

Intellectual Capital : An empirical study of Non-Profit Organizations

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ABSTRACT

In today's knowledge based economy, there is a growing demand for the intellectual capital. In order to procure and retain the talent, for-profit organizations are shelling out huge amount of money and also showing them the bright career paths. This is standing as tough and challenging task to the not for profit organizations to procure and retain the talent. The present study is done in 12 NPO's in Twin Cities of Greater Hyderabad and Secunderabad, Andhra Pradesh, where there is a quite good amount of the human capital and also focused on attracting and retaining this talent. The study was conducted by administering the questionnaire on the employees of these NPO's and the results show that effective human capital, structural capital and relational capital are contributing factors to these not for profit organizations in achieving good recruitment and retention rates.

Introduction

The famous phrase of Sir Francis Bacon "Knowledge is power" resonates with even more pertinence in today's knowledge economy. Researchers have highlighted the importance of knowledge as a key organizational resource that can lead to competitive advantage for an organization (Allee 1999; Wall et al. 2004; Wright et al. 2001). Wealth and growth in today's economy are primarily driven by intangible assets. These assets, often described as intellectual capital, are being recognized as the foundation of individual, organizational and national competitiveness in the twenty-first century (Wigg, 1997; Bounfour and Edvinsson, 2005).

Intellectual Capital is often described as the difference between what a firm's market value and the cost of replacing its assets. Therefore, this (often positive) difference can be described as "those things that we normally cannot put a price tag on" such as expertise, knowledge, and a firm's organizational learning ability. Stewart (1997) defines IC in terms of organizational resources relating to wealth creation through investment in knowledge, information, intellectual property, and experience, while it is defined by Edvinsson and Malone (1997a) as the possession of knowledge, applied experience, organizational technology, customer relationships and professional skills that provide a competitive edge in the market. Edvinsson and Sullivan (1996) puts

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it as “knowledge that can be converted into value”. The intangible assets seldom affect performance directly. Instead, they work indirectly through relationships of cause and effect (Kaplan and Norton, 2004). As noticed by Pike et al. (2002), “as the business society is developed, the key step in value creation has ascended an intellectual staircase”. Though the literature presents the various classifications for intellectual capital convergent taxonomy extracts three elements that are proposed as encompassing intellectual capital: i) Human Capital, ii) Structural Capital, and iii) relational capital.

Human capital is the primary component of intellectual capital (Edvinsson and Malone, 1997; Stewart, 1997; Bontis, 1998; Choo and Bontis, 2002). Human capital can be described as the firm’s collective capability to extract the best solutions from the knowledge of its individuals. It subsumes tacit knowledge, experience, competencies, and skills. On individual level, human capital is defined as a combination of four elements: (i) genetic inheritances; (ii) education; (iii) experience and (iv) attitudes about life and business (Hudson, 1993). The organizational perspective refers to human capital as “the source of innovation, strategic renewal and encapsulates the sheer intelligence of organizational members” (Bontis, 1998). The term human capital refers to the knowledge, seniority, mobility rate, skills, and experiences of the entire organization’s staff and management. Knowledge generation and transfer is an essential source of firm’s sustainable competitive advantage, but it entirely depends on the individuals’ willingness. As such, if the human capital can suggest the economic potential of individuals within a firm, it is also true that the outcomes are intimately connected to motivation. Therefore managing the motivation for the competitive advantage is also important aspect.

Structural capital refers to the firm’s organizational capabilities to meet internal requirements and also market requirements. It is like the skeleton of the organization which is made to face the challenges of the present market. It refers to the learning and knowledge enacted on daily activities. It includes the store houses of knowledge in organizations such as databases, process, strategies, organizational culture, publications, copy rights, etc. The pool of knowledge that remains in an organization at the end of the day after individuals within the organization have left represents the fundamental core of SC (Roos et al. 1997).

Relational capital refers to the end-user’s satisfaction and loyalty to the organization. It is the knowledge engrafted in relationship with any stake holders that influences the organization’s life. For any business to be growing strong and healthy stake holders are the necessary condition. The saying “customer is the king” is the clear indication of importance of relationships in the business. Relational capital can be measured as a function of longevity (Bontis, 2002), while marketing relationship literature argues that long lasting relationships are a source of competitive advantage (Håkansson and Snehota, 1995). According to Kaplan and Norton (1996, 2004) internal customer satisfaction, motivation and commitment has greater influence on the external customer satisfaction, loyalty and retention which leads to firms higher productivity.

Non Profit Organization

The non-profit sector, as a subset of civil society, is a collection of organizations that conform to several criteria: an institutional presence and structure; institutionally separate from the government; not profit-seeking in purpose; self-

governing and involving some degree of voluntary participation, hence justifying the oft-used term, 'voluntary sector' (Salamon, Anheier, List, Toepler, Sokolowski and Associates, 1999). As the number and scale of NPOs has substantially increased, due to the increased social needs and also Government support to the private parties by to run their NPO's with lot of provisions, NPOs are competing with each other for volunteers, employees, funding and donations. Due to the concept of Corporate Social Responsibility initiative by the for –profit organizations, NPOs are acting very much like for-profit organizations, and the distinction between these organizations continues to be blurred (Ryan, 1999; Weisbrod, 1998).

Intellectual Capital in NPOs

Although Intellectual Capital was firstly developed as a framework to analyze the value contribution of intangible assets in for-profit organizations (Roos, Bainbridge and Jacobsen, 2001), it is important in NPOs, where maximizing profits is not the primary objective. In NPO's Revenue is raised from various sources which include consumers of services, membership fees, fundraising, government funds, interest or rents from investments and many others (Lyons, 2001). The ability of NPOs to achieve their objectives therefore depends almost entirely on the knowledge, skills and experience of their paid employees and volunteers (Hudson, 1999). Therefore NPO's invest in people rather than in profits. But the kind of strategies that the NPO's are adapting are being considered as ineffective by many and the strategies are considered to be having a shortfall for competent management. This shortfall needs to be rectified through the lens of Intellectual Capital. Because it stresses competence-enhancement, and not cash flow improvement (Mouritsen, 1998). It focuses on

processes, not financial results (Edvinsson and Malone, 1997b). It concentrates on intangible resources, not tangible resources (Stewart, 1994). IC promotes the creativity possessed by all organizational members to underpin the future non-financial prospects of an organization (Mouritsen, 1998). Therefore, IC can easily fit into NPOs where the primary objectives of NPOs are 'social' rather than 'economic' (Hudson, 1999; Ryan, 1999). Unlike for-profit management techniques, an identity threat to NPOs is preventable if IC is used as a strategic tool in NPOs. A greater emphasis on for-profit management practices in NPOs is therefore expected to foster efficiency and effectiveness (Alexander, 2000; Courtney, 2002; Sawhill and Williamson, 2001). Thus, NPOs are increasingly being forced to adopt monitoring and evaluation processes such as business process re-engineering (BPR), quality management systems and benchmarking as a result of being held accountable to funding and regulatory bodies (Courtney, 2002).

Methodology

The present study aims at bringing out the importance of Intellectual Capital in Non Profit Organization and also what makes the organizations to retain or attract the intellectual capital in the non profit organizations. To this end this study is carried out in 12 NPO's in and around twin cities of Greater Hyderabad and Secunderabad in Andhrapradesh in India. The selection of NPO's includes, educational sector, hospitality sector, service sector and government agencies. This has resulted in collecting the opinions of the employees from various sectors.

Scale development and validation

A pilot study was conducted with 12 NPO's in and around twin cities of Greater Hyderabad and

Secunderabad using a structural interview schedule with a 53-item scale, developed exclusively. The items were measured with a five point Likert scale (where 5=strongly agree and 1= strongly disagree). A principal component analysis with Varimax Rotation was conducted. Since the Principal components Analysis (PCA) is a technique for simplifying a data set, by reducing multidimensional data-set to lower dimensions for analysis, it is appropriate to use this technique here.

The factor loadings were shown in Table 1. The factors with factor loadings 0.60 were considered as significant under each dimension. Coefficient Alpha is the basic statistic for determining the reliability of a measure based on internal consistency (Churchill,1979). The Cronbach Alpha values were calculated for logical group of factors with factor loadings 0.60 in each component. The Eigen values of selected factors were close to 1. Results of the exploratory factor analysis, revealed 34 significant perception items as shown in table 1. The total variance explained by 34 items was 70 percent. Cronbach Alpha values are as shown in the table 2. The reliability test indicates that, values are highly significant (> .7) for three dimensions namely structural capital, human capital and relational capital.

Discussion

Of the 53 items tested, 34 items had a high loading on the extracted factors (factor loadings above 0.60) the following items loaded under the dimension of human capital; dedication to hire the best candidates, employees consistently perform the best, employees do the work with much energy, employees are most ideal, employees are satisfied with the organization, individuals learn from the others, etc.

Under the second dimension (structural capital) the following items were loaded; organization as a bureaucratic nightmare, organization supports innovation, market share has been increasing, company supports development of new ideas, organization gets a sense that it is getting most out of their employees, etc.

Under the third dimension (relational capital) the following items were loaded; maintains value added service to the customers, employees thrive to satisfy the customers, employees find what do their customers want, develop more new products to meet the needs of the industry, customers are loyal to the company, etc.

Scale validity

Discriminant validity is the extent to which the measure is indeed novel and not simply a reflection of some other variable. Discriminant validity is indicated by “predictably low correlations between the measure of interest and other measures that are supposedly not measuring the same variable or concept”. To check for discriminant validity we conducted a correlation matrix as suggested by Churchill, 1979, the matrix is as shown in table 3. An analysis of the correlation matrix indicates that the factors human capital, structural capital and relational capital does not have any significant correlation coefficients with any other factors. This indicates that the proposed scale has discriminant validity.

Table 1 : Rotated Component Matrix^a

	Component		
	1	2	3
Our recruitment program is comprehensive; we are dedicated to hiring the best candidates available.	.768		
Our employees consistently perform at their best.	.725		
Employees generally don't just do things without much energy.	.798		
The employees of our firm are considered creative and bright.	.675		
Our business planners are continually on schedule with their new business development ideas.	.765		
The firm supports our employees by constantly upgrading their skills and education.	.854		
Our employees are widely considered as the best in the whole industry.	.789		
Competence of our employees is most ideal.	.845		
Individuals learn from others.	.642		
Our employees are satisfied with our organization.	.865		
We have relevant information about our employees available to all.	.654		
This organization is not a "bureaucratic nightmare".	.875		
We implement a large portion of our great new business ideas.	.843		
The systems and procedures of the organization support innovation.	.789		
We have succession or training programs in our company to replace the leaving employees.	.764		
Our market share has been continually improving over the past few years.	.721		
Employees are excited to voice their opinions in group discussions.	.713		

The time it takes to complete one whole transaction has been decreasing over the past few years.	.690		
Our company supports the development of new ideas and products.	.682		
Our organizational structure keeps employees from being too far removed from each other.	.670		
The organization gets the sense that it is getting the most out of its employees.	.662		
The organization's culture and atmosphere is supportive and comfortable.	.651		
The firm gets the most out of its employees when they cooperate with each other in team tasks.	.642		
We have minimized the time taken to resolve a customer's problem	.620		
We have continually been improving our revenues with more customers.	.611		
Our organization thrives on maintaining positive value-added service with customers.	.888		
We capitalize on our customers' wants and needs by continually striving to make them satisfied.	.873		
We get as much feedback out of our customers as we possibly can under the circumstances.	.813		
We feel confident that our customers will continue to do business with us.	.768		
We continually meet with customers to find out what they want from us.	.766		
We generally care about what the customer thinks or wants from us.	.723		
Our company develops more new ideas and products in the industry	.701		
The longevity of the relationships we have with our customers is admired by others in the industry.	.680		
Our customers are loyal to our company.	.654		

Table 2 :

S.No	Dimension	Items	Cronbach Alpha
1	Human capital	a) Our recruitment program is comprehensive; we are dedicated to hiring the best candidates available. b) Our employees consistently perform at their best. c) Employees generally don't just do things without much energy. d) The employees of our firm are considered creative and bright. e) Our business planners are continually on schedule with their new business development ideas. f) The firm supports our employees by constantly upgrading their skills and education. g) Our employees are widely considered as the best in the whole industry. h) Competence of our employees is most ideal. i) Individuals learn from others. j) Our employees are satisfied with our organization. k) We have relevant information about our employees available to all.	0.76
2	Structural Capital	a) This organization is not a "bureaucratic nightmare". b) We implement a large portion of our great new business ideas. c) The systems and procedures of the organization support innovation. d) We have succession or training programs in our company to replace the leaving employees. e) Our market share has been continually improving over the past few years. f) Employees are excited to voice their opinions in group discussions. g) The time it takes to complete one whole transaction has been decreasing over the past few years. h) Our company supports the development of new ideas and products. i) Our organizational structure keeps employees from being too far removed from each other.	0.82

		<p>j) The organization gets the sense that it is getting the most out of its employees.</p> <p>k) The organization's culture and atmosphere is supportive and comfortable.</p> <p>l) The firm gets the most out of its employees when they cooperate with each other in team tasks.</p> <p>m) We have minimized the time taken to resolve a customer's problem</p> <p>n) We have continually been improving our revenues with more customers.</p>	
3	Relational Capital	<p>a) Our organization thrives on maintaining positive value-added service with customers.</p> <p>b) We capitalize on our customers' wants and needs by continually striving to make them satisfied.</p> <p>c) We get as much feedback out of our customers as we possibly can under the circumstances.</p> <p>d) We feel confident that our customers will continue to do business with us.</p> <p>e) We continually meet with customers to find out what they want from us.</p> <p>f) We generally care about what the customer thinks or wants from us.</p> <p>g) Our company develops more new ideas and products in the industry</p> <p>h) The longevity of the relationships we have with our customers is admired by others in the industry.</p> <p>i) Our customers are loyal to our company.</p>	0.76

Table 3 :

Correlations

		factor1	factor2	factor3
factor1	Pearson Correlation	1	0.26	.078
	Sig. (2-tailed)		.000	.002
	N	100	100	100
factor2	Pearson Correlation	0.26	1	.178
	Sig. (2-tailed)	.000		.042
	N	100	100	100
factor3	Pearson Correlation	.078	.178	1
	Sig. (2-tailed)	.002	.042	
	N	100	100	100

** . Correlation is significant at the 0.01 level (2-tailed).

Conclusion

If an Entrepreneur loses everything (Money, Material, Infra Structure etc.,) but is left with the human capital that s/he has, s/he will be able to rebuild the business to the desired level that one wants. That is the power of the intellectual capital in the organization. And for this there is heavy demand for the intellectual capital in for profit and not for profit organizations. Thus it became a huge challenge for the NPO to attract and retain such intellect. The study helps us to identify what can a NPO do in order to attract talented pool and retain them while standing against the competitors and also from for profit organizations.

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