections in 2014 when compared to 2012. Moreover, only 0.89% of the taxpayers have been subjected to tax audits in 2014. When looking at the figures related to the

³ National Agency for Fiscal Administration

additional payment obligations set by the tax audit authority, we can see a rise of 153% for the time period 01.01.2012 – 31.12.2014. The dynamics of the additional payment obligations amount is exhibited in Figure 2.

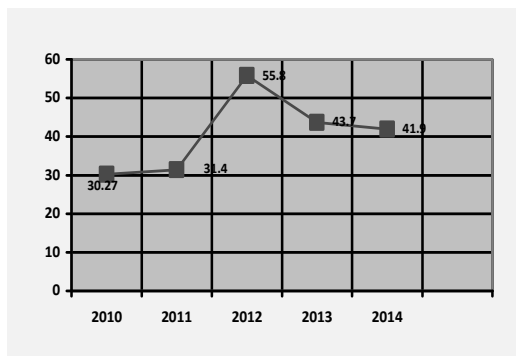
Figure 2 – Additional payment obligations set by the fiscal inspection department for the time period 01.01.2010 – 31.12.2014



Source: data collected by the authors from NAFA's internal records

Analyzing the key performance indicators of the financial inspections, one can observe the fact that year 2014 recorded a peak in terms additional payment obligations established – 13,991.1 mil. Lei. This indicates that the planning, selection and scheduling activities were improved. Taking into account the fact that the rate of collection of further payment obligations resulted by means of fiscal inspections is 12,68% for legal persons and 5.42% for natural persons, we believe this revenue source is not solid enough to sustain the reduction of tax rates planned by the Romanian Government. It is worth mentioning that the fiscal relaxation measures projected in the upcoming Fiscal Code are based upon the presumption that the impact will be compensated by creating a more efficient tax collection system. Reducing tax evasion plays an important role in achieving this objective. Another key indicator taken into account is *the degree of insured tax debt collection regarding the insurance policies enacted by fiscal inspection*. The evolution of this indicator for the time period 01.01.2010 – 31.12.2014 is included in Figure 3.

Figure 3 – The degree of insured tax debt collection regarding the insurance policies enacted by fiscal inspection



Source: data collected by the authors from NAFA's internal records

The findings regarding the evolution in the degree of insured tax debt collection regarding the insurance policies enacted by fiscal inspection reveal the fact that some amounts are not fully insured. Possible causes for this situation are either the lack of interest from the tax audit personnel in tracking down the sizable goods, bank accounts and sources of revenue or the insufficient taxpayer wealth to cover the additional obligations established.

In order to detect, fight against and prevent tax evasion, in 2013 a new authority – General Directorate for Fiscal Antifraud (GDFA)- was established inside NAFA. This structure is responsible for countering fraud and evasion in relation to tax. As this is a new structure we couldn't carry out a comparative analysis of the results of this institution and we couldn't determine the exact contribution GDFA's activities had towards the revenue collection to the general consolidated budget. Data published by NAFA revealed that GDFA applied 19.420 fines and carried out controls at 24.160 taxpayers, meaning that 80% of the audited taxpayers were fined. One of the measures to prevent and fight against tax evasion is through exerting constraint in order to force the taxpayers' compliance with the tax laws, but in our opinion Tax authorities have a still a lot to do in the field of taxpayers guidance and assistance and improving the general level of service provided with the aim of improving the tax collection system.

3. Conclusion

We believe that no matter how tax evasion is defined and how we estimate its size, the effects of this socio-economic phenomenon impact the life of every Romanian citizen. Obtaining money from the Government on false pretenses or avoiding the payment of taxes to the general consolidated budget takes away resources from key areas such as healthcare, education, pension fund, safety of citizens and the Defense Department. As the estimated tax evasion remains at high levels, implementing measures taken in order to detect, fight against and prevent it should constitute a high priority for the tax authorities. In the current context we consider that anti-fraud measures are insufficient as this phenomenon will continue to exist as long as there is a market for goods and services, so we can at best contain and control tax evasion.

Our proposals regarding the anti-fraud measures that should be implemented are as follows:

- determining the fiscal behavior, based on risk analysis through electronic means;
- fiscal checks should take into account the correlation between the personal wealth in comparison with the reported revenues. This can be achieved by introducing the legal provision that each citizen should file in an Assets and Wealth declaration;
- identifying solutions through which the GDFA's additional amounts established can be collected by applying fiscal procedures;
- passing a new law regulating tax evasion. The new law should contain three main parts: fines and fines-related sanctions; offences and applicable punishments; responsibility of the tax audit inspectors for wrongfully enacting the law (error, overzealous behavior, bias);

- implementing the virtual private space as the compulsory communication platform for the legal persons, by using the electronic medium free-of-charge;
- setting up an Institute for Fiscal Studies inside NAFA in order to provide a high level of training for the staff.

In view of implementing the anti-fraud measures we also take into consideration the need to prioritize them based on the following constraints: financing needed – scope of effects – reaction time. As a success story we can nominate the recently implemented Fiscal Lottery, a project with positive returns compared to the insignificant costs involved.

It is our firm belief that the first project which should be implemented is setting up an Institute for Fiscal Studies inside NAFA, a project which would bring substantial benefits with relatively low budgeted costs, and would serve both the interests of the tax authority and taxpayers which would benefit from proper guidance and assistance, and not solely be the subjects of fiscal inspections.

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PRE-RETIREMENT PLANNING AND SATISFACTION OF PROSPECTIVE RETIREES IN THE HOTEL INDUSTRY

Aborampah AMOAH-MENSAH
Patrick DARKWA*

Abstract

Generally, studies on retirement planning (preparation) and its influence on satisfaction of prospective retirees do not seem prevalent. Drawing on the process theory of general planning and the role theory, we examine this gap in the hotel industry by interviewing 656 prospective retirees in the hotel industry in the Central Region, Ghana. We propose that pre-retirement preparation relates to pre-retirement satisfaction. The results support our proposition. Also, social support emerged as the strongest predictor of pre-retirement satisfaction.

Key words: Retirement planning, satisfaction, prospective retirees, hotel industry

JEL Classification: M1, M12, J26

Introduction

Retirement planning is of great concern to both organizations and employees, including those in hotels. Retirement planning in respect of social and psychological, especially in Ghana, and in the hotel industry, in particular, is a herculean task because there are great societal expectations on the retiree to enjoy his retirement as well as maintain the symbiotic relationship with society. According to Niederfrasnck (1980), it is never too late early or late to plan one's retirement because the quality of life during retirement is contingent upon the planning. Miller (1977) is of the view that most of the problems confronting retirees could have been averted if they had planned well. He avers that the time to plan for retirement is from 30 years and above. Retirement planning is generally the determination of how an employee wants his/her retirement to be in future. This requires putting certain measures in place like saving money, acquiring resources, and positioning oneself socially and psychologically to achieve this objective.

Employees like those in hotels spend most of their youthful ages working with organizations both public and private in anticipation of enjoying retirement life.

* Aborampah Amoah-Mensah is Lecturer in Entrepreneurship and Business Ethics, University of Cape Coast.

Patrick Darkwa is Lecturer in Accounting and Operations Management, University of Cape Coast.

Retirement involves a lot of changes in values, financial conditions and social aspects of life. It also leads to the termination of a pattern of life and a transition to a new one. Some retirees are able to adjust to their new life after retiring from employment in various ways, depending on how prepared they are socially and psychologically (Ode, 2005). Foruness, Mykletun, Solem, de Lange, Syse, Schaufeli and Ilmarinen (2015) are of the view that retirement is not static but varies among individuals and contexts. Noone, Stephens and Alpass (as cited Asebedo and Seay, 2014) indicate that retirement can be seen as both an economic and psychological issue. Retirement is now seen as a psychological problem because people live a healthy life and there is improvement in science in general. This has necessitated the need to change role identities, re-define social interactions and find new goals and purposes in life (Matour & Prout, 2007). Preparing socially and psychologically is important because financial preparation is not enough (Anderson & Weber, as cited in Prinsloo, 2009; Kim, Kwon & Anderson, 2005). According to Hartman (2014), retirement is important because it reduces the stress level of employees and gives retirees the time to rest, exercise and lead a healthier life in general. In addition, retirees have ample time to interact with family members, friends and engage in community activities.

Mainly, previous studies on retirement have stressed financial factors (Moorthy, Chelliah, Chiau, Lai, Wong & Wong, 2012; Timmerman, 2012; Cordell, Grange & Langdon, 2012; Murphy, 2013), health factors (Neuman, 2004; Howe, Matthew & Heard, 2009, Marton & Woodbury, 2013), psycho-social factors (Mdaman, 2005; Chou & Yang, 2009; Zaniboni, Sarchielli & Francaroli, 2010; Noone, 2010; Salami, 2010; Davies & Cartwright, 2011; Murphy, 2013; Thuku, 2013; Yates & Ward, 2013, Litwin & Tur-Sinai, 2015), demographic factors (Kubicek, Korunka, Hoonakker & Raymo, 2010), counseling (Wilson & Aggrey, 2012), pension institutions (Martin & Xiang, 2015) and post retirement career planning (Wohrmann, Deller & Wang, 2014). The above studies generally focused on pre-retirement preparation, in general. Studies on the nexus between pre-retirement preparation and pre-retirement satisfaction, however, seem to be silent in the extant literature. This study sets out to fill this lacuna. The objective of this study is to investigate the relationship between pre-retirement preparation and pre-retirement satisfaction in the hotel industry in Ghana. Our contribution to the retirement literature is to suggest that specific pre-retirement social and psychological preparation factors influence specific pre-retirement satisfaction factors.

Theoretical Background

Retirement Planning

Petters and Asuquo (2008) indicate that there is a case of retirement when a person is no longer with his job having served or worked for a specific number of years or attained the age of 60 in a public sector job. According to Amune, Aidenojie & Obinyan (2015), retirement means exiting from one's job, career or occupation as a result of health, age, accident or having served the required number of years with the organization. To Latulippe (2004), there is retirement when a person is disengaged economically because he has reached the retirement age and so it is assumed that there is reduction in his output. Williams (2007) also thinks of retirement as the complete or

partial disengagement from work, business or social life. Generally, some retirees are happy with their retirement while others are not. Retirement to Wang (2007) seems to be stressful and associated with loss of regular pay, isolation from workmates and increase in ample time. Retirement may be voluntary which means that an employee exits from the job on his own volition – and this is usually by resignation – perhaps to engage in other activities or rest for a while. It may also be involuntary or compulsory because of certain circumstances as old age, redundancy, or as a result of expiration of contract. Another form of retirement is mandatory retirement and is triggered by attaining the compulsory retirement age, dismissal from the job and being declared redundant. Ghosheh (2008) indicates that retirement age can be seen from two perspectives. One form is called mandatory which means that a person attains a compulsory age of going out of active work and it is generally determined by the state, an employer, a collective agreement or negotiated with the work. Another form is called pensionable age which is the age at which one qualifies for his/her pension fund/money. According to Ghosheh, the main difference between retirement mandatory age and pensionable age is that the former is part of labor laws whilst the latter is part of social security laws. According to Shultz & Wang, (as cited in Fisher, Chaffee and Sonnega, 2016), the age at which employees retire has changed over time owing to economic and social factors.

Retirement planning involves setting goals or objectives and indicating how the goals or objectives will be realized. In this case, the individual will see his way forward by achieving what is required and the resources like time and money expended during each step. Retirement planning can be formal or informal. Formal retirement planning is where the employer teaches their employees nearing retirement how to plan their retirement. The training can be general or can be tailored to meet individual specific needs. On the other hand, informal retirement planning concerns the prospective retiree thinking, talking, reading or having the desire to retire (Ekerdt, Kosloski, & DeViney (2000). Good planning will enable the individual to foresee problems ahead and the strategies adopted to avoid or limit the impact of the problems (Amune et al., 2015). Gall and Evans (2000) also posit that unrealistic expectations, lack of preparedness and uncertainty will pose a problem when retirement is imminent. Generally, retirement planning will afford the individual the opportunity to plan what he should do, the reason why he should do it, the way or the method to employ to do it, the location or the place that the activities should be carried out, the approach to execute the retirement plan and the time to implement the plan. To that effect, Atchley (1988) indicates that the onus is on society to sensitize individuals who are working to prepare financially, physically and socially in order not to be overtaken by events. To buttress this, Buckley (2002) suggests that social security benefits and income from pensions cannot solve all the problems associated with retirement. Therefore, the prospective retiree should make provision for extra income to secure them enjoyable retirement. Onoyas (2013) avers that retirement is associated with a myriad of problems, including sudden loss of income, financial insufficiency and anxiety, deteriorating health conditions, anxiety about suitable post-retirement accommodation and the problem of learning new survival skills for post-retirement life. As a result, it is essential that one plans one's retirement taking into consideration one's lifestyle and the resources to cater for one's family and dependents.

Process Theory of General Planning

The process theory of general planning propounded by Friedman and Scholnich (1997) posits that individuals progress through a series of stages as they plan for an event. The first stage of the process concerns understanding the issues at stake. The next thing to do is to set goals or objectives. The next stage is where the person will decide to plan his activities to achieve the goals set. The activities include time and certain behaviors required to achieve the goals set. Having planned for the activities, the person will develop a strategy to achieve the goals set. According to Muratore (2010), the strategy involves assessing or analyzing how the strategy will be effective in order to achieve the goals set. The plan is then implemented. That is, action is taken to put into reality the actual plan. The plan can be altered or modified periodically.

The Role Theory

The role theory holds that everyone has a role to play in the society, including the roles in the organization. According to Carter and Cook (1995), roles that an individual plays have an impact on his behavior and attitudes. Therefore, these roles affect the individual even after retirement. The role theory indicates that retirement from active work may either lead to psychological distress or enhancement of psychological well-being. The former (psychological distress) holds that when someone is in active employment, both the workplace and the environment, in general, serve as one identity. Therefore, losing this 'identity' may trigger dissatisfaction and eventually lead to depression. The latter also holds that employment puts a lot of strain on the employee and so leaving the job as a result of retirement relieves the employee of such stress (Kim & Moen 2002). Accordingly, people who endeavor to have in-depth view about their role before retirement will find the transition more enjoyable than those who fail to understand their roles well (Noone, 2010).

Retirement Preparation Satisfaction

Satisfaction, according to Hoyer and MacInnis (2001), is associated with feelings of acceptance, happiness, relief, excitement and delight. Brajkovic, Gregurek, Kusevic, Ratkovic, Bras & Dorđević, (2011) also assert that satisfaction is the perceived discrepancy between aspiration and achievement – ranging from the perception of fulfillment to that of deprivation. Retirement satisfaction is also defined as the level of contentment one has with one's life in retirement (van Solinge & Henkens, 2008). Retirement preparation satisfaction eases the potential retiree from stress as he perceives that there is hope (Lockenhoff, Terracciano & Costa, 2009). It also generally makes the pre-retirement employee happy (Brajkovic et al. (2011) and generally enables him/her to gain respect (Sung, Kim & Torres-Gil, 2010).

The Model of the Study

Figure 1 illustrates the framework of the study which is based on the process theory of general planning and the role theory. It is expected that prospective retirees in the hotel industry will prepare their retirement socially and psychologically so that they will be satisfied in terms of healthiness, enamoredness and receptiveness.

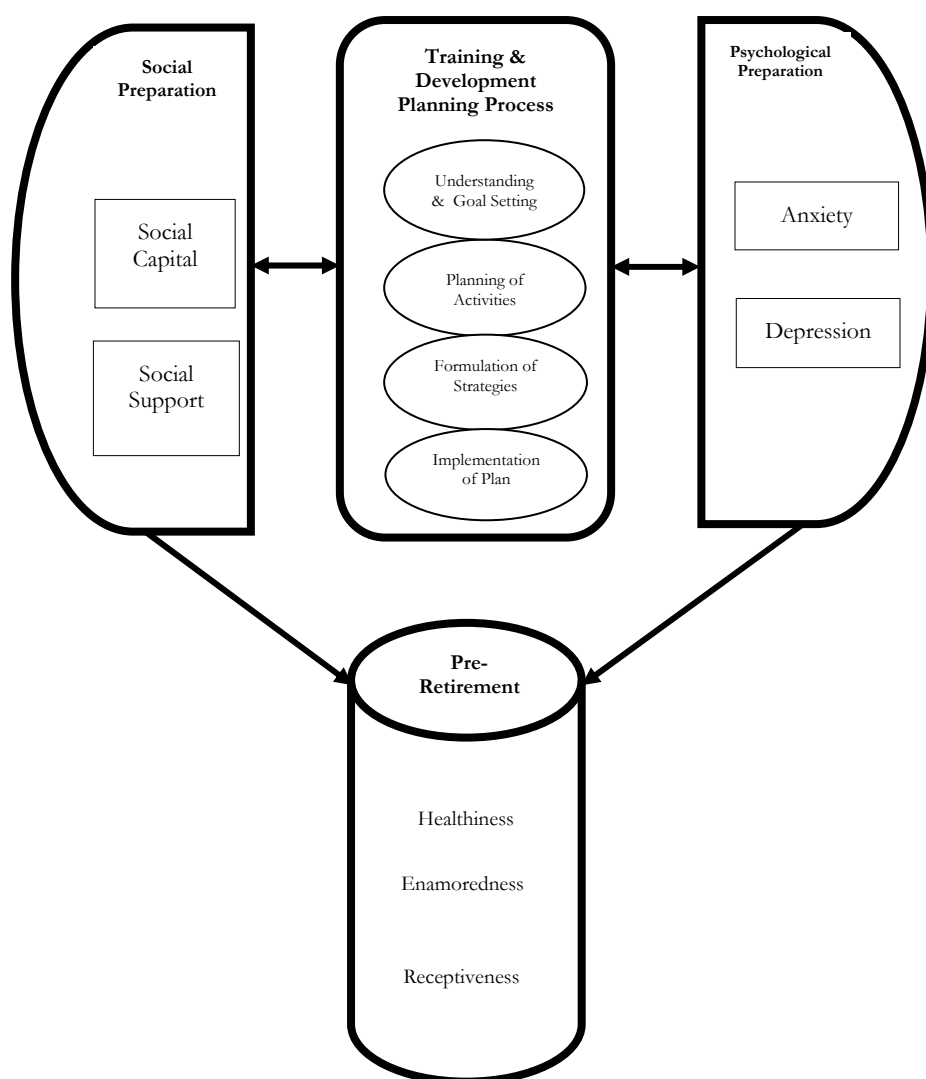


Figure 1: Social and Psychological Pre-retirement Planning and Influence on Pre-Retirement Satisfaction in the Hotel Industry

Social Retirement Preparation

Social retirement preparation looks at the relationship and the links between the individual, other people and the society at large and the benefits derived from the relationship after retirement. This is very crucial because human beings live with others to constitute a community. Therefore, there is some level of interdependency which when absent will create problems for the individual.

Social Capital

Putnam (1993) is credited with being the first to use the term 'social capital'. According to him, social capital refers to the attributes relating to social organization, including networks of individuals or households with the attendant norms and values

which benefit the entire community. Edwards, Frankling and Holland (2003) indicate that social capital concerns the values and the resources people obtain from the relationship and the social ties with others. According to the World Bank (1999), social capital denotes the bonds that fasten institutions together and the relationships and the norms that influence the quality and the quantity of a society's social interactions.

Lin (2001) is of the view that social capital is resources embedded in one's social networks and can be accessed or mobilized through ties in the networks. Embeddedness here refers to the degree and nature of the relationship between community members and public servants for the good of all (Evans, 1992). According to Putnam (1995), social capital is found in relationships as well as individuals' affiliations with communities. According to Woodlcock and Narayan (2000), there are four perspectives of social capital: communitarian, networks, institutional and synergy views. The communitarian view is associated with Putnam. The tenets of the communitarian view is that social capital is manifested in local organizations like civil groups, associations and clubs which promote the welfare of the community. The network perspective looks at both vertical and horizontal relationships among people on one hand and their relationship within and without community organizations like groups and firms on another hand. In this case, there are both positive and negative consequences of social capital. Members in the community can benefit from the relationship such as rescuing people from fire outbreak and giving them financial support. On the contrary, members in a group may sacrifice their loyalty to the group at the detriment of the entire community. For example, members may be brainwashed not to work hard or get involved in any community activities. The institutional view deals with the notion that both community network and local organizations operate or work within the framework of the political, legal and institutional environment. That is, it is the quality of the political, legal and institutional environment that enables the communitarian and the network views to operate efficiently. The synergy view of social capital refers to where both communities (in terms of people, organizations and businesses) and state institutions play complementary roles to ensure mutual benefits.

Woodlock (2001) has also categorized social capital into three: bonding social capital, bridging social capital and linking social capital. Bonding social capital refers to the relationship between people who find themselves in similar situation or environment such as family members, friends and neighbors. Bridging social capital deals with the relationship that exists between people who find themselves in a similar situation or environment but are more distant than those in the bonding capital category. This category includes loose friendships, workmates and short acquaintances. Linking social capital deals with relationship with people who are not in similar situations at all but are outside the communities. Previous studies show that social capital influences happiness (Rodríguez-Pose & von Berlepsch, 2012; Ghamari 2012). In addition, social capital is a predictor of job satisfaction (Requena, 2003).

We therefore hypothesize that:

H1. Social capital increases pre-retirees' satisfaction.

H1a. Social capital increases pre-retirees' healthiness.

H1b. Social capital increases pre-retirees' enamoredness.

H1c. Social capital increases pre-retirees' receptiveness.

Social Support

Barrera, Sandler and Ramsay (1981) view social support as the assistance given to individuals by family members, friends and anybody at all. Social support is a support an individual gets by virtue of the social ties one has with other people, groups and the larger community (Lin, Simeone, Ensel, & Kuo, as cited in Ozbay et al., 2007). To Atchley (2000), social support concerns anyone that can be relied upon to give us emotional support, affirmation, information and assistance when the need arises or in time of crisis. Lim (2003) also indicates that social support can be grouped in the following forms: receiving information needed to solve problems (informational support), receiving concrete, necessary resources such as transportation (tangible support) and finally, receiving affection from others (emotional support). These different and overlapping aspects of social support meet a variety of needs in the life of individuals. Hupcey (1998) indicates that there are factors that are necessary requirements for social support to occur and they include: the act of providing a resource, the recipient having a sense of being cared for or a sense of well-being, the act of having an implied positive outcome, the existence of a relationship between the provider and the recipient, support not given from or to an organization, the community, or a professional, and support that does not have a negative intent or is given grudgingly. Social support may reduce stress, enable an individual to get financial, material and moral help. Previous studies indicate that social support increases happiness (Siedleck, Salthouse, Oishi & Jeswani, 2013; Nima, Archer & Gracia, 2013). Social support also affects job satisfaction (Brough & Pears, 2004).

Based on the above, we propose that:

H2. Social support increases pre-retirees' satisfaction.

H2a. Social support increases pre-retirees' healthiness.

H2b. Social support increases pre-retirees' enamoredness.

H2c. Social support increases pre-retirees' receptiveness.

Psychological Retirement Preparation

Psychological retirement preparation concerns how the individual develops his/her mind to face challenges after retirement. This requires the individual to cope with issues affecting his/her mental faculties and these may include depression, anxiety and emotional imbalance.

Pre-retirement Anxiety

Retirement anxiety by its nature involves fears and worries about the future of the individual as a result of the cessation of active working life. It involves the fear that usually results from change. Anxiety is triggered by a myriad of factors, including challenges in mental health. The prospective retiree is afraid of how illness will affect his life and how to cope with all these give him/her mental and emotional problems. In addition, how their family members and friends will perceive them to be after losing part of their income or a reduction of income and its impact on the family and friends is a great worry to them (Ode, 2005). Kolawole & Mallum (2004) are also of the view that the challenge of managing a new and lower social status is related with anxiety because maintaining a sense of identity and self-worth without a full-time job is, in fact, the single

most difficult challenge that they have to face. This stems from the fact that there are no more subordinates officers to give them instructions. They have to do everything by themselves. This challenge may result in feelings of isolation, loneliness and anxiety for those who cannot manage it. Previous studies show that anxiety is not related to job satisfaction (Ferguson, Frost & Hall, 2012).

In view of this, we hypothesize that:

H3. Anxiety increases pre-retirees' satisfaction.

H3a. Anxiety increases pre-retirees' healthiness.

H3b. Anxiety increases pre-retirees' enamoredness.

H3c. Anxiety increases pre-retirees' receptiveness.

Depression

According to the WHO (2001), depression is a mental disease which is associated with sadness, loss of interest or pleasure, feelings of guilt or low self worth, disturbed sleep or appetite, feelings of tiredness and poor concentration. Dhara and Jogsan (2013) also aver that *depression refers to a heterogeneous set of phenomenon ranging from simple mood swings to severe affective state* (p 1). Leadbetter (2015) indicates that depression can be caused by poverty, bereavement, worsening physical health and social isolation. Bhowmik, Kumar, Srivastava, Paswan and Dutta (2012) indicate that depression is caused by factors such as genetic, environmental, psychological, and biochemical factors. Depression is also manifested in feelings of sadness or unhappiness, irritability or frustration, loss of interest or pleasure in normal activities, fatigue, tiredness and loss of energy, insomnia or excessive sleeping. Therefore, planning for depression is very crucial for prospective retirees. The literature indicates that there is a relationship between depression and happiness (Demirbatir, Helvacı, Yilmaz, Gul, Senol, Bilgel, 2013). In addition, depression is a predictor of job satisfaction (Ferguson, Frost & Hall, 2012).

Based on the above, we hypothesize that:

H4. Depression increases pre-retirees' satisfaction.

H4a. Depression increases pre-retirees' healthiness.

H4b. Depression increases pre-retirees' enamoredness.

H4c. Depression increases pre-retirees' receptiveness.

Methodology

Satisfaction Measurement

Satisfaction is a subjective construct and therefore difficult to measure. There are various ways of measuring retirement satisfaction. Price and Joo (2005) are of the view that retirement satisfaction measures comprise family relationships, leisure and social activities, retirement adjustment, financial security, psychological well-being and health status. Floyd, Hynes, Doll, Winemiller, Lemsky, Burgy, Werle and Heilman (1992) have developed retirement satisfaction inventory. The inventory is in three parts: reasons for retirement, satisfaction with life in retirement and sources of enjoyment. Items constituting sources of enjoyment are reduced stress/responsibility, social activity and freedom and control. For this study, we used healthiness, enamoredness and receptiveness as the pre-retirement satisfaction indicators.

Study Area and Study Design

The study area is the Central Region of Ghana. Cape Coast is the capital of the region. The region is noted for its historical background, especially being the first to make contacts with Europeans and the slave trade. It is the centre of tourist attraction because of its numerous beaches, castles, forts, festivals, shrines and a national park at Kakum. Owing to this, it is the hub of hotels as they do brisk business. The study adopted the quantitative approach because it helps to explain, confirm, prove and or test theory (Leedy & Ormrod, 2010) and requires logical deductions and objectivity (Creswell, 2009). There was no sampling since the whole population was used. This limited the probability of errors occurring, maximised the accuracy of the population estimates and enhanced the generalisation of the results obtained (Osborne & Costello, 2004). Miles and Huberman (1994) are also of the view that sampling is not only concerned with the people (population) being used but also the settings, events and or social processes.

Data Collection and Analysis

There are 252 hotels in the Central Region of Ghana. The population for the study included all employees who were 45 years and above. The entire population of employees who were 45 years and above was chosen from all the 252 hotels in the region. The principal component analysis revealed four dimensions which constituted the independent variables. They were social preparation (social capital and social support) and psychological preparation (anxiety and depression). The dependent variable was satisfaction (healthiness, enamoredness and receptiveness). Healthiness here means being physically and mentally sound; enamoredness means feeling of love/fondness whilst receptiveness refers to willingness to take suggestions, ideas, offers and knowledge. In Ghana, the mandatory retiring age is 60 years. However, those who work in the private sector like hotels can work after this age. Data were collected from the 656 pre-retirees using an interview schedule. The interview schedule was used because all the employees had basic or no education. According to (Babbie, 2001; Neuman, 2006), employing an interview schedule will enable the researcher to get all respondents to answer the questions, clarify all issues that are not clear and above all get detailed information from them. The interview schedule was divided into three parts. The first part concerned the general information about the pre-retirees. The second part dealt with questions about the social and psychological preparation and the last part involved the pre-retirement satisfaction measures. A five-point Likert scale (1= least planning, 2=little planning, 3=good planning, 4=better planning and 5=best planning) was used for the dependent variables. For the independent variables, a five point Likert scale (1=least satisfied, 2=less satisfied, 3=satisfied, 4=more satisfied and 5=most satisfied) was used. Sumbo and Zimmerman (1993) are of the view that a Likert scale makes items or variables to be measurable and also makes coding easier. The hypotheses were tested using the multiple regression analysis.

Presentation of Results

Social and Psychological Preparation Factors

The principal component analysis was run with varimax rotations on the original 35 items comprising 21 social and 14 psychological items. The results showed that a total

of 18 items loaded on four components. The factor loading on the rotated component matrix revealed variables with values greater than 0.5 as shown in Appendix A. Component one had six items ('family members will visit me', 'friends will greet me', 'community will recognize me', 'associate with everybody', 'will have high concentration', and 'will be confident'). These are called social capital. Five items also loaded on component two ('friends will give me information', 'emotional support from community', 'family gives me encouragement', 'friends sympathises with my child' and 'will be decisive'). These are labelled as social support. Four items were found on component three ('will allay my fear', 'free to move and talk' 'will have links' and 'will limit persistent self-doubt'). These are referred to as anxiety. Component four had three components comprising ('will be close to friends', 'will have sound sleep' and 'will be optimistic'). These are called depression. The sampling adequacy test for the variables revealed that the Kaiser-Meyer-Olkin was 0.765 and the Bartlett's test was 0.00. These satisfy the criteria for appropriateness of the principal component analysis. To decide on the number of components to be included in the data, the Eigenvalues test was performed. After eliminating 17 items, four components emerged with Eigenvalues greater than one (1.0) and this explained 63.405 of the total variance. To test for the internal consistency, the Cronbach's alpha analysis was performed and this resulted in a value of 0.707.

Multicollinearity Test

The highest variance inflation factor (VIF) figure in Table 2 is 1.257, demonstrating that there is absence of multicollinearity among the independent variables against the three dependent variables (healthiness, enamoredness and receptiveness).

Table 1. Collinearity Test-Variance Inflation Factor
(Healthiness, Enamoredness & Receptiveness)

Independent Variable	Healthiness		Enamoredness		Receptiveness	
	Tolerance	Variance Inflation Factor (VIF)	Tolerance	Variance Inflation Factor (VIF)	Tolerance	Variance Inflation Factor (VIF)
Social Capital	0.971	1.030	0.796	1.257	0.840	1.190
Soc. Support	0.970	1.031	0.832	1.202	0.979	1.022
Anxiety	0.946	1.057	0.938	1.066	0.969	1.032
Depression	0.969	1.032	0.982	1.019	0.839	1.191

Descriptive Statistics

Table 2 illustrates that women are the dominant group and the majority of the prospective retirees are between the ages of 45-49. In addition, the majority of the prospective retirees have basic or no education whilst the kitchen and the sanitary staff constitute the majority of the employees.

Table 2 - Background Information of Prospective Retirees

Items	Frequency	Percentage
Sex		
Male	275	42
Female	381	58
Age		
45-49	280	42.7
50-54	192	29.3
55-59	124	19.0
60+	60	9.1
Education		
Primary/Junior High	198	30.2
Secondary	156	23.8
Tertiary	100	15.2
Illiterates	202	30.8
Category of employees		
Kitchen	223	40.0
Sanitary	200	30.5
Support	122	18.5
Clerical	111	17.0

Quantitative Analysis

Table 3 indicates the multiple regression results with healthiness as the dependent variable.

Hypotheses H1a, H2a, H3a and H4a which indicate that social capital increases pre-retirees' healthiness ($\beta=0.055$; $p<0.05$), social support increases pre-retirees' healthiness ($\beta=0.289$; $p<0.05$), anxiety increases pre-retirees' healthiness ($\beta=0.585$; $p<0.05$) and depression increases pre-retirees' healthiness ($\beta=0.140$; $p<0.05$) respectively significantly increase healthiness. Therefore, hypotheses H1a, H2a, H3a and H4a are supported. The strongest predictor of healthiness is anxiety, followed by depression.

Table 3 Healthiness

Variables	Std Error	Std Coefficient	T	P-Value
		Beta		
Social Capital	.045	.055	2.026	.043
Social Support	.050	.289	10.706	.000
Anxiety	.038	.585	21.431	.000
Depression	.041	.140	5.193	.000

$P<0.05$

R Square 0.509

Adjusted R Square 0.507

Table 4 demonstrates the multiple regression results with enamoredness as the dependent variable. Hypotheses H1b, H2b, H3b and H4b which state that social capital increases pre-retirees' enamoredness ($\beta=0.188$; $p<0.05$), social support increases pre-retirees' enamoredness ($\beta=0.355$; $p<0.05$), anxiety increases pre-retirees' enamoredness ($\beta=0.277$; $p<0.05$) and depression increases enamoredness ($\beta=0.223$; $p<0.05$) respectively significantly increase enamoredness. Therefore H1b, H2b, H3b and H4b are

supported. The independent variable that has the strongest influence on enamoredness is social support, followed by anxiety and depression.

Table 4 Enamoredness

Variables	Std Error	Std Coefficient Beta	T	P-Value
Social Capital	.037	.188	6.213	.000
Social Support	.041	.355	11.147	.000
Anxiety	.031	.277	8.583	.000
Depression	.033	.223	7.011	.000

P<0.05

R Square 0.317

Adjusted R Square 0.313

Table 5 illustrates the multiple regression results with receptiveness as the dependent variable. Hypotheses H1c, H2c, H3c and H4c which state that social capital increases pre-retirees' receptiveness ($\beta=0.315$; $p<0.05$), social support increases pre-retirees' receptiveness ($\beta=0.236$; $p<0.05$), anxiety increases pre-retirees' receptiveness ($\beta=0.095$; $p<0.05$) and depression increases receptiveness ($\beta=0.099$; $p<0.05$) respectively significantly increase receptiveness. Therefore, hypotheses H1c, H2c, H3c and H4c are supported. The strongest predictor of receptiveness is social capital, followed by social support.

Table 5 Receptiveness

Variables	Std Error	Std Coefficient Beta	T	P-Value
Social Capital	.061	.315	9.065	.000
Social Support	.068	.236	6.772	.000
Anxiety	.051	.095	2.707	.007
Depression	.055	.099	2.852	.004

P<0.05

R Square 0.183

Adjusted R Square 0.178

Table 6 shows the multiple regression results with satisfaction (composite of healthiness, enamoredness and receptiveness) as the dependent variable. Hypotheses H1, H2, H3 and H4 which state that social capital increases pre-retirees' satisfaction ($\beta=0.383$; $p<0.05$), social support increases pre-retirees' satisfaction ($\beta=0.453$; $p<0.05$), anxiety increases pre-retirees' satisfaction ($\beta=0.312$; $p<0.05$) and depression increases pre-retirees' satisfaction ($\beta=0.103$; $p<0.05$) respectively significantly increase pre-retirees' satisfaction. Hypotheses H1, H2, H3 and H4 are supported. Social support is the strongest predictor of pre-retirees' satisfaction, followed by social capital and anxiety.

Table 6. Satisfaction (Composite Healthiness, Enamoredness & Receptiveness)

Variables	Std Error	Std Coefficient	T	P-Value
		Beta		
Social Capital	.070	.383	13.366	.000
Social Support	.064	.453	14.846	.000
Anxiety	.059	.312	10.830	.000
Depression	.068	.103	3.337	.001
P<0.05				
R Square 0.443				
Adjusted R Square 0.439				

Discussion and Implication

Retirement is an area that has received much attention in the human resource literature. Prior empirical studies stressed financial, psycho-social and demographic factors. These studies looked at how pre-retirement preparation influences post-retirement satisfaction. Studies on the relationship between pre-retirement preparation and pre-retirement satisfaction are silent in the literature. To close this lacuna, this study examined how pre-retirement preparation affected pre-retirement satisfaction in the hotel industry. Based on this objective, we proposed that pre-retirement social and psychological preparation influenced pre-retirement satisfaction. The results supported this proposition.

Previous studies indicate that social factors (social capital and social support) influence happiness (Redriguez-Pose et al., 2012; Ghamari, 2012; Siedleck et al., 2013; Nima et al., 2013). Studies on psychological factors (anxiety and depression), however, show that only depression is a predictor of happiness (Demirbatir et al., 2013). The results of this study prove otherwise. Our results indicate that both social factors (social capital and social support) and psychological factors (anxiety and depression) are predictors of healthiness, enamoredness and receptiveness. The results suggest that both social and psychological factors are important factors that make prospective retirees satisfied in the hotel industry when planning their retirement.

The extant literature also demonstrates that social factors (social capital and social support) relate to job satisfaction (Requena, 2003; Brough & Pears, 2004). Regarding psychological factors, depression relates to job satisfactions (Ferguson et al., 2012) whilst anxiety does not (Ferguson et al., 2012). Our results do not corroborate these results. Our results (H1, H2, H3 and H4) show that both social factors (social capital and social support) and psychological factors (anxiety and depression) influence satisfaction. This suggests that prospective retirees in the hotel industry are satisfied with their social and psychological preparations. Overall, the results illustrate that social support has the strongest influence on satisfaction. The results also indicate that anxiety, social support and social capital emerged as the strongest predictors of healthiness, enamoredness and receptiveness respectively. Both the composite and the individual results also suggest that prospective retirees are more satisfied with their social preparation than their psychological preparation.

The study also has implication for managers. Since both social factors (social capital and social support) and psychological factors (anxiety and depression) significantly influence satisfaction (healthiness, enamoredness and receptiveness), managers should regard them as very important and be included in their retirement preparation training

programs. Since anxiety emerged as the independent variable that has the strongest influence on healthiness, particular emphasis should be placed on how prospective retirees can move freely and talk to anyone in their communities, how the managers can help the retirees to dissolve doubts about themselves and how they can help them to allay their fears of going on retirement. Managers should also take cognizance of the fact that though links with people and the community as a whole is a factor of social preparation, specifically social capital, prospective retirees in the hotel industry see it as a factor of anxiety and think they can be healthier if they collaborate with people in their communities.

In addition, social support emerged as the strongest predictor of enamoredness. Managers should, therefore, include this in their retirement preparation programs by urging prospective retirees to try to get information from friends, receive emotional support from their communities, receive encouragement from their families and rely on friends to assist their children when and where necessary so that they will feel that their communities love them. Though 'the need to be decisive' is a feature of depression, prospective retirees in the hotel industry consider it as an indicator of social support. They think they can obtain social support if they are firm in their decisions. This will enable them to win the trust of their communities and eventually being loved. Social capital also had the strongest influence on receptiveness. Consequently, managers should stress that in their pre-retirement planning training programs by bringing to the attention of the prospective retirees the need for them to strive to gain recognition from their communities by associating themselves with the people in their communities. This will also 'compel' their families to pay them regular visits. Managers should also be mindful of the fact that having high concentration and being confident are psychological factors (depression and anxiety respectively) but prospective retirees in the hotel industry consider them to be part of social capital preparation. They think they will be receptive if they have high concentration and will be confident in themselves.

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Appendix A

Factor Loading (Rotated Component Matrix)				
Indicators	Components			
	1	2	3	4
Family will visit me	.978			
Friends will greet me	.645			
Community will recognize me	.753			
Associate with everybody	.926			
Will have high concentration	.792			
Will be confident	.555			
Friends give me information		.637		
Emotional support from community		.522		
Family gives me encouragement		.849		
Friends sympathize with my child		.656		
Will be decisive		.717		
Will allay my fears			.753	
Free to move about and talk			.670	
Will have links			.778	
Will limit persistent self-doubt			.818	
Will be close to friends				.609
Will have sound sleep				.741
Will be optimistic				.589

JAPAN AND THE CHALLENGES OF A NEW GLOBAL REALITY

Florin BONCIU*

Abstract:

The research starts from the perception that once humankind has entered the new millennium and particularly in the post 2008 crisis period globalization changed its main characteristic from an integrating process to a global reality. This reality reflects a renewed role for states, a return to real politick and geopolitics and also a return to hard power instruments. The new global reality is the result of many factors of influence that include demographical aspects, climate change, the fourth industrial revolution and a new global and regional balance of power. This new global framework raises challenges to all countries of the world economy but this paper focuses on the implications on Japan as well as on the present and future responses Japan envisages for securing its competitiveness. The conclusion stresses that despite its huge economic, human and technological potential Japan may face a difficult task in reinventing itself as a global player in the world economy that will evolve from 2020 to 2050.

Key words: Globalization, globality, new characteristics of globalization, Japan economic prospects

JEL classification: F01, F60, F 63, O1.

Globalization as a process and as a reality

The concept of globalization as an all encompassing framework for human interactions (economic, political, cultural) is related mostly to the post World War II period. As a word, “globalization” (with the meaning of a process of expanding activities and interactions in order to reach a global scale) entered the English language in 1959 and was included in dictionaries in 1961⁴. Initially it had a mixed content (cultural and economic) and we may consider that the epitome of that first period was represented by the “global village” concept of Marshall McLuhan⁵. The global village represented a globalized world but the accent was on the awareness of the people about various news and events at a global level. The marvelous thing was that technology made this global awareness possible due to radio and television networks.

* Florin Bonciu is Professor of World Economy at the Romanian American University in Bucharest. E-mail: fbonciu@gmail.com

⁴ Jan Aart Scholte, Defining Globalization, CLM Economia, No. 10, 2007, p. 16

⁵ Marshall McLuhan, The Gutenberg Galaxy: The Making of Typographic Man, University of Toronto Press, Canada, 1962, p. 31

Later on, in the 1980s, Theodore Levitt changed the accent towards the economic activities when he spoke about the globalization of markets⁶ as an ever increasing interaction on a global scale between all sorts of economic actors (both states and multinational corporations). The interaction consisted initially in trade flows more and more substantial and more and more linking all parts of the globe. Starting with the 1980s foreign direct investment flows became permanent companions to the trade flows and gave a new meaning to the economic interaction. Economic integration was also a corollary of these more intense trade and investment flows and therefore free trade agreements and customs unions (as well as even more ambitious integration processes like those to be found in Western Europe – European Economic Community and, to a lesser extent, European Free Trade Agreement) assisted in the creation of an ever more integrated world economy.

The 1990s and early 2000s came with the Internet revolution and the “global village” got an entirely new dimension: from the passive listener of the McLuhan era that was just being informed about what happened in the world via radio and television the world moved to an active participant (connected to the Internet) that was selecting his/her information inputs and even responding to them (either by comments and/votes or by buying or selling goods or services).

In the economic area trade flows and foreign direct investment flows got a new companion, the global value added chains⁷ while, at the personal level, social networks created true global communities with billions of participants (Facebook registered 1.71 billion monthly active users in second quarter 2016⁸). The common characteristic of global value added chains and a social network is their flexibility and dynamism that implied a permanent adaptation and reconfiguration.

All these aspects related to both economic/professional and personal life gave a new meaning to globalization, which moved from being an integrated process to becoming a fact of life for a large majority of people.

Being a fact of life globalization became a part of reality and hence the new very illustrative concept of *globality* = global reality⁹ was invented in order to describe the new environment. The period after 2000 has been characterized not only by a more integrated world economy (from both economic and informational points of view) but also by a much more significant participation of the developing countries in this integrated world economy¹⁰. One important distinction is necessary here: while after the World War II and earlier when one spoke about developed or developing countries the

⁶ Theodore Levitt, *The Globalization of Markets*, Harvard Business Review, May 1983

⁷ Richard Baldwin, *Global supply chains: why they emerged, why they matter, and where they are going*, p. 13, in volume *Global Value Chains in a Changing World*, Deborah K. Elms, Patrick Low (editors), World Trade Organization, Fung Global Institute, Temasek Foundation Center for Trade & Negotiations, 2013

⁸ Statista – The Statistical Portal, at page <http://www.statista.com/statistics/264810/number-of-monthly-active-facebook-users-worldwide/>

⁹ Daniel Yergin, *The Age of Globality*, Newsweek, May 18, 1998 at page <https://web.archive.org/web/20090323082216/http://www.newsweek.com:80/id/92486?tid=relatedcl>

¹⁰ Hall Sirkin et al, *Globality: Competing with Everyone from Everywhere for Everything*, Business Plus, 2008

implicit reference was to entities (companies) being established and functioning to a very large extent if not entirely in the respective countries. In the 1980s and after that when one speaks about developed or developing countries the reference is to companies or other entities being registered/incorporated in those countries, irrespective of the ownership of capital.

Therefore, in this new, globalized context, characterized by foreign direct investments and global value added chains, the higher participation of developing countries (as share in Global World Product) means that companies/entities registered in those countries generate a larger part of world output, even if a significant proportion of them can be affiliates of multinational corporations. What is even more interesting is that after 2000 a growing number of affiliates in developed countries originate from developing countries (from China or India, but also other countries), increasing the loss of clear distinction between what developed or developing countries mean (from the point of view of economic output).

This new global reality has been the result of many factors of influence that include:

- Changes in the global balance of power;
- Advances in communication, transport and technology in general;
- demographical aspects;
- climate change;
- the fourth industrial revolution;
- and a new global and regional balance of power.

In order to avoid a confusion regarding the two terms *“globalization”* and *“globality”* we can say that globalization is an ongoing process by which all sorts of interactions among all sorts of actors from all over the world are more and more intense, frequent and complex while the very result of the process is the fact that this *interaction* (with an all encompassing meaning) determines a new reality (named *globality*), characterized by a permanent and substantial influence among actors (states, international organizations, companies, other entities, individuals) from the global economy.

The new characteristics of globalization

In view of the post 2008 period and taking into account the evolution of the main players in the world economy we can say that this new global reality reflects a renewed role for the states, a return to real politick and geopolitics and also a return to hard power instruments. Various conflict situations, changes in the balance of power, massive migration flows in Europe, terrorism, all these indicate a return (as a sense but not in a mechanical way) to the concepts of spheres of influence and active play on the global chessboard in the sense used almost 20 years ago by Zbigniew Brzezinski¹¹.

At the same time, the new characteristics of globalization brought about the manifestation of non-state actors as diverse as multinational corporations (some of them as big or bigger in economic terms than many states) on the one hand or religious based

¹¹ Zbigniew Brzezinski, *The Grand Chessboard: American Primacy And Its Geostrategic Imperatives*, Basic Books, 1998

organizations and movements, on the other hand, each of them acting in very different ways but at the same time competing with states and international organizations for decisions and strategies in the short or long term.

The world economy of today is more diverse but also more complex than 20 – 30 years ago because there are more actors playing significant roles but also because the rules of the game are more complex, changing and very often not observed.

As an example we can mention here the gradual and partial replacement of multilateralism in trade regulations with bilateralism and plurilateralism. This fact can be viewed not necessarily as a failure of Doha negotiations round and therefore of the World Trade Organization but rather as a proof that the world economy is so much more diverse today that finding common positions involving all actors becomes objectively impossible.

The increased diversity, complexity and interconnectivity are to be found not only at the level of the whole world economy but also at the regional level. European Union with its structural and conceptual issues is a proof that even at the level of the European continent the member states and regions are confronted with different realities and problems and therefore cannot efficiently and effectively apply the same rules and solutions.

Among them we can mention:

– The decoupling of financial trading sector from the real economy that was mentioned even from the late 1980s has reached new, unprecedented dimensions that make the world economy unstable in an intrinsic way. In 2007, just before the starting of the economic crisis, the Gross World Product in PPP terms was of 69.3 trillion US\$ while the total annual financial trading excluding bonds and other over-the-counter transactions was of about 900 trillion US\$¹². Despite the consequences of the economic crisis, data for 2015 indicate still an important difference. In 2015 the value of the Gross World Product in PPP terms was of about 111.02 trillion US\$ while the over-the-counter derivatives market plus interest rate derivatives and foreign exchange derivatives (which is an incomplete figure for derivatives market) was of about 640 trillion US\$¹³. Anyway, if all types of derivatives are taken into account the total market value reaches the unimaginable figure of 1.5 quadrillion which is about 14 times bigger than Gross World Product¹⁴. While it is true that there is a big difference between the notional value and the actual market value of derivatives¹⁵, the very fact that such figures are traded gives an image on the virtual or surreal economy;

– Inequality has become a significant issue not between countries but within countries, particularly the developed ones. The Oxfam Report of January 2016 indicated that in 2015 just 62 people had the same wealth as 3.6 billion people representing the poorer half of the world population. What was even more spectacular was the fact that in 2010 there were 388 people having as much wealth as the poorer half of the world

¹² Andrew Sheng, Global imbalances demand global fiscal system, 28 October, 2009, East Asia Forum at page <http://www.eastasiaforum.org/2009/10/28/global-imbalances-demand-global-fiscal-system/>

¹³ Bank for International Settlements, OTC derivatives statistics at end-June 2015, November 2015

¹⁴ Stephen Lendman, Global Derivatives: \$1.5 Quadrillion Time Bomb, Global Research, August 24, 2015

¹⁵ J.B.Maverick, How big is the derivatives market?, Investopedia, May 27, 2015, at page <http://www.investopedia.com/ask/answers/052715/how-big-derivatives-market.asp>

population¹⁶. This kind of inequality sooner or later would be translated into the political arena and it may pave the way to more radical views and policies;

– The crisis of the linear growth model and the search for a new paradigm (among which we can mention concepts like the circular economy or that of progress without growth). The main objective cause for the crisis of the linear growth model is represented by the fact that the resources of planet Earth are simply not enough for a continuation of the growth in their consumption. The acute character of the problem is represented by the fast decline of the so called Earth Overshoot Day (that is the day in the respective year when the consumption of resources and pollution overpasses the Earth capacity to regenerate and absorb the pollutants. In 2014 the Earth Overshoot Day was on August 19, in 2015 on August 13 and in 2016 was on August 8. Another way to express this reality is to say that at the level of consumption of resources and pollution for 2016 we need in one year the resources and absorption capacity of 1.6 Earths in order to have a balanced situation (meaning that all consumed resources are regenerated and all pollutants are absorbed and neutralized)¹⁷.

This new reality marks the beginning of a transition to a new world order that has to reflect and offer solutions to the new realities that include: a) a new balance of power at a regional and global level; b) large areas of significant instability (such as the Middle East); c) the need to rethink the European Union project; d) technological changes that can be compared to the first industrial revolution; e) last but not least the demographical and climate changes.

In different degrees all countries of the world are affected by these new realities and they have to participate in finding a new equilibrium. Ideally, this new equilibrium should be found by consultation and cooperation. As the global economy of today is far from being an ideal place the second best could be to have as little conflict as possible during this quest for a new international economic order.

In order to participate in an efficient and effective manner all states should observe certain check points that may prove valuable both for protecting their interests and for being able to negotiate with each other in a productive way.

Such check points may include the following:

- To understand the new global reality and its uneven dynamics;
- To design an adequate response that is both probabilistic (that means involving risks) and adequate to the intrinsic characteristics of the country designing it;
- To accept diversity both within the country and in the international arena as a driving force of progress and success.

In the following we are going to analyze how Japan can define its place within this new global reality towards the 2030 – 2050 time horizons.

¹⁶ Oxfam Briefing Paper – An Economy for the 1%, 18 January, 2016, p.2

¹⁷ Global Footprint Network, Earth Overshoot Day 2016, at page http://www.footprintnetwork.org/en/index.php/GFN/page/earth_overshoot_day/

Japan's challenges and possible responses to the new global reality

After the World War II Japan succeeded not only to recover after the destruction of the war that in its case included the impact of two nuclear bombs but also to become the 2nd economic power of the world economy, position that was maintained for 42 years (between 1968 and 2010 when China obtained the 2nd position)¹⁸.

Nowadays Japan, together with China, India, South Korea, ASEAN countries and others, is part of the Asia – Pacific area that represent the economic center of weight in the global economy and also the most dynamic part of it. At the same time, Asia – Pacific region is home for 4.41 billion people (about 60 % of world population)¹⁹. It is estimated that this share and importance of Asia – Pacific in the global economy will characterize the remainder of the 21st century, which is why this century was also named “the Pacific Century”²⁰.

From the point of view of economic geography Japan is located in a dynamic area, a fact which raises both challenges and opportunities. The main challenge is the geographical proximity to the 2nd world economic power, China, that also acts more and more as a world power (with all the connotations of this status). The opportunities are given by the large masses of consumers, many of them becoming until 2030 members of the “middle class” and therefore more inclined to buy the high technology – high price Japanese products. Anyway, the position of Japan in the Asia – Pacific and in the global economy is not without challenges and threats as its post World War II has not been linear and ever increasing.

Due to its high economic growth and high rate of innovation the Japanese economy was regarded as a miracle from 1945 until the late 1980s, while starting with the 1990s it passed through a Lost Decade and then a state of almost permanent recession (or a very low economic growth). This passage from economic miracle to stagnation and recession has a multitude of causes but it is clear that they are linked in one way or another with the changes determined by globalization and the way Japan reacted to them.

The big challenge for the Japanese economy in the past 20 years is related to designing a strategy for the next time horizons (2030 – 2050) that will allow a more competitive position in the new reality of the global economy, while, at the same time, taking into account the century old characteristics of the Japanese culture and society.

Due to its history characterized by 250 years of isolation²¹, followed by two dramatic changes (the opening to the world and modernization during the Meiji era²² and the reconstruction after World War II with significant US influence²³) the Japanese

¹⁸ Andrew Monahan, China Overtakes Japan as World's No. 2 Economy, February 14, 2011, The Wall Street Journal

¹⁹ Asia-Pacific Population Journal, Volume 30, No. 2, December 2015

²⁰ Mark Borthwick, The Pacific Century: The Emergence of Modern Pacific Asia, Westview Press, 2013

²¹ Spencer Stuart, The Challenge of Globalization: How Will Japanese Multinational Corporations Advance Their Organizational Cultures?, August 2012.

²² Encyclopaedia Britannica, Meiji Restoration – Japanese History, at page <https://www.britannica.com/event/Meiji-Restoration>

²³ Steve Jones, The United States and Japan After World War II - From Enemies To Allies, at page <http://usforeignpolicy.about.com/od/asia/a/The-United-States-And-Japan-After-World-War-Ii.htm>

perception and reaction to the globalized reality represents a balance between the official policy of **Kaikoku** (open-door policy) and the long-standing reality of **Saikoku** (secluded/isolated nation)²⁴. Another balance, characteristic to Japan, is that between the state and the private companies, particularly the very large ones. Different from other states and cultures in Japan the two parts (the state and the private companies) cooperate in most cases in a synergy aiming for the long term goals.

In this context, the fact that at we witness a return to an increased role of states in the new global reality may favor Japan based on its post World War II experience. Anyway, the challenge for both the Japanese state and Japanese private companies maybe that they have a very profound understanding of the Japanese economy and society but not so profound for the foreign / global environments²⁵.

At the same time, in its attempt to adapt to the new realities, Japan and Japanese companies may encounter difficulties in the global economy particularly because:

- Japan has very well defined models in business, education and representation of the world;
- those models have been successful for long time periods.

In the new global reality Japan can no longer rely primarily on exports and also cannot rely only on replicating abroad approaches used in the home market (in areas as diverse as marketing, management and human resources²⁶).

In order to answer to these challenges, while at the same time capitalizing on its previous experience, Japan has attempted to adapt to the new global reality by focusing on science and technology as well as by supporting large scale innovation. In this attempt Japan has certain advantages that have to be used in an efficient way. Among them there are:

- The advantage of global public awareness for brands like Sony, Matsushita, Toshiba for consumer goods;
- Car brands like Toyota and Lexus, Mazda, Nissan, Mitsubishi, Subaru, Suzuki or watch brands like Seiko, Casio, Citizen.
- The impact on younger generations of computer games and devices like Pokemon Go, PlayStation (Sony) or Wii (Nintendo) as well as cartoons (manga) or animation (anime) series;
- Japanese foods like sushi;

In the context of the so-called 4th industrial revolution Japan has also an important advantage because it is among the most advanced countries in the field of robots and robotics. Some aspects are significant:

²⁴ Carin Holroyd, Ken Coates (editors), Japan in the Age of Globalization, Routledge Contemporary Japan Series, 2011, p.3

²⁵ Leo Lewis, Shunsuke Tabeta, Japan business leaders urge real globalisation, Financial Times, January 11, 2016

²⁶ Naoyuki Iwatani, Gordon Orr, Brian Salsberg, Japan's Globalization Imperative, McKinsey Quarterly, June 2011

- In 2015 Japan had 314 robot units per 10000 employees (second place after South Korea with 478)²⁷;
- Japan is very advanced in the design robots for older persons as a solution to the aging of population;
- Japan has experience in the use of robots for rescue missions such as the Fukushima nuclear power plant.

The experience with robots and robotics may prove to be a competitive advantage for Japan in the coming period when the ability to design and use robots and artificial intelligence may make the difference between winner and losers in the global competition.

Other advantages for Japan in the new global reality may be represented by its very high level of mobile internet and e-commerce that make a large part of the population already prepared for the new types of economic interactions.

At the same time, in the context of the climate changes Japan can share to other countries, first of all in the Asia – Pacific region, its expertise in environment protection and recycling of resources..

Conclusions

Despite its huge economic, human and technological potential Japan may face a difficult task in reinventing itself as a global player in the world economy that will evolve from 2020 to 2050. The difficulty may arise from the uniqueness of the Japanese culture and society that has been rather introverted for a very long time. This situation may determine difficulties in the adaptation to other cultures and values but also to a rather unstable international environment, characterized by many changes and instability.

While Japan is fully aware of the need to adapt to the new reality, the main issue is represented by the speed of adaptation, not by the possibility to adapt. The current adaptation to a new global reality may be considered the 3rd for Japan after 1853 (Meiji period) and 1945 (post World War II 1945) eras. The fact that Japan was successful in both occasions may give reasonable optimism for the future. In this adaptation process the very high ethnical homogeneity of Japanese people can be an important asset because once a strategy for the future is adopted it is easier to be implemented by people with the same culture and values.

Japan is nowadays both more open to expanding abroad and more open to allow foreign investors operate in Japan, even if the two processes are not equal. The success of adaptation will come for Japan at the cost of giving up old values and traditions.

The Japanese response to the new global reality include aspects like:

- Changing the business model;
- Replacing the meaning of “global market” from the market of developed countries to include developing countries all around the globe;
- Replacing the concept of national defense to that of global security;
- Accepting diversity as an intrinsic characteristic of globalization.

²⁷ IFR Press Release, Survey: 1.3 million industrial robots to enter service by 2018, 25 February, 2016

In our view, in order to succeed in adapting to the new global reality Japan has to:

- Get rid of the mentality of dependence on foreign sources of raw materials and energy;
- Accept the partial renunciation of some components of sovereignty as the new global reality means more interaction and interdependence;
- The new growth paradigm will have to accommodate low growth rates and population aging.

All these changes are possible and many of them are already underway. Chances are that Japan will be able to compete in the new global reality being innovative but also preserving its culture, values and traditions.

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TOWARDS AN INTEGRATED LOGISTICS CAPABILITIES MODEL OF SUPPLY CHAIN FLEXIBILITY: A SOCIAL EXCHANGE PERSPECTIVE

Santanu MANDAL*

Abstract:

Supply chain flexibility is a dominant capability in that it ensures sustenance of supply chain operations even in the face of growing uncertainties. However, the development of supply chain flexibility requires integration of logistics capabilities. As supply chains are network of inter-connected firms; the importance of relational attributes also cannot be undermined. The current study investigates the influence of various socio-exchange attributes viz. trust, commitment, power and reciprocity in the integration of logistics capabilities and consequently its impact on supply chain flexibility and supply chain performance. The collected data from 168 senior supply chain professionals using a cross-sectional survey was analyzed using Partial Least Squares. The analyzed data suggested trust, commitment, power and reciprocity to have a positive influence on integration of logistics capabilities. Further, integrated logistics capabilities were found to have a positive impact on supply chain flexibility which in turn exerts a positive influence on supply chain performance.

Keywords: supply chain flexibility, firm performance, social exchange theory, trust, commitment, integrated logistics capabilities.

JEL Classification: L10, M10.

1. Introduction

Increasing disruptions in recent times have led firms to devise on strategies that can enable them to have sufficient buffer in their planning and forecasting. This will enable the firms to respond better to environmental uncertainties (Wagner and Bode, 2008) and accordingly they can fight back disruptions effectively (Gligor et al., 2013). Strategically, this is as an essential supply chain capability termed as supply chain flexibility.

Recent supply chains disruptions are therefore are compelling factors for firms to devise risk mitigating capabilities. A supply chain disruption is an unexpected situation that can result in a negative outcome for a firm and its supply chain performance. Recent firms are facing an increase in the number of supply chain disruptions (Wagner and Bode, 2008; Gligor and Holcomb, 2012). This backdrop has compelled firms to devise adequate buffer in their routine to strategic operations so as to provide a proactive

*Santanu Mandal is Assistant Professor, PhD, Department of Operations & IT IBS, Hyderabad, IFHE University, India.

performance during disruptions. Supply chain flexibility accordingly was defined as the capability of supply chains to devise alternate configurations of operations (Skipper and Hanna, 2009). The current investigation takes a risk management perspective on supply chain flexibility and defined supply chain flexibility as the capability of supply chains to sustain and provide an optimal level of performance through quickly migrating to an alternate configuration. Extant literatures have investigated multi-facets of supply chain flexibility. For e.g. Yu (2013) conceptually explored the influence of several internal factors (e.g. knowledge and information systems, operations and control systems etc) and external factors (e.g.environmental uncertainties, relationship structure etc) on supply chain flexibility development and in turn, its effect on enterprise performance and supply chain performance. Jin et al. (2014) empirically established that IT-enabled sharing capability positively influences supply chain flexibility in a manufacturer's supply chain, which in turn affects the firm's competitive performance. Hence a firm should focus on flexibilities in the supply chain to improve its performance. IT-enabled sharing capability is an antecedent for improving these flexibilities. Using a sample of German manufacturing firms, Merschman and Thoneman (2011) established that in uncertain environments companies with highly flexible supply chains perform better than companies with less flexible supply chains while in certain environments the reverse holds good. However, a social exchange perspective was not adopted for exploring the development of supply chain flexibility and its influence on supply chain performance. A social exchange perspective is all the more important as supply chains are network of firms engaged in exchange relationships. Accordingly, the current investigation aims to fulfil this gap in the existing literature. The current study therefore answers the following questions:

- (1) What are the antecedents of integrated logistics capabilities and supply chain flexibility from a social exchange perspective?
- (2) What is the impact of integrated logistics capabilities on supply chain flexibility?
- (3) What is the impact of supply chain flexibility on supply chain performance?

The paper has been organized as follows. The next section draws on the theoretical tenets of social exchange perspective and formulates the research model. The corresponding section discusses relevant literature on logistics capabilities followed by review of literature on supply chain flexibility. Subsequent sections discuss hypotheses development and proceeds with data collection and empirical testing of the proposed model. Finally the study concludes with a discussion of managerial implications, limitations of the framework and scope for future research.

2. Theoretical foundation

2.1. Social Exchange Theory and Supply Chain Management

Social exchange theory originated from anthropology (Firth, 1951), sociology (Homans, 1958, 1961; Gouldner, 1960; Blau, 1964; Emerson, 1976), social psychology (Thibaut and Walker, 1978), behavioral psychology (Bandura, 1986), philosophy (Rawls, 1971) and economics (Ricardo, 1817). It argued that individuals interact with each other with hope for a reward in return (Emerson, 1976). Bandura(1986) underscored that expectation of a reward or punishment avoidance as the chief reason of interacting with

social beings as an individual or in groups. Further, the motivation for interaction resides on the rewards of the interaction minus cost of that interaction (Kale and Singh, 2009). When the other member in exchange does not receive the expected reward, the exchange member will intentionally avoid the action in future (Homans, 1961). There exist a set of basic principles of psychological and economic reinforcement that governs the way people interact with each other either as an individual or as a group. This includes a set of behaviors including trust, commitment, reciprocity, justice, relative dependence and power (Brock and Kim, 2002).

Studies have been using social exchange theory for examining supply chain relationships (Kwon & Suh, 2005; Wei et al., 2012; Wu et al., 2014). They underscored that reciprocal benefits offered by partners in a social exchange as the dominant reason for development of social relationship between supply chain partners. Griffith et al. (2006) argued utilized social exchange theory for investigating the consequences of procedural and distributive justice in supply chain relationships. They underscored that the more powerful partners in a supply chain build social credit of indebtedness that ensures other members to comply in the relationships. The attitudes and behaviors governing relational capital of supply chain members are therefore developed through perceived justice shown by the more powerful members. Griffith et al. (2006) underscored therefore the importance of two important components of social exchange theory in context of supply chain relationships viz. power and justice.

In an identical context, Narasimhan et al. (2009) utilized social exchange theory for understanding supply chain relationships between a buyer and a supplier under a lock-in situation through a case study of a multinational business example of a Danish business group. They used a game –theoretic model for examining the developed conjectures related to lock-in behaviors. The findings indicated that for a supplier the optimal strategy in context of pricing will be to lower the price with increasing demand. For a buyer, the investment intensity however decreases with increasing demand. From this theoretical backdrop, emerge two strong issues for this research: power and justice.

Yang et al. (2008) utilized social exchange theory for exploring the antecedents of relational stability in supply chain alliance and if the same affects alliance performance in manufacturing supply chains. They concluded that buyer and suppliers in a supply chain alliance develops respect for each other through relational commitment and also develops the common goal of competing with rivals. The authors further underscored that trust in this context will create a better environment for sustaining supply chain relationships, increasing reliability of contracts, reducing risks and uncertainty and providing incentive for cooperation. Hence, trust and commitment are important factors for maintaining relational stability in supply chain alliances. Further, Sambasivan et al. (2013) tried to integrate several theories e.g. resource dependence theory, resource based view, knowledge based view, contingency theory, game theory, transaction cost theory, social exchange theory and personal relationship theory in the context of developing strategic alliances in supply chain. They also underscored the importance of trust and commitment under social exchange theory for developing the component of relational governance in their proposed framework. Kwon & Suh (2005) investigated the chief factors for supply chain relationships and argued that commitment is a crucial

factor for the same. Further, they found trust as the root cause of fostering such commitment in supply chain relationships. Hallen et al. (1991) explored inter-firm adaptation process for developing inter-firm relationships under social exchange theory and found two critical factors for explaining such adaptation process: trust and power. While trust was found to be developed between the entities over time as each of them prove worthy to each other; power indicated the degree of relative dependence between parties in an exchange. They concluded that power is developed when a firm owns certain resources and controls the distribution of the same in making it accessible to others in need.

As developing integrated logistics capabilities argues for synchronizing operations of each partner firm; a social exchange perspective on integrated logistics capabilities is required. Thus, in view of the above discussion we explore several issues like trust, commitment, reciprocity, justice, power and relative dependence under social exchange theory in their impact on integrated logistics capabilities and developing supply chain agility. However, reciprocity and justice, power and relative dependence are both defined identically (Griffith et al., 2006; Narasimhan et al., 2009). Hence four key constructs can be identified: trust, commitment, reciprocity and power. In this study therefore, we explore the influence of trust, commitment, reciprocity and power in developing integrated logistics capabilities and supply chain flexibility.

2.2. Defining Logistics Capabilities

Morash et al. (1996) defined logistics capabilities as “those attributes, abilities, organizational processes, knowledge and skills that allow a firm to achieve superior performance and sustained competitive advantage over competitors”. Logistic capabilities determine the extent to which a firm can manage its operations efficiently and effectively (Gligor & Holcomb, 2012a) and are a potential source of competitive advantage for a firm (Bowersox et al., 1999; Zhao et al, 2001).

In the logistics literature, there exists several related and yet different classifications of logistics capabilities. Morash et al. (1996) through an extensive review of logistics capabilities classified the same into two broad themes or “value disciplines”. While the former value discipline, labeled “demand oriented” emphasizes interactions and interfaces with customer, fulfilment of allied goals and objectives, timeliness and being responsive to market needs; the latter, known as “supply oriented” stresses more on operational capabilities aimed at ensuring product availability, increasing convenience and minimizing total distribution cost. In contrast, Mentzer et al. (2004) classified logistics capabilities into: demand management interface capability (to manage and fulfil customer requirements; Zhao et al, 2001; Lynch et al, 2000; Bowersox et al, 1999), supply management interface capability (to efficiently manage inflow of raw materials; Morash et al, 1996, Lowson, 2003), information management capability (to effectively manage information flow both in and out of an organization; Zhao et al, 2001; Closs et al, 1997) and coordination capability (to align the interests of the participating members; Mentzer et al, 2004; Gligor & Holcomb, 2012).

Esper et al. (2007) explored the way a firm learns, develop and evolve its logistics capabilities and utilize the same for gaining sustainable competitive advantage. The authors argued that firms are leveraging their logistics capabilities to attain competitive

differentiation. Logistics leverage was defined as the attainment of distinctive logistics performance which when suitably appropriated with marketing strategy; creates enhanced customer value (Mentzer& Williams,2001).The study highlighted several derived benefits of logistics leverage for e.g. achieving customer satisfaction through improved inventory services and scheduled delivery of goods. However, logistics leverage may not be sustainable unless complemented with logistics learning over time. The authors classified logistics capabilities into five broad categories in line with other classifications (Zhao et al., 2001;Mentzer et al.,2004): (a)customer focus capability (also referred to as demand management capability) that aims to target a customer base and satisfy its requirements through differentiated products and services (b) supply management capability that aims to achieve total cost reduction in supply chain operations through efficient management of resources and wastes in addition to meeting demand profitably (c)integration capability that aims to unify the inter organizational efforts for overall gain (d)measurement capability that determines the degree to which a firm monitors its internal and external operations (e)information exchange capabilities that aims to collect, store, analyze and distribute routine and non-routine information for supporting firm operations.

Studies on logistics capabilities have also investigated the relationship between logistics capabilities and performance in online markets. Cho et al. (2008) empirically examined the relationship between firm's logistics capability, logistics outsourcing and its performance in an e-commerce market environment. The authors argued that e-commerce firms have a higher likelihood of creating a sustainable competitive advantage and improving performance if they have strong logistics capability. The authors' equated logistics outsourcing with 3PL.Third party logistics refers to using the services of an external supplier to perform some or all of a firm's logistics function. Results showed that (1) logistics capability positively affects firm performance (2) logistics outsourcing has a negative relationship with firm performance (3) a firm's use of logistics outsourcing is not associated with its logistic capability (relevant test statistics showed insignificant association) (4) logistics capability does not significantly mediate the relationship between logistics capability and firm performance. Therefore firms should not be worried about logistics outsourcing affecting performance and can safely invest for developing their logistics capabilities.

Studies have also explored the direct contribution of logistics capabilities to competitive advantage. Sandberg&Abrahamsson (2011) explored the link between operational and dynamic logistics capabilities and sustainable competitive advantage. The study used two Swedish retail companies for investigating the proposed links. The authors used resource based view as the theoretical backdrop for the aforesaid study. The authors argued that the success of these two Swedish companies was based on logistics operational and dynamic capabilities. Capabilities were defined as "complex bundles of individual skills, assets and accumulated knowledge exercised through organizational processes that enable firms to co-ordinate activities and make use of their resources" (Olavarrieta and Ellinger, 1997, p. 563). The case analysis revealed that the two companies have an integrated logistics processes and IT systems; that are valuable, rare, and inimitable as these have been developed in house for a long period of time.

From a resource based perspective; it was therefore the effective integration of logistics processes and IT systems that were the operational capabilities identified in these two retail firms. Further, the authors argued that these operational capabilities will be sustained i.e. renewed through certain dynamic capabilities (as found from two case analysis) viz. managerial knowledge and presence, cross-functional teamwork, control, learning and supply chain relationships.

Studies have also explored the interface of logistics capabilities and supply chain capabilities. As Mentzer et al. (2004) pointed logistics, as an integral of supply chain management; accordingly logistics capabilities must contribute for developing supply chain capabilities. Gligor&Holcomb (2012) conceptually explored the role of logistics capabilities in developing supply chain agility. The study did extensive literature review in logistics capabilities and supply chain agility areas and formulated a theoretical model. Finally, the authors proposed that logistics capabilities (e.g. demand management interface capabilities, supply management interface capabilities, information management capabilities of a firm) need to be integrated at its supply chain level for developing integrated supply chain logistics capabilities. These will in turn lead to supply chain agility. Further the level of integration will be moderated by cooperation and coordination capabilities as these were contingent upon the effective alignment of interest and actions of supply chain members. This study underscored the growing importance of logistics capabilities in developing supply chain capabilities. In fact, this study showed that integration of individual logistics capabilities of a firm and its partners are necessary to be integrated at its supply chain level for development of supply chain capabilities.

Further, Gligor&Holcomb (2014) investigated the influence of relational attributes like communication, cooperation and coordination on integrated logistics capabilities and in turn, the influence of integrated logistics capabilities on firm performance. The findings reveal a positive impact of each of the above relational resources on integrated logistics capabilities. The authors used relational view of firm (Dyer & Singh, 1998) for developing the proposed model. Therefore, we argue in line with Gligor and Holcomb (2012a) and Gligor&Holcomb (2014) that relational resources are required in a supply chain for integrating the logistics capabilities with a view to develop supply chain capabilities (e.g. agility in this study). This study therefore addresses the research call by Gligor and Holcomb (2014) to investigate other allied variables using identical theories for investigating integrated logistics capabilities.

2. Supply Chain Flexibility

Extant literature has viewed flexibility largely in manufacturing systems context (Beach et al., 2000; Vovurka and O'Leary-Kelly, 2000) although parallel research extended the same to supply chains too (Vickery et al., 1999; Rao and Wadhwa, 2002; Garavelli, 2003; Lummus et al., 2003; Pujawan, 2004; Lummus et al., 2005; Sanchez and Perez, 2005; Gong, 2008). Vickery et al. (1999) firstly extended the concept of total system flexibility to the supply chain. However studies have preferred to investigate it from several individual fragments for e.g. supplier affect (Scannell et al., 2000), information systems impact (White et al., 2005) etc. on focal firm flexibility and avoided the holistic view i.e. the system view. The literature on flexibility is highly diverse. Some

consider it as a subset of agility. Agility was frequently defined as “the ability of an organization to thrive in a continuously changing, unpredictable business environment” (Lummus et al., 2005). Prater et al. (2001) extended the concept of agility to supply chain agility and identified its essential components as speed and flexibility. Although supply chain flexibility is an emerging field (Sanchez and Perez, 2005) yet it has its initial roots in manufacturing flexibility. Manufacturing flexibility is often treated as a response to environmental uncertainty. However, later many researchers conceived in different ways. Later, Prater et al. (2001) extended it to logistics by indicating it as adjustable time dimensions for a firm to ship or receive goods. This early notion of manufacturing flexibility has shaped the concept of supply chain flexibility and consequently with Vickery et al. (1999); researchers have understood to adopt a total system perspective while considering flexibility in supply chains. Consequently, supply chain flexibility has been defined in multiple ways for e.g.:

- the abilities directly impacting a firm’s customer (Vickery et al., 1999)
- Supply chain’s promptness and degree for adjusting its speed, destination and volume to respond to dynamic environments (Lummus et al., 2003; Duclos et al., 2003).
- elasticity of buyer-supplier relationship under dynamic conditions (Das and Malek, 2003)
- extent to which supply chain linkages are able to adapt to changing business conditions (Gosain et al., 2004)
- Ability to restructure supply chain operations quickly and economically (Kumar et al., 2006; Wadhwa et al., 2008) to meet and respond to customer requirements (Gunasekaran et al., 2008).

However, a more comprehensive definition was given by More and Subashbabu (2008):

“the inherent ability, or characteristics of the supply chain and its parameters to be sensitive to the minor or major disturbances in business environment, assess correctly the real situation, respond quickly by the way of adjustments and adaptation with little time, effort and cost and control effectively the organization with stable performance”.

There also exist different types of supply chain flexibility e.g. operations system flexibility, market flexibility, logistics flexibility, supply flexibility, organizational flexibility, information systems flexibility (Duclos et al., 2003) etc. For a detailed discussion the reader is referred to Vickery et al. (1999), Lummus et al. (2003), Lummus et al. (2005), Duclos et al. (2003), Kumar et al. (2006) Gong (2008), More and Subashbabu (2008:2009) and Malhotra and Mackelprang (2012).

The current study adopts the definition of supply chain flexibility given by Skipper & Hanna (2009). They argued supply chain flexibility as an essential supply chain capability of devising alternate states or configurations. The current investigation approaches supply chain flexibility from a risk mitigation perspective in supply chains and hence defined it as a supply chain capability that enables a supply chain to quickly switch to one of the previously devised alternate configurations so as to sustain an

optimal level of performance. Recent literature on supply chain flexibility has explored it from multiple perspectives.

Gosling et al. (2012) developed a four step framework using a construction supply chain network of 12 suppliers. Their framework was developed with a view to develop appropriate flexibilities for uncertainty mitigation. The four steps were classifying the supply chain, identify and analyze uncertainties, optimize pipelines and develop strategic flexibility. Soon&Udin (2014) conducted a comparative analysis across several manufacturing firms in the electrical and electronic industry with a purpose of exploring the business drivers and response effect of a flexible value chain. The study underscored that the core flexibility of the value chain can be defined from operational, supply and logistics perspectives where different levels of integration and implementation strategies offer different levels of flexibility response to volume and product mix. Thome et al. (2014) underscored that supply chain flexibility must be investigated using a multi-tier network as the unit of analysis. Their study investigated (using a multiple case study) the relationships between supply chain contextual constraints and flexibility types. The study took place in three representative supply chains of the Brazilian automotive industry and sought mainly to identify and compare supply chain contextual constraints that hinder product delivery to end-customers. Constraints such as suppliers' capacity, diversity of suppliers, suppliers' cooperation, trust and commitment, tariffs, exchange rates and inventory were identified in different supplier tiers of the OEMs as the main factors influencing the observed volume and mix flexibilities. Additionally, supply chain flexibility types such as sourcing, relational, delivery, postponement, new product and responsiveness influenced the supply chain flexibility provided to the end-customers. In this backdrop, therefore an urge was felt to adopt a social exchange perspective on development of supply chain flexibility. The next section develops the linkages between the antecedents of integrated logistics capabilities with supply chain flexibility and supply chain performance.

3. Hypotheses Development

3.1. Trust and Integrated logistics capabilities

Trust is largely defined as "the firm's belief that another company will perform actions that will result in positive actions for the firm, as well as not take unexpected actions for the firm, that would result in negative outcomes for the firm" (Anderson and Narus, 1990, p. 45). Different types of trust exists viz. contractual trust, competence trust and goodwill trust (Fynes *et al.*, 2005). Zaheer *et al.* (1998) further distinguished between interpersonal trust and inter-organizational trust. Moorman *et al.* (1993) refers to trust as the willingness to rely on an exchange partner in whom one has confidence. Morgan and Hunt (1994) referred to trust as "a firm's belief in its partner's trustworthiness and integrity". Pruitt (1981) defines trust as the belief that a party's word is reliable and that a party will fulfil its obligation in an exchange. This definition indicates a firm's willingness to collaborate. Zand (1972) argues that absence of trust will prohibit information exchange and will hamper supply chain relationships. From a social exchange perspective, presence of trust ensures sustainability of contracts, increases reliability between entities, provides incentives for cooperation and develops the ground

for synchronizing and integration logistics activities for individual firms within a supply chain (Yang et al., 2008; Gligor&Holcomb, 2012b). Accordingly we hypothesize that:

H1: Trust positively influences integrated logistics capabilities.

3.2. Trust and Commitment

While some studies examining the link between trust and commitment concluded that trust precedes commitment (Tan & Lim, 2009), other studies implied that it is commitment (or feelings of loyalty to the organization) that in fact enhances the likelihood of trust (Wong&Sohal, 2002). Others simply imply that trust and commitment both impact other organizational outcomes and as such have different antecedents (Tang & Fuller, 1995; Iverson et al, 1996). However, the current study holds that it is trust among supply chain entities that is the root of commitment in supply chain relationships (Kwon & Suh, 2005). Hence we posit that:

H1a: Trust positively influences commitment.

3.3. Commitment and Integrated logistics capabilities

The willingness of trading partners to apply effort due to the relationship is referred to as commitment (Porter et al., 1974). Quite frequently it indicates a firm's attempt to build a relationship that can be sustained in times of problems and contingencies (Gundlach et al., 1995). High levels of commitment develops the platform in which both parties to exchange can realize joint goals without any opportunistic behavior (Cummings, 1984). Committed parties are willing to invest in transaction-specific assets, demonstrating that they can be relied upon to perform essential functions in the future (Anderson and Weitz, 1992). These investments help in arriving in stabilizing supply chain relationships and eliminate the uncertainty of continually searching and forming new relationships. There has been a positive relationship between commitment and relationship success (Mohr and Spekman, 1994). Hence from a social exchange perspective, commitment is a crucial success factor for supply chain relationships (Kwon & Suh, 2005) and determines the effectiveness of synchronization of logistics activities. Without commitment of each individual party in a supply chain for integrating their capabilities, supply chain capabilities cannot develop (Gligor& Holcomb, 2014). Accordingly, we propose that:

H2: Commitment positively influences integrated logistics capabilities

3.4. Reciprocity and integrated logistics capabilities

Under social exchange perspective, members in supply chain enter into contracts or maintain healthy relationships with the expectation of reciprocal benefits (Lawler et al., 2000). This forms the basis of collaborative relationships among supply chain partners that urge each other to reciprocate their actions accordingly to expectations (Narasimhan et al., 2009) and help each other in achieving mutual objectives (Cao and Zhang, 2011). Humphreys et al. (2001) argued that reciprocity can facilitate information sharing

among both upstream and downstream partners in a supply chain. Hence through efficient information exchange, we argue that reciprocity will help supply chain partners to coordinate, synchronize and integrate their logistics activities and capabilities. Accordingly, we posit that:

H3: Reciprocity positively influences integrated logistics capabilities.

3.5. Power and integrated logistics capabilities

Power refers to the relative dependence between exchange members, where power gained by one member can influence the decisions and behaviors of other members (Gaski, 1984). It is argued that firms owning certain assets and resources do exert more power in an exchange as they control the distribution of assets and resources to other members who need the same (Griffith et al., 2006). Narasimhan et al. (2009) underscored power to be a key parameter in any exchange in supply chains. In a supply chain, therefore firms having more resources will exert power in supply chain relationships and will influence activities of other participating firms. In this context, we argue that the focal firm along with its key suppliers; will exert more power in supply chain relationships and argue others to cooperate and collaborate for greater supply chain benefits (Griffith et al., 2006). Hence, the powerful entities in a supply chain will direct the degree of integration of individual logistics capabilities through owning and controlling resources. We argue that this power will have a positive effect as development of supply chain capabilities will be beneficial for every member in the supply chain. Accordingly we posit that:

H4: Power positively influences integrated logistics capabilities.

3.6. Integrated logistics capabilities and supply chain flexibility

Firms in a supply chain must synchronize, unify and integrate their individual logistics capabilities with that of the focal firm for competing with firms outside the supply chain (Gligor&Holcomb, 2014). This is of immense importance as the competitive unit has shifted from firms to supply chains (Christopher, 2000). Gligor&Holcomb (2012a) conceptually argued that it's the integration of logistics capabilities at a supply chain level that will develop supply chain agility. This is based on the premise that logistics are an integral part of supply chain management (Mentzer et al., 2004) and hence logistics capabilities will contribute for the development of supply chain wide capabilities. It is argued in this study that integration will help the firms to have a improved planning for meeting contingencies in a proactive manner and hence will positively contribute for the development of supply chain flexibility. Accordingly we posit that:

H5: Integrated logistics capabilities positively influences supply chain flexibility

3.7. Supply Chain Flexibility and Firm Performance

Supply chain flexibility aims to fulfil customer dynamic requirements in a speedy manner and hence it very well satisfies the criteria of dynamic capabilities (Gligor&

Holcomb, 2012a). Dynamic capabilities are such capabilities that are developed for adapting to changing environmental conditions and sustain a decent level of performance (Teece et al., 1997). SC agility therefore helps a firm to gain competitive edge by quickly and satisfactorily fulfilling customer requirements in the market. Extant research in supply chain management indicates a service perspective of measuring firm performance. Stank et al. (1999) propose a generic conceptualization of service performance using SERVQUAL: relational and operational. The authors view operational elements as “the activities performed by service providers that contribute to consistent quality, productivity, and efficiency” (Stank et al. 1999, 430). The relational elements are considered to focus on “activities that enhance the service firm’s closeness to customers, so that firms can understand customer needs and expectations and develop processes to fulfil them” (Stank et al. 1999, 430). Operational performance encompasses two dimensions: reliability (that indicates the dependability and accuracy of a service) and price/cost. Relational performance is observed as constituting responsiveness, assurance, and empathy. The above conceptualization of service performance is supported by Collier’s (1991) two distinct dimension conceptualizations: an internal or operations-oriented dimension of service quality performance and an external or market-oriented performance. Since SC agility helps a firm to sustain its operation through effectively fulfilling customer demands in a speedy manner; it has positive impact on both operational and relational performance (Gligor & Holcomb, 2012a). Hence we posit that:

H6a: Supply chain flexibility positively influences operational performance

H6b: Supply chain flexibility positively influences relational performance.

Figure 1 summarizes the proposed hypotheses in a theoretical model

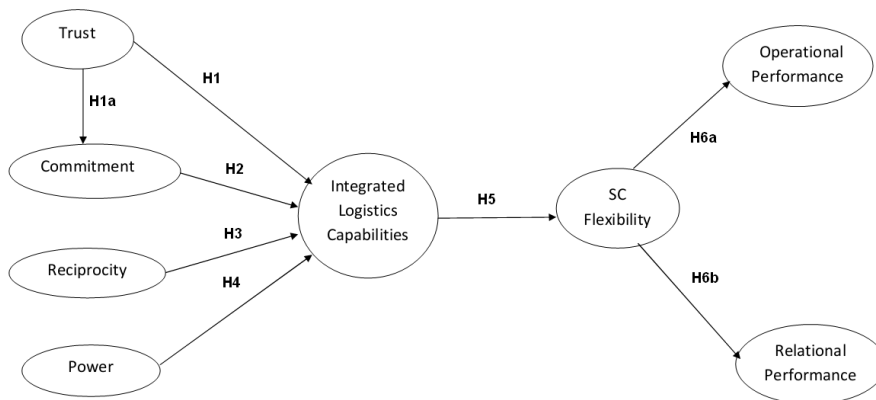


Figure I. Theoretical Model

4. Methodology

4.1. Data Collection& Sample Demographics

The data was collected through a web based electronic survey. The survey instrument was pretested by administering it to a small sample of supply chain managers drawn from a contact list (containing 1500 contacts of working professionals in various designations across different sectors in India) that was purchased from an Indian Marketing Research Firm (the firm wanted to remain anonymous). The list comprised of logistics, supply chain and purchasing managers working mostly in senior designations in the Indian subcontinent in different industries. Some of the measurement items were adapted to suit the context based on the feedback received during pretesting. Both the pre-test and final test participants were chosen from the aforementioned list based on two criteria: (1) the person is having at least 5 years of work experience in the logistics, purchasing or allied decision making and (2) the candidate is working in his current designation for at least 2 years. This brought resulted in a final list of 623 professionals. The surveyed respondents were asked to respond based on their expertise in their respective firms. Table I shows the sample profile.

Title	Number	Percentage
<i>Annual Sales Revenue</i>		
Under 1000 Cr	38	22.62
1100-2500 Cr	39	23.21
2600-5000 Cr	29	17.26
5100-10000 Cr	22	13.10
11000-25000 Cr	21	12.50
Over 25000 Cr	19	11.31
Total	168	100.00
<i>No of employees</i>		
0-50	37	22.02
51-100	38	22.62
101-200	40	23.81
201-500	23	13.69
501-1000	12	7.14
1001+	18	10.71
Total	168	100.00
<i>Industry Sector</i>		
Automobiles	23	13.69
Electrical equipments	18	10.71
Textile	12	7.14
Paper Products	29	17.26
Wood Products	13	7.74
Chemicals	26	15.48
Furniture	13	7.74
Plastic Products	34	20.24
Total	168	100.00

Table I Sample Profile

The first round of survey invitation was sent in the first week of May, 2014 via email. This was followed by two reminders, each within a gap of two weeks after the preceding survey invitation. A total of 623 emails were sent out. Out of these, 52 emails were returned as undeliverable. 177 partially complete responses were received, giving a response rate of 30.99% (177/571). However, for the final analysis we retained only complete responses. Thus, the final sample size was 168.

4.1.1 Non-response Bias

We tested for the non-response bias by comparing the early and late respondents (Armstrong and Overton, 1977). There were no significant mean differences between these two groups on key measures such as firm size and industry affiliation.

4.1.2 Common Method Bias

Since we collected from a single respondent per firm; common method may be a problem. Hence an assessment of common method bias was deemed necessary. Analysis of Harmon's single-factor test of common method bias (Podsakoff et al., 2003) showed six factors with Eigen values above one, explaining 62.8% of the total variance. The first factor explained 24.7 % of the variance, which is not the majority of the total variance. Again we resort to a second test of common method bias; we applied confirmatory factor analysis to Harman's single-factor model (Flynn et al., 2010). The model's fit indices of $\chi^2/df = 16.6$, NNFI = 0.52, CFI = 0.59 and RMSEA = 0.13 were predominantly worse than those of the measurement model suggesting that single factor model is not acceptable; thus the common method bias is negligible.

4.2 Survey Instrument

All the constructs used in the model have established scales for measurement and hypothesis testing. The measures were suitably adapted (wherever needed) to suit the context. A total of 28 survey items (refer. Table II) were used to measure independent and dependent variables in the study.

4.2.1 Trust, Commitment, Reciprocity and Power

Trust was measured with three items that enquired the respondents if their firm can depend on its supply chain members; can trust them completely and if their supply chain members have a high level of integrity. The items for measuring trust were suitably adapted from Morgan & Hunt (1991) and Fynes et al. (2005). Commitment was measured with three items that enquired of the respondents if their firm is totally dedicated in maintaining its supply chain relationships; it wants to continue its relationships for long time and if it gives the maximum effort in maintaining the same. The items for measuring commitment were suitably adapted from Fynes et al.(2005) and Morgan and Hunt(1991).Reciprocity was measured with four items that enquired respondents if their firm has fair policies for dealing with their partners; if their partners treat them fairly and if their partners contribute to existing relationship. The items for measuring reciprocity were suitably adapted from Wu et al. (2014). Power was measured with three items that enquired respondents if their firms possess equal power along with their partners to influence each other in matters of strategic decision making, R & D, sale, production and distribution. The items for measuring power were suitably adapted from Wu et al.(2014).All the constructs were operationalised on 1 to 7 Likert scale where 1=Strongly Disagree ; 4=Neutral and 7=Strongly Agree.

Constructs	Measurement Items *All constructs were measured as 1=Strongly Disagree and 7=Strongly Agree
Trust Adapted from Zacharia et al.(2009)	Our supply chain members trust each other completely. Our supply chain members can be counted on to help us. Our supply chain members have a high level of integrity.
Commitment Adapted from Morgan & Hunt(1994)	Our firm is totally dedicated to its relationship with supply chain members. Our firm wants to pursue our supply chain relationships indefinitely. Our firm delivers its maximum effort for maintaining its supply chain relationships.
Reciprocity Adapted from Griffith et al.(2006)	Our firm has fair policies for dealing with our supply chain partners Our firm is equitable in treating our supply chain partners Our supply chain partners positively contribute to this relationship Our supply chain partners generally treat us fairly
Power Adapted from Wu et al.(2014)	Our firm and its supply chain partners possess equal power to influence each other in decision, R & D, sale, production and distribution Our supply chain partners have power to influence our decision, R& D, sale, production and distribution Our firm has power to influence our partner;s decision,R& D, sale, production and distribution
Integrated Logistics Capabilities Adapted from Gligor & Holcomb(2014)	Our firm's internal logistic activities are closely coordinated. Our firm's logistics activities are well integrated with suppliers' logistics activities Our integrated capabilities are characterized by excellent distribution, transportation, and/or warehousing facilities The inbound and outbound distribution of goods with our suppliers is well integrated
SC Flexibility Adapted from Moon et al.(2012)	Our supply chain has good number of suppliers for raw materials supply Our supply chain has greater scope for new product development Our supply chain as ample scope for changing distribution facilities Our supply chain has enough scope for changing delivery modes and schedules
Operational Performance Adapted from Stank et al.(1999); Gligor & Holcomb(2014)	Our firm delivers undamaged orders each time. Our firm delivers accurate orders at all times. Our firm always meets deadlines as promised to supply chain partners.
Relational Performance Adapted from Stank et al.(1999); Gligor & Holcomb(2014)	Our firm develops formal relationships with its supply chain partners. Our firm exchanges recommendations for continuous improvement with its supply chain partners. Our firm helps its supply chain partners successfully perform tasks. Our firm knows its supply chain partners' needs well

Table II. Survey Instrument

4.2.2 Integrated Logistics Capabilities and SC Flexibility

The dependent variables in this study were integrated logistics capabilities, SC flexibility operational performance and relational performance. Integrated logistics capabilities were measured with four items that enquired respondents if their firm's logistics activities are well integrated with that of its key suppliers; if their logistics capabilities are characterized through excellent distribution, warehousing and transportation facilities and if the inbound and outbound distribution of goods are well integrated. The items for measuring integrated logistics capabilities were suitably adapted

from Prajogo&Olhager (2012).SC flexibility was measured after suitably adapting the measurement items developed by Moon et al. (2012).It consists of a seven item scale that ask executives of their perception of the degree of flexibility their focal firms have in terms of distribution facilities, no of suppliers, range of products and services offered by the firm including flexibility in delivery schedules.

4.2.3 Operational and Relational Performance

Operational performance was measured with three items that enquired respondents if their firm manages to meet delivery schedules; deliver accurate orders and undamaged goods most of the time. The items for measuring operational performance were suitably adapted from Gligor&Holcomb(2014).Finally, relational performance were measured with four items that enquired the respondents if their firm develops formal relationships with its supply chain partners; if it knows the needs of its supply chain partners and helps them to improve their activities. The items for measuring relational performance were suitably adapted from Gligor&Holcomb (2014). All the constructs were operationalised on 1 to 7 Likert scale where 1=Strongly Disagree; 4=Neutral and 7=Strongly Agree.

4.2.4 Control Variable

Like established studies in organizational research, we took firm size (natural logarithm of annual revenue) as control variable.

4.3 Scale Validation

The current study employed Partial Least Squares for scale validation and hypothesis testing. PLS is a structural equation modelling based methodology that deploys a component based approach for estimating the parameters. The benefit of using PLS extends from allowing the researcher to model formative constructs to estimating the required parameters with a minimal sample size. For PLS, the required sample size is 10 times the no of indicators of the largest construct present in a theoretical model. As PLS does not provide a significance test or interval estimation, a bootstrapping analysis was conducted with 1000 sub-samples for calculating the path coefficient, statistical significance and allied parameters. The procedure was executed in two steps. First, reliability and convergent validity was assessed. The second step assessed the discriminant validity.

The study first assessed reliability using the criterion, Cronbach's alpha larger than 0.7 (Chin, 1998). Convergent validity was next assessed using multiple criteria: (1) item loading larger than 0.70 and statistical significance, (2) composite construct reliability larger than 0.80 and (3) average variance extracted (AVE) larger than 0.50 (Fornell and Larcker, 1981). Further, discriminant validity was assessed using the criterion: the square root of AVE for each construct greater than its correlations with all other constructs ((Fornell and Larcker, 1981).As indicated in Table 3, standardized item loadings range from 0.71 to 0.95, composite reliabilities range from 0.88 to 0.95,and average variance extracted (AVEs) range from 0.64 to 0.86. In Table 4, the square root of AVE for each construct is larger than its correlations with all other constructs. Hence, these results show a highly acceptable level of reliability, convergent and discriminant validity.

Construct	Items	Item Loadings	Composite reliability	AVE	Cronbach's Alpha
Trust	3	0.88-0.92	0.935	0.826	0.895
Commitment	3	0.88-0.95	0.951	0.865	0.924
Reciprocity	4	0.71-0.86	0.882	0.653	0.825
Power	3	0.88-0.92	0.931	0.818	0.887
Integrated Logistics Capabilities	4	0.76-0.87	0.88	0.647	0.819
SC Flexibility	4	0.82-0.89	0.921	0.745	0.885
Operational Performance	3	0.89-0.90	0.93	0.816	0.885
Relational Performance	4	0.86-0.92	0.939	0.792	0.911

Table III: Convergent Validity

Construct	TR	COM	REC	POW	ILC	FLEX	OP	RP
Trust (TR)	0.908							
Commintemnt (COM)	0.220	0.930						
Reciprocity (REC)	0.392	0.036	0.808					
Power (POW)	0.382	0.180	0.330	0.904				
Integrated Logistics Capabilities(ILC)	0.503	0.285	0.509	0.562	0.804			
SC Flexibility (FLEX)	0.354	0.128	0.462	0.353	0.642	0.863		
Operational Performance (OP)	0.274	0.278	0.181	0.223	0.204	0.370	0.903	
Relational Performance (RP)	0.087	0.092	0.195	0.157	0.317	0.417	0.191	0.889
Diagonal value: Squared root of AVE, Non-diagonal value: Correlation								

Table IV: Discriminant Validity

5. Hypotheses Testing

PLS was used to estimate the path coefficients in the structural model. The estimation was executed in two steps (Chin, 1998). First, it was required to estimate the path coefficients and statistical significance for the dominant paths. Second, coefficient of determination (R-square) for endogenous variables was computed to assess their predicted power. Figure II presents the results of the hypotheses testing using PLS in the structural model.

For the influence of Trust on commitment; the corresponding path was found to be positive and statistically significant (0.22; $t = 2.243$). This showed support for our proposed hypothesis H1a. Also the path coefficient for the influence of trust on integrated logistics capabilities was also positive and significant (0.213; $t=2.035$). Hence H1 is supported. Again, H2 discussed a positive influence of commitment on integration of logistics capabilities. The corresponding path coefficient is positive and significant (0.164; $t=2.312$). Hence H2 is supported. H3 discussed a positive influence of reciprocity on integration of logistics capabilities. The corresponding path coefficient is positive and significant (0.304; $t=3.122$). Hence H3 is supported. H4 discussed a positive influence of power on integration of logistics capabilities. The corresponding path coefficient is positive and significant (0.350; $t=3.995$). Hence H4 is supported. H5 posited a positive

influence of integrated logistics capabilities on the SC flexibility. The corresponding path coefficient is positive and significant (0.643; $t=5.872$). Hence H5 is supported. H6a posited a positive influence of SC flexibility on operational performance. The corresponding path coefficient is positive and significant (0.371; $t=3.634$). Hence H6a is supported. Finally, H6b posited a positive influence of SC flexibility on relational performance. The corresponding path coefficient is positive and significant (0.418; $t=3.231$). Hence H6b is supported. Hence the model established trust, commitment, reciprocity and power as influential antecedents required for successful integration of logistics capabilities. Further it was empirically established that effective integration of logistics capabilities will result in improved and flexible and more efficient supply chains. Trust as a precursor of commitment explained around 4.8 percent of the variance in the same. Further, trust, commitment, reciprocity and power together accounted for explaining 50.6 percent of the variance in integrated logistics capabilities. The antecedents along with integrated logistics capabilities accounted for explaining 41.3 percent of the variance in SC flexibility. Finally, SC flexibility in the proposed model explained 13.7 percent and 17.5 percent of the variance in operational and relational performance respectively. To summarize, the proposed hypotheses have found their empirical support and the model have explained a substantially the variance in the respective endogenous variables at the appropriate places. Table 5 summarizes the hypotheses and the estimated path coefficients and their significance.

Hypothesis	Path estimate	T-value	Result
H1. Trust positively influences integrated logistics capabilities	0.213	2.035	Supported
H1a. Trust positively influences commitment	0.22	2.243	Supported
H2. Commitment positively influences integrated logistics capabilities	0.164	2.312	Supported
H3. Reciprocity positively influences integrated logistics capabilities	0.304	3.122	Supported
H4. Power positively influences integrated logistics capabilities	0.35	3.995	Supported
H5. Integrated logistics capabilities positively influences SC flexibility	0.643	5.872	Supported
H6a. SC flexibility positively influences operational performance	0.371	3.634	Supported
H6b. SC flexibility positively influences relational performance	0.418	3.231	Supported

Table V. Hypotheses Testing Results Summary

6. Findings and Discussion

The current investigation has empirically established the validity of the proposed relationships in an integrated model. The findings show several important links between the attributes of social exchange perspective and integrated logistics capabilities and finally with SC flexibility. In the first place, the study has showed the importance of trust among the supply chain partners for effective integration to take place. It is argued that for developing supply chain capabilities; logistics capabilities of individual firms must be integrated at the supply chain level. For effective integration to happen; partners in a value chain must be able to trust each other openly. Kwon and Suh (2005) underscored that supply chain relationships can be effective only if the partners in a network have faith in each other's abilities and unify their individual efforts. Morgan and Hunt (1994) further stressed that once the members develop mutual trust; they will also be more

committed towards executing their duties and responsibilities. This is also shown in our investigation that trust do exerts a positive influence on commitment. The members in a value chain are more duty bound as they feel a better state of belongingness to their assigned duties and activities. Also supply chain partners donate their maximum effort for information dissemination that helps in enhanced visibility of inventory status, logistics condition of individual members in the value chain.

Reciprocity was identified and established as another important attribute that can contribute positively to the integration of logistics capabilities. This is another significant contribution of this study. Reciprocity denotes the ability of different value chain members to expect a similar kind of behavior in return and allied benefits. This is facilitated when partners in a supply chain formulate policies and procedures that are unbiased and likely to result in equal opportunities for every partner. In reciprocity; partners equally value each other's contribution, identify and acknowledge the same which results in enhanced relationships and transparency. Eventually this positively contributes to unification of efforts and capabilities of individual logistics capabilities.

A crucial contribution of this study was the incorporation of power as an influential antecedent for logistics integration. In a supply network, every member generally has access to a specific set of resources (which may be due to its core competencies; negotiation skills and contacts in the market). Hence parties having access to scarce resources can exercise greater control and authority over others in a network and can influence the formulation of policies and procedures. Accordingly, the presence of such powerful members must be monitored. As shown by the study that power positively helps in logistics integration; this might imply that the members are exercising their power in a positive manner thereby contributing to the overarching goals and aims of the supply chain.

The study therefore has argued to practitioners and supply chain managers that they should encourage procedures and practices that can strengthen supply chain relationships based on trust and commitment. Further, they should focus on organizing training programs and knowledge exchange forums where partners in supply chain can share their experiences and expect appropriate returns of their investments (both in terms of tangibles and intangibles). All these will help in coordinating the individual logistics activities of the partnering firms in a supply chain network. Also, for a focal firm this will affirm the ground for unifying its key processes with those of its key supplier's processes. Finally, trust, commitment, reciprocity will help in efficient inbound and outbound distribution of goods through unifying the individual logistics capabilities. As shown by the current investigation, this integration of logistics capabilities will help the supply chain members to work in a synergistic manner and devise alternate states of operations for ensuring continuity of supply chain operations in the event of a disaster. This capability will be manifested if the supply chain can accommodate last minute changes in delivery modes and schedules can alter its distribution facilities etc.

Lastly, the study has investigated the impact of SC flexibility on supply chain performance. The current study has used a service perspective for measuring supply chain performance in line with Stank et al. (1999). Using a operational performance measure, it was shown that supply chain flexibility helps a firm in delivering undamaged and accurate orders every time. Further supply chain flexibility helps a supply chain to

meet its delivery schedules and deadlines accurately. On the relational front, supply chain flexibility helps the value chain to create, enhance and sustain its relationships with its suppliers and customers. Further, it helps a focal firm in assessing its supplier's needs and requirements and accordingly helps them to grow and execute associated activities.

7. Conclusions and Suggestions

In line with the tenets of social exchange perspective, this study has proved the dominant role of trust, commitment, reciprocity and power in the development of supply chain flexibility through effective integration of logistics capabilities at the supply chain level. Another contribution of this investigation is the empirical validation of the proposition by Gligor&Holcomb (2012) that it's the effective integration of logistics capabilities of individual partners in a supply chain that ultimately results in supply chain capabilities. Also the study has again empirically established that trust is a pre-cursor of commitment in any supply chain. Lastly, collecting data from a wide range of industries has helped to increase the generalizability of the findings and have confidence in the same. However, the current study has its own limitations too. Firstly, the study has collected responses from single informant per firm. Hence future studies should collect from multiple informants per firm to have a more accurate perception being captured of the actual picture. Secondly, the study using a social exchange perspective had investigated the impact of four attributes (e.g. trust, commitment, reciprocity and power) on logistics integration. Further studies should explore other possible attributes either using a social exchange perspective or some other relevant theories. Third, future studies should explore other allied theoretical perspectives that can be used for exploring such investigations with allied or new attributes. Fourth, further studies can extend the above framework for exploring the developing of other supply chain capabilities e.g. agility, resilience, robustness etc. The study has finally suggested managers to build a culture based on trust, commitment, reciprocity and power where supply chain partners can exchange their know-how and experiences and help in each other's growth thereby benefitting the entire supply chain.

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EFFECT OF DIMENSIONS OF SERVICE QUALITY ON THE BRAND EQUITY IN THE FAST FOOD INDUSTRY

Majid ESMAEILPOUR
Zahra MOHAMADI
Azade RAJABI*

Abstract

Due to the increasing competition in the industry and service sectors, creating the powerful brands has great importance in these industries. One of the main factors that help to create a powerful brand is investment and improving the quality of services. Nowadays, the competition for improving the quality of services is raised as a key strategic issue for organizations that operate in the services sector. The aim of these researches to investigate how the dimensions of service quality affect the brand equity in the fast food industry. The customers of fast food industry (Restaurant Raphael) in Boushehr constitute the statistical population of this research. Given that the statistical population is unlimited, through sampling 390 questionnaires were distributed, collected and analyzed. For analyzing the data, the structural equations modelling was used by help of the software smart PLS. The results show that the entire dimensions of service quality of model SERVQUAL (tangible factors of services, reliability, responsiveness, assurance and empathy) have a positive and significant impact on the brand equity. It also became clear that among the five dimensions of quality of services, the tangible factors of services have the most impact on the brand equity in the fast food industry. So implementing the programs to enhance the quality of services will have to a very large extent a positive effect on increasing the brand equity in the fast food industry.

Keywords: Service quality, Brand equity, Fast food industry

JEL classification numbers: M31, D12, D22, D63

1. Introduction

The brand is the most valuable asset of an organization and as a tool that investigates the difference and uniqueness of products, it has been recognized for consumer's choice (Aaker, 1991); whereby the consumers are ensured for facilitating the decision-making process, some of the difficulties related to the experience and the

*Majid Esmailpour is Assistant Professor, Business Management, Persian Gulf University, Bushehr, Iran, Email: Majidesmailpour@yahoo.com., Zahra Mohamadi is Graduate student of Business Management, Persian Gulf University, Bushehr, Iran, Email: Zahramohamadi62@gmail.com/ AzadeRajabi is Graduate student of Business Management, Persian Gulf University, Bushehr, Iran Email: Rajabi_azade@yahoo.com

quality of beliefs are reduced (Chung & Chieng, 2013). In the current competitive environment, most researchers believe that the brand is an important part of a business and assets of a firm; a lot of businesses are interested in learning how to build a successful brand. The strategy to create brand equity as another competitive strategy can help the different businesses and organizations in achieving the performance goals. Therefore, organizations need to be aware of the way of creating their brand equity (Aaker, 1996). One of the requirements for creating a strong brand is to recognize the factors causing the brand equity (Rousta and Madani, 2010). The brand equity has many advantages especially for companies and producers. For example, if a brand is of particularly high value, the target consumer will have a positive behavior towards the brand; consequently he/she will be ready to pay a high price for product, repeat his/her purchase and do the word of mouth advertising for the product (Kim & Hyun, 2010).

Due to the increasing competition in the industry and services, creating the powerful brands in these industries has great importance. One of the main factors that help to create a powerful brand is investment and improving the quality of services (Edward & Wang, 2015). Today, the competition is raised to improve the quality of services as a key strategic issue for organizations that operate in the services. Organizations that achieve the higher levels of services quality attract the higher levels of customers' satisfaction as a base for achieving the sustainable competitive advantage (Guo et al., 2008). Although the consumer-based brand equity in the field of services is essentially different from the product-based brand equity and with regard to the importance of the fast food industry ready for customers and considering that the branding is considered as a factor for creating competitive advantage in the service industries, the majority of the researches have focused on the development of the service quality criteria in the specific fields such as retail industries (Dabholkar et al., 1996), online services (Rabinovich, 2007) and have more focus to examine the behavioral consequences of quality of services such as positive verbal advertising, loyalty (Zeithaml et al., 1996) and associating the quality of services with other marketing important concepts, such as the perceived value and customer's satisfaction (Caruana et al., 2000); fewer previous researches have investigated experimentally the correlation between the perceived service quality of the restaurant customers and the customer-based brand equity (Berry, 2000; He & Li, 2011; Jensen & Kjastrup, 2008). For example, Edward and Wang (2015) have examined the impact of services on the foodstuffs brand equity in the brand preference, Sasmita and Mohd Suki (2015) have investigated the effect of young consumer's insight on the brand equity and White et al. (2013) the effects of services on the brand equity in several retail channels. Therefore, the experimental evidences that support the direct relationship between the dimensions of the quality of services and brand equity need to further investigation. Due to the importance of brand equity for companies, investigating the effect of the dimensions of service quality on the brand equity is necessary. Therefore, the main objective of this researches to investigate the dimensions of quality of services and the amount of effect of every one on the brand equity in the fast food industry, so that we can in this way determine the influential dimensions of service quality on the brand equity and branding. On this basis, the present research revolves around this issue whether the quality of services in the fast food industry has an impact on the increase in the brand equity? And do the dimensions

of the quality of services (tangible factors, reliability, responsiveness, assurance and empathy) have positive and significant impact on brand equity?

2. Literature review and background of study

2.1. The brand equity

According to Aaker (1991), brand is: a set of assets and obligations which is linked with the brand name and symbol; it is added to or lowered from the value that is provided by a product or service to the company or the company's customers. Keller (1993) suggested that consumers' brand awareness is based on the set of dependency related to properties, advantages and general characteristic. In the other words, the brand equity is defined as the customers' subjective and intangible evaluation of brand (Ryan et al., 2005). The brand equity is a value that is created by increasing the effectiveness of marketing activities, creating a higher degree of brand preference, the desired purchase intent and increase in the market share of a firm, (Bailey & Ball, 2006; Aaker, 1996; Berry, 2000; Chang & Chieng, 2006; Farquhar, 1996). Keller (1993) sees the consumer-based brand equity as the recognition of the brand impact relating to the consumer on the consumer's reaction towards the company's compound marketing strategy. The four dimensions of the brand equity that was provided by the Aaker (1991) are as follows: the perceived quality, brand awareness, brand associations, brand loyalty.

- **Perceived quality:** Zeithaml (1998) has defined the perceived quality as customers' judgment towards the advantage, superiority, credit and the difference of a brand compared to other rival brands. Perceived quality affects not only on other dimensions of brand, but also the classification of products from a customer's perspective (Aaker & Joachimsthaler, 2000).

- **Brand associations:** according to Aaker (1991), brand associations consist in anything in memory that is related to brand. Consistent and brand association may be observed as the forms and characteristics related to a product or to the independent aspects of a commodity itself that the stays in customer's memory (Chen, 2001).

- **Brand awareness:** Aaker (1991) defines the brand awareness as an ability of a potential buyer for recognizing or reminding a brand that is a member of the particular commodity class. In fact, awareness is defined an area in which the customers recognize and remind the brand and can identify the products and services related to the brand (Aaker & Joachimsthaler, 2000).

- **Brand loyalty:** according to Aaker (1991), brand loyalty is a situation that indicates how is likely a consumer to change a brand, especially when that brand causes a change in the price or features of products and services. Loyalty is defined as a behavioral response as well as a physiological function. Brand loyalty is a descriptive variable that reflects the unique differences of behaviors and purchase style of customer in a specific product class (Gounaris & Stathakopoulos, 2004).

2.2. Quality of services

Gefan (2002) defines the quality of services as a subjective comparison that customers make between the quality of services that they prefer to receive and what they actually achieve. The literature relating to the definition of the quality of services is

widely classified into two technical and functional perspectives. The technical perspective gives the nature of the provided services, while the functional one investigates the mode of services (Grönroos, 1983). In General, marketers defend the functional approach when they want to measure the quality of a company's services. The main reason for this preference is based on the argument that a consumer has typically a different perception of the quality of services compared to a technical expert. Therefore, for measuring the consumer's perception of the quality of services, the use of technical method is not appropriate (Donabedian, 1980). Some researchers have defined the quality of services based on different theoretical hypotheses. For example, Parasuraman (1990) believes that the quality of services consists in the existing difference between the expectations and the customers' perception of received services.

In recent three decades, the different models were provided by the experts and scientists for measuring the quality of services. One of the most prestigious and the most famous of them is the measurement model of quality of services of Parasuraman, Zeithaml and Berry (1991) called the SERVQUAL model. SERVQUAL is regarded as an acceptable model for the measurement of an organization's quality of the services. As a tool for measuring the quality of services, Parasuraman et al. (1991) have provided a questionnaire. The SERVQUAL questionnaire includes 22 items that measure five dimensions of the quality of services. These dimensions consist in the tangible factors, reliability, responsiveness, assurance and empathy (Parasuraman et al., 1991).

- **Tangible factors:** tangible factors include appearance, physical possibilities, equipment, employees and communicative commodity. All these dimensions provide an image that the customer considers for evaluating the quality; like the amenities in the physical environment of the organization.

- **Reliability:** reliability means the ability to perform services in a safe and reliable way, so that the customer's expectations are satisfied. For example, customers who go to a restaurant have the expectations such as doing quickly the orders and cleanliness of the surroundings. Other meaning of the reliability is keeping commitments. In other words, if the organization promises some services in the field of time of presenting services, way of doing those and cost of them, it have to keep them.

- **Responsiveness:** responsiveness refers to the desire to assist customers and provide quickly the services. This dimension of the quality of services emphasizes on demonstrating sensitivity and vigilance in exchange for customer requests, questions and complaints. For example, in a restaurant if a customer gets into difficulty in connection with the food order request and requests for help, the length of time that he/she should wait for the fixing it, will represent the amount of employees' responsiveness.

- **Assurance:** the reliability of the knowledge and employees' polite behavior refers to competence and merit of services to suggest assurance and self-assurance. This dimension of the service quality is especially important in those cases in which the risk is high. For example, according to the sensitivity of the lives of people in food intake, in the restaurant and fast food industry this component is of great importance.

- **Empathy:** empathy means the individual care and attention to the services that are provided to their customers. It means that despite the individuals' spirituality each of

them is conducted in a special manner, so that customers are convinced that the organization has understood them and they are important for the organization.

2.3. Research experimental background

In relation to the subject of this research, the various researches have been done in Iran and other countries; in the following we refer to a few of the most relevant new ones. Iranzadeh et al. (2012) carried out a research entitled as the effect of marketing compound on the brand equity. The aim of their research was to determine the way of creating the value by the elements of the marketing compound for the brand. The results showed that the elements of the price and product have a positive and significant impact on the entire dimensions of brand equity. Two elements of distribution and promotion activities are also among the factors influencing the brand awareness and association. Rousta and Madani (2010) conducted a research entitled as the relationship between the quality of services and the customer's decision-making on the brand equity. The aim of their research was to investigate the impact of the quality of services on the brand equity, taking into account the mediator variable of the customer's decision-making. The results showed that the quality of services is one of the most important factors influencing the brand equity and by considering the mediator variable of the customer's decision-making this relationship become indirectly stronger.

Su (2016) in his research stated that a positive relationship exists between the brand awareness and perceived quality. The results of his research also showed that a positive relationship exist samongawareness, quality and loyalty. Dib and Alhaddad (2014) in another study showed that the dimensions of service quality include the tangible factors (equipment and facilities), the quality of the employees, and the quality of the performance. They pointed out that dimensions of the quality of services have a significant and positive impact on customers' assurance, satisfaction and loyalty. The results of the research of Imran et al (2007) show that the dimensions of the quality of providing services (tangible factors, reliability, responsiveness, assurance and empathy) to the customers will cause their satisfaction and loyalty.

Edward and Wang (2015) conducted a research entitled as the impact of services of the foodstuffs brand equity on consumer's perception of nutritional value, physical risk and brand preference. The aim of their research was to investigate the impact of the dimensions of the foodstuffs brand equity (brand awareness and brand image), the consumer's perception of the nutritional value and the physical risk of foodstuffs on the brand preference. The results showed that the awareness of the brand services and the brand image have the different effects on consumer's perception of nutritional risk and value. Brand awareness has a positive impact on consumer's perception of the nutritional value, but is not influenced by the perceived physical danger. In contrast, the brand image has a negative impact on the perceived physical danger and a positive impact on brand preference. Sasmita and Mohd Suki (2015) did a research entitled as young consumers' insight on the brand equity. The aim of their research was to investigate the effects of brand association, brand loyalty, brand image and brand awareness on the brand equity among young consumers. The results showed that the brand association, brand loyalty, brand image and brand awareness have an impact on the brand equity and

the brand association has positively associated with the brand equity and the young consumers have assurance to the companies owning a specific product or brand. Usually, young consumers consider the brand that they know as first choice and compare it with other products or brands, lowering the possible risks to a minimum. The young consumers who are aware of a particular product can recognize the brand in social media in comparison with rival products. They are also aware of unique image of a product compared to the other products.

Sadiaet al. (2013) carried out a research entitled as how the quality of services affects the brand equity. The purpose of their research was to investigate the direct effect of the quality of services on the brand equity, along with the mediator role of the validity of great companies and perceived value. The results showed that the perceived value and the validity of the great companies affect in a fully mediated way the relationship between quality of services and customer-based brand equity. Also in the banking industry, the quality of services leads not only to satisfy the customer's expectations of standard services, but also it causes to enhance the assurance to abilities of a brand. Venkatesan et al. (2015) carried out a research entitled as the effects of services on the brand equity of retail channel. Their research aimed to investigate the reciprocal effects of quality of services and the quality electronic services on the retail brand equity as well as the effectiveness of the service environment on the retail brand equity. Research results showed that the consumer's perception of quality of services and the quality e-services have on a positive influence on the retail brand equity. Their research also showed that the quality of online services has more impact on the consumer's perception of retail brand equity in comparison with the offline one. Tuan (2014) conducted a research entitled as clinical governance, companies' social responsiveness, health of quality of services and the brand equity. The aim of this research was to investigate the impact of the quality of the patient care services on brand equity of hospitals. The results showed that the high quality of services causes to make sure the patients of the performed services and recommend the hospital to others. In this research, the dimensions of the quality of services included the cleanliness of departments, advanced medical equipment, proper acceptance procedure and behavior of the hospital personnel.

2.4. Hypotheses and the research conceptual model

According to the proposed researches, it became clear that each of the researchers have dealt with the brand equity with a specific approach. However, the history of the research shows that in the sector of food industry services there is a need for examining the impact of providing the services of quality on the brand equity due to the importance of paying attention to the quality and high competitiveness. Studying the theoretical and experimental history of the research subject and taking into account the results of researches of Edward and Wang (2015), Sasmita and Mohd Suki(2015), Tuan(2014), Ryan et al. (2013), Iranzadeh et al. (2012) and Roustia and Madani (2010), the following hypotheses were formulated for this research.

H₁: The tangible factors for the service quality in fast food services have a significant and positive impact on its brand equity.

H₂: The customers' assurance to the employees of fast food services has a significant and positive impact on its brand equity.

- H₃:** Responsiveness of the employees of fast food services toward customers has a significant and positive impact on its brand equity.
- H₄:** The customers' assurance to the employees in environment of fast food services has a significant and positive impact on its brand equity.
- H₅:** The empathy of the employees of the fast food services with customers has a significant and positive impact on its brand equity.

Being identified the fundamental variables of the research subject and becoming clear the relationships among them based on the theoretical and experimental history, the conceptual model and framework for this research was compiled. In conceptual model of this research, dimensions of brand equity have been extracted from Aaker's model (1996) which includes the perceived quality, brand awareness, brand associations and brand loyalty. The dimensions of the quality of services have been extracted also from the model of Parasuraman et al. (1991) that includes the tangible factors of services, reliability, responsiveness, assurance and empathy. Because this research aims to investigate the effect of dimensions of service quality on the brand equity, the dimensions of service quality have been considered as the independent variable and the brand equity as dependent one. The conceptual framework of this research has been provided in Figure (1).

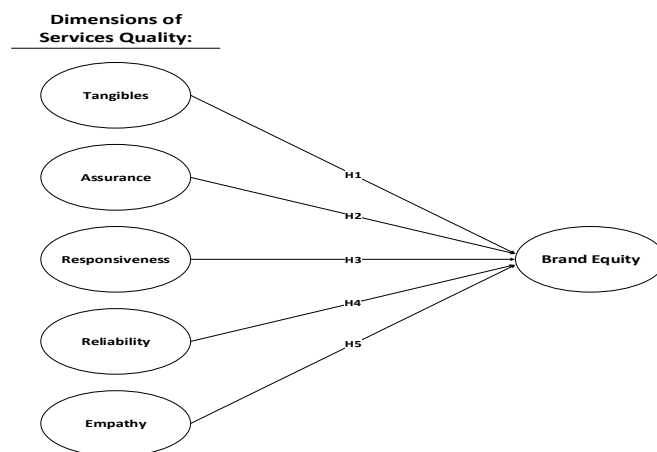


Figure 1: Research conceptual model

3. Research Methodology

The present research is an applied research in terms of results and in terms of nature and methods of implementation is a descriptive-survey and co relational. The statistical community of research is the customers of the fast food industry (*Restaurant Raphael*) in Boushehr. Since the full information about the exact number of consumers is not available, the statistical community of research has been considered unlimited. Based on Cochran sampling formula of an unlimited community and at the assurance level of 95%, the agreement ratio of 50% and the sampling error of 5%, the statistical sample size suitable

for research was determined 384 people. Due to the large population and the lack of the possibility of developing the statistical population framework, in this research the non-random sampling method and the convenience sampling has been used. The research data collection tool was a response-based questionnaire. The questionnaire of this research has been composed of three parts: introduction, demographic questions and the questions of measurement of the research main variables. For measuring the research main variables, 35 questions were formulated through the integration of two questionnaires of measuring the SERVQUAL service quality (Parasuraman et al., 1988) and a brand equity measurement questionnaire (Aaker, 1996). The scale of measurement of the variables in this research is Lickert's five options spectrum (from I agree completely to I disagree completely). With a presence in fast food industry (Restaurant *Raphael*) during the seven days of a week, 430 questionnaires were distributed among customers of this restaurant as an convenience sampling of which eventually the full 390 questionnaires were given back.

Given that the questionnaire of this research has been design on the standard questionnaires and their validity has already been assessed, it can be said that the questionnaire is of the necessary validity. Despite this, to determine the validity of the research questionnaire, the method of content validity was used again. For this purpose, the designed questionnaire was provided for a number of university professors in the field of marketing management and customers of the fast food industry and they were asked to comment about the questionnaire validity. After collecting the opinions, the final questionnaire was prepared. To measure the reliability of the research questionnaire, the most common method of evaluation of the reliability of the questionnaire i.e. Cronbach's alpha coefficient was used. Cronbach's alpha coefficient for all variables was higher than 0.7 and for the total questionnaire was also equal to 0.899 that is an appropriate coefficient and suggests that the reliability of the research tool is in the appropriate level. Also, in order to measure the validity of the questions of the questionnaire the indicator of the average variance extracted (AVE) and for measuring the reliability of the questionnaire the coefficient of composite reliability (CR) has also been used. Table (1) shows the necessary information regarding the design of questions of the questionnaire and the results of the questionnaire reliability and validity indicators.

Table 1: Research variables and items extraction resources and the results of the reliability of the data collection instrument (questionnaire)

Variable		Cronbach's alpha coefficient	CR	AVE	Items extraction resource	Number of items(question)
Dimensions of services quality	Tangible factors	0.867	0.900	0.600	Parasuraman, Zeithaml, & Berry, 1988	6
	Reliability	0.791	0.929	0.767		4
	Responsiveness	0.923	0.943	0.769		5
	assurance	0.702	0.889	0.631		5
	Empathy	0.939	0.953	0.804		5
Brand equity		0.959	0.964	0.731	Aaker, 1996	10
Questionnaire as total		0.899				35

Source: Provided by authors.

In order to calculate the convergent validity, the criterion of AVE was used. According to Hair et al. (2011) If AVE is at least equal to 5.0, this indicates that the variables are of the suitable converge validity. This means that a hidden variable is able to explain on the average more than half of the variance of its indices (the obvious variables). Given that in this research the average indicator of the extracted variance (AVE) is higher than 5.0 for all research variables, the convergent validity of the model variables is confirmed. The combinatory reliability coefficient (CR) and Cronbach's alpha coefficient, evaluates the reliability of the measurement tool. As table 2 shows, given that the value of the combinatory reliability coefficient (CR) and Cronbach's alpha coefficient are higher than 0.7 for all variables of research, the reliability of the questions of the variables in the questionnaire is acceptable.

To test the hypotheses and the research conceptual model, the structural equations model (the method of partial least squares) has been used by the help of Smart PLS software. The reason why we used the Smart PLS software was that data of this researches not of normal distribution and so by Lisrel and Amos software we are not able to test the conceptual model of research.

4. Research Findings

For analyzing the demographic variables of the research, the descriptive statistics was used. Table (2) is related to the demographic variables that have been analyzed through collecting about 390 questionnaires.

Table 2: Demographic characteristics of respondents

Demographic variable	Levels	Percentage of frequency
Gender	Male	51.8
	Female	48.2
Education	Diploma and lower	28.5
	Associate	25.9
	Undergraduate	33.3
	Graduate and higher	12.3
Age	Lower than 20 years	13.6
	21 to 35 years	57.9
	36 to 50 years	21.9
	Over 50 years	6.6
History of consumption of fast food services (<i>Restaurant Raphael</i>)	less than 1 year	11.5
	1 to 3 years	30.2
	3 to 5 years	26.7
	Over 5 years	31.6

Source: Provided by authors.

As the table (2) shows, the largest number of respondents is man (52%). Also, most individuals of the sample (31.6%) with a history of more than five years use the fast food services (*Restaurant Raphael*). Most individuals of sample (57.9%) are young as well as largest number of sample (33.3%) is bachelor.

Based on the method of structural equations modelling, the research conceptual model and hypotheses were tested by the help of the smart PLS software. The structural equation modelling helps the researcher to test and investigate generally and particularly

the theoretical pattern that has been formed of various components. In the structural equations model, all variables are divided in to two categories of latent and apparent variables. The observed variables (rectangle) are measured directly by a researcher, whereas the latent (oval) or non-observed variables are not measured directly, but based on the correlation or relations between the measured variables they are inferred. The latent variables indicate a series of theoretical constructs that are not directly observable and through other variables are constructed and observed. Figure 2 and 3 shows the research conceptual model in the way of estimating the standard path coefficients.

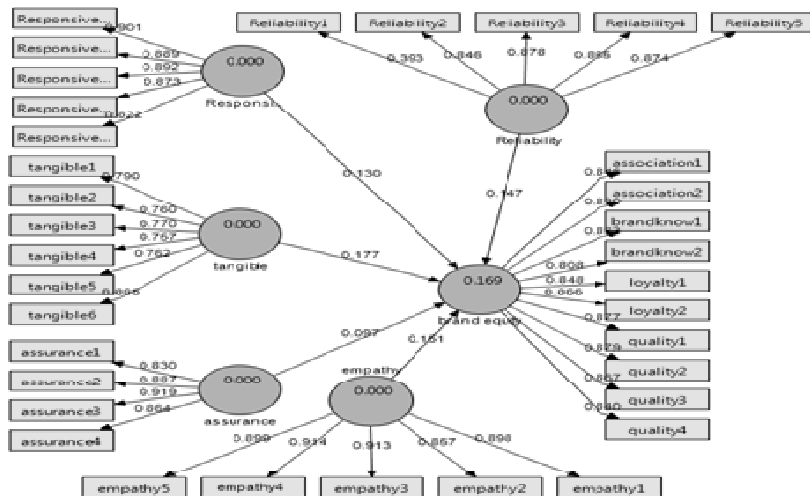


Figure 2: The confirmatory factor analysis, structural and measurement model along with the values of the standardized coefficients

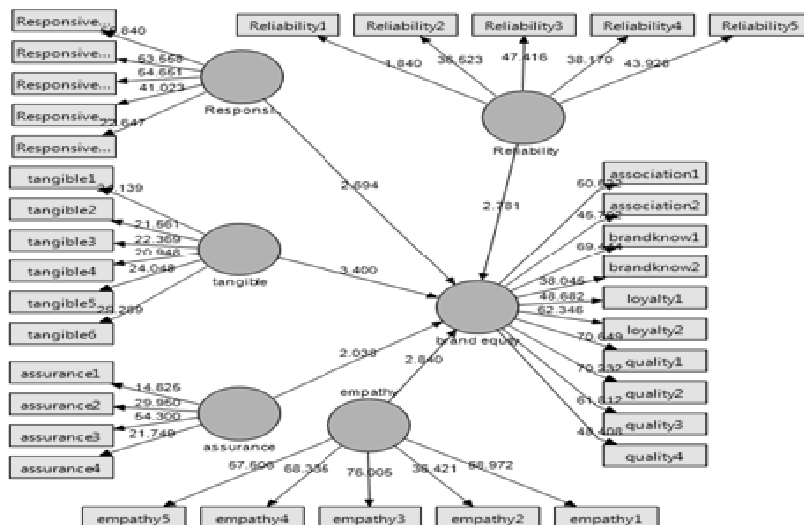


Figure 3: The confirmatory factor analysis, structural and measurement model along with the values of the significance coefficients (t-value)

Figure 3 shows the research different model on the absolute value of significance coefficients ($|t\text{-value}|$). This model tests in fact all the measurement equations (the factor loading) and the structural equations (the path coefficients) by using statistic t . According to this model, if the value of the statistic t is larger than 1.96 for paths, the path coefficient and factor loading is significant in the assurance level 95% and if the value of the t -statistic is less than the value of the 1.96 for paths, as a result in factor loading or path coefficient is not significant. Also, if the value of the statistic t is more than 2.58, the path coefficient and factor loading is significant in assurance level 99%.

The model fitness indicators are one of the most important stages in the analysis of structural equation modelling. These indicators answer this question whether the model represented by data verifies the conceptual model of research? In order to examine the fitness of measurement model and inner compatibility of the questionnaire questions, some coefficients like Cronbach's alpha, composite reliability and extracted variance were calculated; the results of these data have been provided in the table (1). In investigating the fitness of structural model also the two variance rate indicators were explained and indicators of participation and increase were calculated in the Stones-Gayser test was calculated. Another indicator that was used for assessing overall the structural model is GOF (Hair et al., 2011). The calculated amount for model is 0.155 which implies a goodness of the model fitness.

As it was determined, indicators of fitness of the measurement and structural model show the good fitness condition of the model. But, the overall confirmation of the research conceptual model does not mean all relationships in the model have also been confirmed. After the overall fitness of the model, you must also test whether the defined relationships in the model are approved or not. After the extraction of structural equations model data, we can test the research hypotheses. The main research hypotheses test results have been shown in table (3).

Table 3: Testing the main hypotheses of the study

Hypotheses	Standardized path coefficient	T-value	P-value	Result
H_1 : The tangible factors in fast food services have a significant and positive impact on its brand equity.	0.177	3.400	0.000	Accepted
H_2 : The customers' assurance to the employees of fast food services has a significant and positive impact on its brand equity.	0.097	2.038	0.000	Accepted
H_3 : Responsiveness of the employees of fast food industry toward customers has a significant and positive impact on its brand equity.	0.130	2.694	0.000	Accepted
H_4 : The customers' assurance to the employees in environment of fast food services has a significant and positive impact on its brand equity.	0.147	2.781	0.000	Accepted
H_5 : The empathy of the employees of the fast food services with customers has a significant and positive impact on its brand equity.	0.151	2.840	0.0000	Accepted

Source: Provided by authors.

Implementing the structural equations model shows there is a significant and positive relationship among the elements of the different layers of conceptual model of research. According to the results obtained from the standard path coefficients and the significance coefficients or statistic t (Figure 2& 3) and according to what has come in table 5, it can be said that the dimensions of the service quality (tangible factors, responsiveness, reliability and empathy) on assurance level of 99% have a positive impact on the brand equity. The assurance variable on assurance level % 95 has a significant and positive impact on the brand equity, as well.

5. Conclusion and Suggestions

The aim of the present research was to investigate the impact of the quality of service on the brand equity in fast food services industry of Boushehr. After studying the theoretical literature and history of researches done in this field, the hypotheses and the conceptual model of research were designed; then through the structural equations modelling by the help of the Smart PLS software, they were tested. As table 5 shows, the findings of this research represent a significant and positive impact of tangible factors on the brand equity. Researches done by Tirado et al. (2016), Kashif et al. (2016), Edward and Wang (2015) confirm this hypothesis. They expressed in their results of their research that the quality of services and its dimensions have a positive and significant impact on the brand equity. The customer wants in exchange for his/her payments get more value; therefore, it is recommended the restaurant's managers and employees to provide the service easily and faster, so that a stronger brand is occurred to customers. With regard to the positive impact of the services' tangible factors on the brand equity, it is recommended the restaurant's managers and employees to use the suitable and attractive decoration for restaurants, so that it provides a relaxed atmosphere and convenient for our customers; it is recommended the employees pay attention to their appearance. The managers are recommended that they use the marketing tools such as the placement of the tableaux to help customers.

According to the results extracted from table 5, it can be said that the assurance has a positive impact on brand equity. The findings of researches conducted by Iranzadeh et al. (2012), Jahanzab et al. (2013), Tuan (2014), Edward and Wang (2015) confirm this hypothesis. In the results of their research they expressed that the quality of services and the marketing mixture and its dimensions have a significant and positive impact on brand equity. The difference of their researches with this research was that most of researches have been carried out in organizations and service companies like the Banks. It is recommended that marketers and managers of chain restaurants industry try for introducing the chain restaurant brand and creating a positive image in the minds of customers and making sure their marketing is based on the customers' social and age characteristics and their buying habits. Also donating gifts to children, for example, or providing conditions for taking pictures of families who come to the restaurant for the special ceremonies, they try for creating a positive image from the chain restaurants brand. The positive impact of the customers' reliability to the services of restaurant shows that the restaurant's employees must try to be punctual in providing services and correct their mistakes. For attracting customers' attention to providing of the quality

services by the restaurant's managers, it is recommended that the employees, if necessary, listen patiently to their complaints and try to fix it.

The findings of this research represent a significant and positive impact of responsiveness on the brand equity. The value of the path coefficient of this hypothesis shows that if the responsiveness to customers in the restaurant is increased by 1%, the brand equity will increase by 13%. Researches done by Roustaei and Madani (2010), Ryan et al (2013) confirm also the result of the test of this hypothesis. They expressed in the results of their research that the quality of services and the marketing compound and its dimensions have a significant and positive impact on the brand equity. Customers under influence of their perception of quality of the restaurant increase their loyalty and pave the way for word of mouth advertising. Use of the up to date and efficient services, the appropriate conduct of employees, responsiveness etc., makes not only to achieve goals, but creates a more powerful image of brand in the mind of customers. In order to increase the brand equity of fast food services industry, it is recommended that management appoints to communication those customers who have the necessary patience and meet the needs of customers as possible.

Other research finding also indicates that the reliability has a positive and significant impact on the brand equity. The value of the path coefficient of this hypothesis (0.147) shows that if the customer's assurance to restaurant services is increased by 1%, the brand equity will increase by 0.147. Researches done by Tirado et al. (2016), Ryan et al. (2013) and Tuan (2014) confirm also the result of the test of this hypothesis. They expressed in the results of their research that the quality of services and the marketing compound and its dimensions have a significant and positive impact on the brand equity. It is recommended that the owners of the chain restaurants by offering the quality food at reasonable price and providing the better services to customers cause to increase the business value and assist to customers' loyalty to restaurant's brand. For example, employees should be selected from among highly experienced individuals and be sure that they can solve as much as possible the unforeseen problems and respond to customers' demands. With regard to the positive impact of the assurance on the increase of brand equity, it is recommended the employees take full responsiveness for their works. If the customer is a little time, we advise the employees try to meet his/ her need so that the customer gets satisfied from the provided services.

The results of this research show that empathy of the restaurant's employees with customers has a positive and significant impact on brand equity. Researches done by Tirado et al. (2016), Kashif et al. (2016), Edward and Wang (2013) confirm also this hypothesis. They expressed in the results of their research that the quality of services and its dimensions have a positive and significant impact on the brand equity. Satisfied and loyal customers are ready to pay a higher price to achieve their desired brand. The more the brand is important for customer, a higher price for it he is ready to pay, because the brand creates value for him/her. Therefore, it is recommended that to the suggestions and critiques on behalf of the customers are paid attention. In order to increase the restaurant's brand equity through empathy, the employees must be of humility in providing services, allocate enough time for customers and respond to their request; they should guide them in choosing their desired foods and listen carefully the customer's words.

Limitations and future suggestions: Research activities in implementing face always restrictions that can be of impact on the results of research and reduce its generalization and capability. This research is not also an exception. For example, the tool of collecting the data of this research was questionnaire. The questionnaire as a data collection tool is of defects that can affect the results of this research. Also, the data of this research have been collected through completing the questionnaire in the environment of Boushehr City; therefore, during completing questionnaire the respondents may be influenced by the environment of the restaurant. Also this research has been conducted in a limited area of Iran namely in a restaurant located in Boushehr. Therefore, in generalizing the findings of this research should be a little deliberation.

The findings of this research show that the five dimensions of service quality (tangible factors, reliability, responsiveness, assurance and empathy) affect the brand equity of the fast food industry only by 17 percent. This result indicates that 87 percent of the factors influencing the brand equity are related with the factors and variables to which were not paid attention in this research. Therefore, it is recommended that in the future researches the researchers examine other factors and variables that can influence the brand equity.

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