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Linking Competitive Strategies with Human Resource Information Systems (HRIS)

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Abstract: : *In today's fast-paced economy, competitiveness is inevitable in highly dynamic and uncertain environments and an issue of services and products oriented business organizations. Much attention has been directed to a better service and the best product and how this can be achieved through utilizing the human resources. This paper identifies the competitive strategies concepts and models, competitive advantages gained from HRIS and the linkage of these two approaches that have a significant impact on the employee's performance. Understanding how HRIS is linked up with competitive strategies has become a major area of research in the field of human resource strategic management. Finally a summary of interaction between competitive strategies and HRIS is presented and a general discussion and recommendations have been drawn.*

Keywords: *Competitive Strategy, Competitive Advantage, HRIS, Cost Leadership, Differentiation*

1 Introduction

The major challenges of today's business firms include survival, profitability, ensuring continued growth and meeting the expectations of large number of stakeholders. These challenges are ultimately implying the urging needs of the firms to gain competitive advantage. Coff(1994) argues that human assets are a key source of sustainable advantage because of causal ambiguity and systematic information making them inimitable. Guest (1990) says that if management trust their workers and give them challenging assignments, workers in return will respond with high motivation, high commitment and high performance. Gratton (1997) identified six factors for success: the commitment of top management; the motivation and aspirations of employees; the core capabilities of the management team; the team's aspiration; its ability to build and maintain alliances; and the integration of the business into a global network. What does that mean to us? Its means that sources of competitive advantage that are leveraged from making sustainable competitive strategies have shifted from financial resources to technology resources and now to human capital. In other words, success does not depend primarily on the size of the budget or the products supporting technologies. It really depends on employee's attitudes, competencies and skills; their ability to generate commitment and trust, communicate aspirations and work in complex relationships. Now we know one of the sources of competitive advantage which is the employees, then what do we have to do to achieve competitive advantage through them? The answer lies in competitive strategy and human resource practices which is shifted to human resource information systems.

1.1 Rationale of the Study

Before developing a linkage between competitive strategy and HRIS practices, there must be a rationale for that linkage. This rationale gives us a basis for predicting, studying, refining, and modifying both strategy and practices in specific circumstances. Consistent with previous research, the rationale developed is based on what is needed from employees apart from the specific technical skills, knowledge, and abilities (SKAs) required to perform a specific task."' Rather than thinking about task-specific SKAs, then, it is more useful to think about what is needed from an employee who works with other employees in a social environment. These needed employee behaviors are actually best thought of as needed role behaviors. In spite of going through several studies, directly relating to Human Resource Management Systems and the proper use of HR in the context of firms of Bangladesh, it is very scarce to see research works on the area this work is based on. Most of the works on Human Resource Management practices in Bangladesh have tried to show how human resource management can improve the firm's performance and employee satisfaction. The issues of information system on organization's human resource management and development are highly neglected in Bangladesh till yet. Again the proper linkage of competitive strategies with HRIS is not overseen.

1.2 Objectives of the Study

The purpose of the study is to find out and showhow HRIS is linked with organization's competitive strategies. The study further reveals the strategic importance of Human Resource Information System in Human Resource development especially of Bangladeshi firms.

2 Literature Review

A company's strategy consists of the competitive moves and business approaches that managers are employing to grow the business, attract and please customers, compete successfully, conduct operations, and achieve the targeted levels of organizational performance (Thompson, Strickland & Gamble, 2008). A competitive strategy involves a series of systematic and related decisions that give a business a competitive advantage over other businesses (Schuler & Jackson, 1987; Dowling & Schuler, 1990). A company achieves sustainable competitive advantage when an attractive number of buyers prefer its products or services over the offering of competitors and when the basis for this preference is durable (Thompson, Strickland & Gamble, 2008). The concept of business competitive strategy is primarily derived from Porter's (1980, 1985) classifications of generic strategies. He argued that superior performance could be achieved in a competitive industry by pursing a generic strategy, which he defines as the development of an overall cost leadership, differentiation, or focus approach to industry competition. Miles and Snow (1984) classified business strategies into three types--defender, prospector, and analyzer--and proposed corresponding strategic human resource systems. Schuler and Jackson (1987) used labels slightly different from those Porter to classify three types of business competitive strategies: cost reduction, innovation, and quality enhancement. Schuler and Jackson (1987) also designated different types of employee behavior and human resource management methods for each competitive strategy. With the three types of Schuler and Jackson's competitive strategy, Dyer and Holder (1988) reclassified these as inducement, investment, and involvement, respectively. Dowling and Schuler (1990) combined the respective human resource strategies of utilization, facilitation, and accumulation.

Due to the increasing use of computerized information system in the industrial operations of developed economies, HR functions of enterprises got used to information systems highly during the 1980's. Human Resource Information Systems (HRIS) were primarily seen as a sub function of Management Information Systems (MIS) which support the HR functions of an organization. An HRIS (also known as a human resource management system or HRMS) can be as informal as the payroll records and time cards of a small business, for the vast majority of organizations, corporate success will increasingly depend on the coordinated, strategic management and integration of the organization's human resources and information technology (Kovach and Cathcart, 1999). Achieving this strategic coordination requires those responsible for developing, implementing, operating, and maintaining an HRIS to have a broad knowledge of the organization's human resource programs, the relationship between human resource programs and overall strategic planning, and the potential inherent in computer and data technology (Rampton, Turnbull, & Doran 1999).

HRIS is a system used to acquire, store, manipulate, analyze, retrieve, and distribute information regarding an organization's human resources. An HRIS is not simply computer hardware and associated HR-related software. Although an HRIS includes hardware and software, it also includes people, forms, policies and procedures, and data(Kavanagh &Thite, 2009).It is not technology, but the art of human and humane management" that is continuing challenge for executives in the 21st century (Drucker, Dyson, Handy, Saffo, &Senge, 1997). Similarly, Smith and Kelly (1997) believed that future economic and strategic advantage will rest with the organizations that can most effectively attract, develop, and retain diverse group of the best and the brightest human talent in the market place.

Several recent studies have documented the fact that, while the HR function has become more strategic in its orientation, it is not yeta full strategic partner in many firms (Lawler & Boudreau, 2009; The McKinsey Quarterly, 2006; Weis & Finn, 2005). Accurate andeffective line of sight will not occur without an ongoing dialog among all those responsible for strategy formulation, implementation, and evaluation, including HR professionals.

A study on the adoption of HRIS among the 500 listed firms of Singapore is conducted by (Teo, Soon and Fedric 2001). This study shows that most of the firms (60.3%) adopted HRIS still use it for traditional purposes. A very small percentage (7.9%) uses HRIS for strategic purposes. Another similar study is conducted by Lin, C.Y.Y., (1997) on the adoption of HRIS in Taiwan. For different level of HRIS (EDP, MIS, DSS), this study finds that management information system is the most sought area by the Taiwanese firm for HRIS implementation.

Effective management of a firm's human resources is a key source of competitive advantage for organizations. Increasingly, the delivery, support and management of HR all depend on technology--specifically, human resource information systems (HRIS) (Johnson &Gueutal, 2010).

Existing literatures prove that application of HRIS in different contexts is one of the highly researched issues across the different countries of the world. All studies provide the message that the central usage of HRIS is the efficient management of the human resource functions of any organization.

Managers have a fairly positive view of the impact of the HRIS on organizational effectiveness with the greatest degree of confidence being placed on the impact of HRIS on time management and on HR functions. The results confirm that a well implemented and managed HRIS enables readily available information to be translated into more information sharing, greater knowledge transfer and management. Consequently, the HRIS has the potential to enhance the speed and quality of decision making and the realization of the HR strategy, thereby enhancing organizational effectiveness (Kumar &Parumasur, 2013).

Beyond understanding the needs of the business, HR professionals can increase their strategic value, and therefore the value of HRM practices, by improving their competencies in three primary areas: organizational design, managing change, and measuring performance (Boudreau & Ramstad, 2005; Cascio, 2005; Kates, 2006; Lawler et al., 2004; Ulrich & Beatty, 2001).

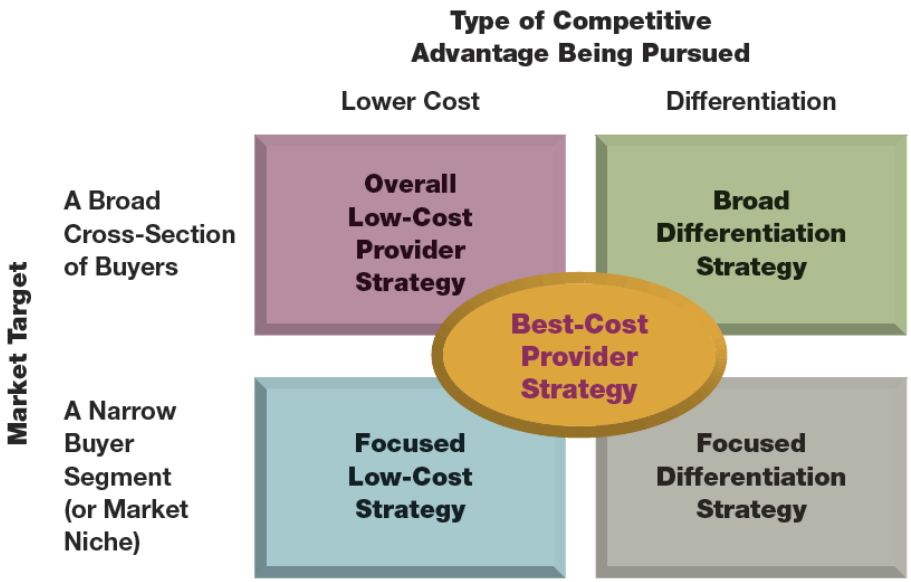
The necessity to integrate Human Resource Management (HRM) with information system has become sine qua non as modern firms are realizing that their people and information resources are part and parcel for their survival. That is why; Human Resource Information Systems (HRIS) is now used extensively in all organizations irrespective of its size, tenure of establishment, complexities of operations etc.(Bhuiyan&Rahman, 2014).

2.1 The five generic competitive strategies

The five generic competitive strategies which is an author-expanded version of a three-strategy classification discussed in Michael E. Porter, Competitive strategy. When one strips away the details to get at the real substance, the biggest and most important differences among competitive strategies boil down to (1) whether a company's market target is broad or narrow, and (2) whether the company is pursuing a competitive advantage linked to low costs or product differentiation. Five distinct competitive strategy approaches stand out:

1. A low-cost provider strategy-striving to achieve lower overall costs than rivals and appealing to a broad spectrum of customers, usually by underpricing rivals.
2. A broad differentiation strategy-seeking to differentiate the company's product offering from rivals' in ways that will appeal to a broad spectrum of buyers.
3. A best-cost provider strategy-giving customers more value for the money by incorporating good-to-excellent product attributes at a lower cost than rivals; the target is to have the lowest (best) costs and prices compared to rivals offering products with comparable attributes.
4. A focused (or market niche) strategy based on low costs-concentrating on a narrow buyer segment and outcompeting rivals by having lower costs than rivals and thus being able to serve niche members at a lower price.
5. A focused (or market niche) strategy based on differentiation-concentrating on a narrow buyer segment and outcompeting rivals by offering niche members customized attributes that meet their tastes and requirements better than rivals' products.

Each of these five generic competitive approaches stakes out a different market position. Each involves distinctively different approaches to competing and operating the business.



Source: Thompson, Gamble, Strickland, and Peteraf, Crafting and Executing Strategies, 19th Edition, Page: 128

A company can choose one of five competitive strategies to help it respond to the structure of its industry.

2.2 Competitive Advantages of Using HRIS

When a firm is implementing a value creating strategy not simultaneously being implemented by any current or potential competitors and when these other firms are unable to duplicate the benefits of this strategy, then we can say the firm has a sustained competitive advantage (Barney 1991).

Pfeiffer has issued sixteen practices of competitive advantage through people using HRIS as:

a. Employment security
b. Incentive pay
c. Participation and empowerment
d. Symbolic egalitarianism
e. Long-term perspective
f. Selectivity in recruiting
g. Employee ownership
h. Teams and job redesign
i. Wage compression
j. Measurement of practices
k. Cross-utilization & cross-training
l. High wage
m. Information sharing
n. Training and skill development
o. Promotion from within
p. Overarching philosophy

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3 Competitive Strategies vs. HRIS

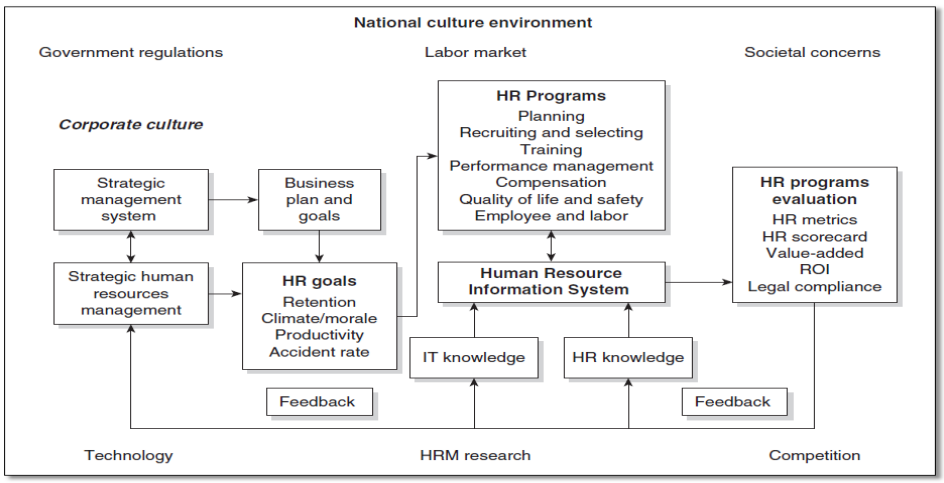
As competitive conditions grow increasingly turbulent, the importance of developing and sustaining a competitive advantage appears to be increasing exponentially. Mintzberg (1979) proposed the case for a contingency view of structure: there is not one best way to structure an organization; it all depends on the particular contingent circumstances facing the organization. These contingency variables included the age and size of the organization, the dynamism of the environment, the complexity of the tasks being performed, and the technical systems used in the core of the business. Different and coherent combinations of these variables mean that certain forms of organization are more effective than others (Bowman & Carter, 1995). Similarly, the strategy to achieve competitive advantage is not the same for all organizations.

Strategy is a rational decision-making process in which the organization's resources are matched with opportunities arising from the competitive environment. Decision makers must know what the complementary internal processes are that support the successful pursuit of a chosen strategy. The key implication is that each strategy is accompanied by a unique set of internal processes, and a strong alignment between strategy and these processes translates into successful performance (Kumar & Subramanian, 1998). The resource-based view emphasizes the role of internal capabilities (Wernerfelt, 1984; Barney, 1991; Peteraf, 1993). It is essential to implement the proper human resource strategy to accomplish a chosen competitive strategy (Boxall, 1998). An effective human resource strategy systematically coordinates all individual human resource systems and implements them so as to directly influence employee attitudes and behaviors in a way that helps a business achieve its competitive strategy.

3.1 Human Resource Information Management Infrastructure

Governance/accountability structure Organizations that have effectively implemented competencies on a corporate-wide basis have ensured that there is an appropriate project management, governance and accountability framework in place to support the development, maintenance and revision/updating of the competency profiles to meet changing demands.

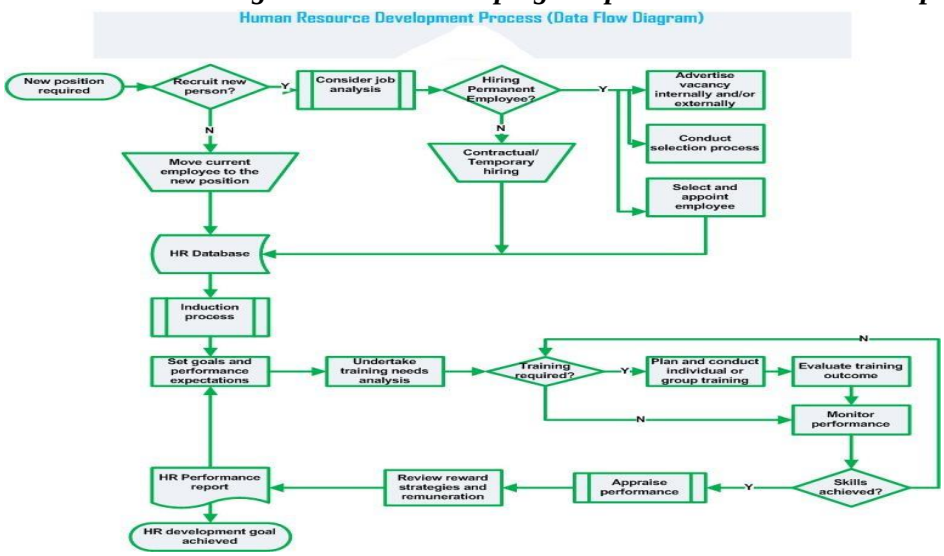
3.2 A Model of Organizational Functioning



The above mentioned figure depicts a model of an organizational system centered on HRIS. This modeldepicts the interrelatedness of the parts of an organization that can affect the functioningof the organization. It shows the interrelatedness between the strategic managementsystem, the strategic HRM system, and the performance goals, business and HR, that aregenerated during the strategic planning process. Note particularly how the business goalsdirectly affect the HR goals, and this relationship should be an ongoing process in an organization to make adjustments to either set of goals as needed. The HR goals drive the HR programs that provide management the tools for the efficient and effective use of employees. As will be emphasized throughout this book, the *alignment* between the strategic management system, the strategic HR management system, the business goals, the HR goals, and the HR programs is critical to the organization to maintain its competitiveness in its market (Evans & Davis, 2005; Huselid, Jackson, & Schuler, 1997).

There are other aspects of this model that are important. First, all the factors in the external environment will influence the internal functioning of the organization. The most important of these factors is national culture. National culture will affect all the factors in the external environment: government regulations, labor market, societal concerns, technology, HRM research, and competition. These factors in turn will have an impact on theorganization. Simple comparisons across various countries—for example, the United States, Australia, Europe, and China—on most of these six factors would provide significant differences on each of these external factors. We feel that these differences are important and have devoted a chapter to them. Second, the two-way arrow between the strategic management system and strategic HR indicates our understanding that this interaction will improve the functioning of the organization. Finally, note that corporate culture influences the entire internal operation of the organization. In the next section, the major themes of this book that are central to the operation of this model are discussed(Kavanagh &Thite, 2009).

3.3 How HRIS assists organization in developing HR process and thus link competitive strategies?



A Data Flow Diagram (DFD) is a graphical representation of the "flow" of data through an information system, modeling its process aspects. A DFD is often used as a preliminary step to create an overview of the system, which can later be elaborated. DFDs can also be used for the visualization of data processing (structured design).

A DFD shows what kind of information will be input to and output from the system, where the data will come from and go to, and where the data will be stored. It does not show information about the timing of process or information about whether processes will operate in sequence or in parallel (which is shown on a flowchart).

3.4 Leveraging HRIS for Competitive Advantage

Research shows that implementing HRIS can enhance a company's long-term productivity and profitability. And HRIS are not only increasing efficiency, they are also transforming the HR function. To help business leaders understand and manage these changes, this executive briefing highlights five keys to leveraging HR technology, an overview ofchallenges to be managed and a list of five trends to watch.Today's HR technology is moving rapidly to web basedsystems to deliver data and services suchas employee self-service (ESS), online recruiting,web-based training, online applicant testing andonline benefits management. Many organizationsnow support HR portals, which provide one pointof contact for a range of HR services. To betterleverage this technology, leaders must focus onthe underlying HR processes supported by HRIS.

3.4.1 Keys to pairing powerful technology with solid HR processes include the following**:**

1. Use new technology as an opportunity to change HR.
2. Make employees self-reliant for HR services.
3. Communicate with employees when monitoring performance.
4. Use more data to get more answers.
5. Pay attention to appearance and functionality.
6.

3.4.2 Five Trends to Watch

HR technology has already been instrumental in transforming the field of HR, and changes on the horizon have the potential for an even greater impact in the future. Some of the most important tech trends to follow are listed below.

1. Growth of social networking.
2. Expansion of compliance and reporting requirements.
3. More renting, less buying of services.
4. Greater use of business intelligence (BI) and dashboards.
5. Increasing HR data transparency, increasing privacy concerns.

It is obvious as we move into the 21st century that data will drive an increasing number of business decisions and strategies. HRIS is an excellent example of an area where businesses can capitalize not only on administrative cost savings, but also on leveraging a strategic advantage through information gathering, processing, and sharing.

The next logical step is for HRIS to become the mechanism for sharing information across an organization's functional areas. Future HRIS portals can be the one-stop shopping for most company-related transactions between employers and employees.

This would enable employees in different cities or even countries to have access to the same information. It would also allow for a scalable information system that would link employees to not only their own information, but relevant corporate information as well.

4 Summary and Conclusions

One factor that can set an organization apart from its competitors whether in services or products, in the private or public sector is its employees. The quality of the organization's employees, their enthusiasm, and their satisfaction with their jobs and the company all have a significant impact on the organization's productivity, level of customer service, reputation and survival. In other words, in a competitive environment, people make the difference. Human resources are a critical component in every area of the organization, from finance to sales to customer service to line management. Managers and supervisors in every department confront human resource issues every day and are responsible not only for interactions within their own department, but also interactions between departments. The primary function of human resources today is to ensure the effective and efficient use of human talent to accomplish an organization's goals and objectives. Using human resources as a competitive advantage means analyzing what factors are necessary for the organization's long-term success. Relevant areas to review include: organizational design, key work processes, teams, hiring effective employees, promotion strategies, defining competencies and performance measures, training and development programs for current job and preparation for future positions, reward and recognition systems, motivation and retention, employee perceptions and customer perception of the organization and employees. In order to formulate appropriate competitive advantage through the employee programs for an organization, it is first necessary to analyze the firm's competitive strategy or business strategy and organizational human resource practices following implementing HRIS. The organization should create a complete model of HRIS and employment relationship, also it should support long-term thinking, building 'core competencies' and also develop "sensing" capabilities. The future is essentially unpredictable, but the organization develops the capacity to sense the change. A central role of the personnel function to develop this capability to collect information about future trends in labor markets and skill sets, and in linking changes in aspirations, work practice and motivations without this insight, is leading the blind organization into the future. Successful companies know that there is a direct link between employee satisfaction and customer satisfaction. It is the responsibility of managers and supervisors to ensure those employees are motivated, productive and positive-if not enthusiastic-about their work. This means integrating HRIS practices with core business strategies like encouraging all departments to work together on "people" programs that bring value to the organization and improve productivity and quality in products and services. Positive human resources business programs translate into a positive financial impact on the organization. There are many organizations where the emphasis on human resources has made a difference in the performance of the organization. These organizations acknowledge the significance of their employees in making a difference in the company and providing the essential ingredient for its competitive advantage. Successful organizations do not isolate their "people programs". They consider them an integral part of their business strategy.

Corporate success entirely depends on strategic management and integration and proper use of the organization's human resources and information system effectively. Achieving this strategic coordination requires developing, implementing, operating, and maintaining an HRIS in order to have a broad based benefits through the organization's human resource programs, the relationship between HRIS and proper use of HR now has proved by their close association in this study.

5 Recommendations

For achieving a competitive advantage through the stakeholders connectivity with HRIS the following recommendations can be made:

- The firm should use an analytical framework for strategic management because it provides identification of the relationship between key variables that should be analyzed and assistance of the practitioners to analyze and initiate appropriate policy in their own context.
- As mentioned earlier technology is an important factor in achieving competitive advantage but is worthless without the knowledge and talent of the operators using it.
- The management should trust their workers and give them responsible and challenging assignments, workers in return will respond with high motivation, high commitment and high performance
- Choosing the right leaders. One feature of leadership style is its emphasis on the ability to generate commitment and enthuse others to innovate, to change and indeed to conquer new frontiers in the marketplace or on the shop floor.
- Providing good job descriptions and realistic targets and all required resources to achieve those targets.
- Designing an effective rewards system and annual increases.
- Making communication system effective and wide and easy procedures for individuals to raise grievances and receive reply.
- Management commitment to full employment means that if the job disappears through technological change or shutting down then the company will offer alternative employment or helping them to find another one.
- An annual statement of each employee's performance against set of objectives: this would include an assessment of progress, career ambitions and consideration of possible training.
- The organization effectiveness can be increased by improving the matching between what the organization requires of its employees and what they require of it.
- Therefore the organization should be able to link its strategy to individual objectives.
- The employer strategy should focus on creating competitive advantage through the employees and using the practices that support this strategy which include:
- Creating an attractive work environment
- Optimizing people resource levels
- Sharing information
- Developing capability
- Designing optimal work systems
- Aligning reward and recognition systems

Organizational competitive strategies, combined with HRIS will result in high employee satisfaction, high performance, longer tenure and willingness to accept change.

Finally, there are some recommendations that have been pronounced by (Ajuwon 2002) may prove very realistic in the perspective of Bangladesh. He asserts that HR should be proactive in the process and highlights three different perspectives for practical action:

Firstly, the process perspective: This continues for getting the fundamental building blocks (people processes) right and ensuring their relevance at all times. This demands close and detailed knowledge of HRIS processes and a commitment to improvement and efficiency. HRIS professionals need to understand their own objectives and the relationship with business strategy.

Secondly, the event perspective: This focuses on providing a framework for knowledge management. In other words, capturing the experience and information available in that harnesses the organization and making it available to individuals.

Finally, the cultural perspective: This acknowledges that HRIS has a pivotal role in the proactive engagement of the entire organization in a changing climate.

6 References

Becker, B. E., Huselid, M. A., & Ulrich, D. (2001).The HR scorecard: Linking people, strategy, and

Bhuiyan, M., &Rahman, M. (2014).Application of Human Resource Information System in the Firms of Bangladesh and Its Strategic Importance.World Review Of Business Research, 4(3), 95 – 105.

Boudreau, J. W., & Ramstad, P. M. (2005).Talentship, talent segmentation, and sustainability: A new HR decision science paradigm for a new strategy definition. Human Resource Management, 44(2), 129–136.

Bowen, D. E., & Ostroff, C. (2004). Understanding HRM-firm performance linkages: The role of the "strength" of the HRM system. Academy of Management Review, 29(2), 203–221.

Bowman, C., & Carter, S. (1995). Organising for competitive advantage. European Management Journal, 13(4), 423-433.

Boxall, P. (1998). Achieving competitive advantage through human resource strategy: towards a theory of industry dynamics. Human Resource Management Review, 8(3), 265-288.

Buller, P., &McEvoy, G. (2012). Strategy, human resource management and performance: Sharpening line of sight. Human Resource Management Review, 22(1), 43-56. doi:10.1016/j.hrmr.2011.11.002

capital to execute strategy. Boston: Harvard Business School Press.

Cascio, W. F. (2000). Costing human resources: The financial impact of behavior in organizations (4th ed.). Cincinnati, OH: South-Western College.

Cascio, W. F. (2005). From business partner to driving business success: The next step in the evolution of HR management. Human Resource Management, 44(2), 159–163.

Colbert, B. A. (2004). The complex resource-based view: Implications for theory and practice in strategic human resource management. Academy of Management Review, 29(3), 341–358.

Drucker, P. F., Dyson, E., Handy, C., Saffo, P., &Senge, P. M. (1997).Looking ahead: Implications of the present.Harvard Business Review, 75(5), 18-24.

HRIS effectiveness as determinants of firm performance.Academy of Management Journal, 40, 171–188.

Evans, W. R., & Davis, W. D. (2005). High-performance work systems and organizational performance:

Fitz-Enz, J. (2000). The ROI of human capital: Measuring the economic value of employee performance.

Fitz-Enz, J. (2002). How to measure human resource management (3rd ed.). New York: McGraw-Hill.

Huselid, M. A., Becker, B. E., & Beatty, R. W. (2005).The workforce scorecard: Managing human

Huselid, M. A., Jackson, S. E., & Schuler, R. S. (1997). Technical and strategic human resource management

Johnson, R., &Gueutal, H. (2010).Leveraging HR Technology for Competitive Advantage.SHRM Foundation Executive Briefing.

Kates, A. (2006). (Re)designing the HR organization. Human Resource Planning, 29(2), 22–30.

Kavanagh, M., &Thite, M. (2009).Human resource information systems. Los Angeles: Sage.

Kovach, K., Hughes, A., Fagan, P., &Maggitti, P. (2002).Administrative and Strategic Advantages of HRIS.Employ. Relat. Today, 29(2), 43-48. doi:10.1002/ert.10039

Kovach, KA. &Cathcart, CEJr. (1999). Human resource information systems (URIS): Providing business with rapid data access, information exchange and strategic advantage. Public Personnel Management, vol. 28, no.2, pp. 275-282.

Kroenke, D., & Hatch, R. (1994).Management information systems. New York: Mitchell McGraw-Hill.

Kumar, K., & Subramanian, R. (1998). Porter's strategic types: differences in internal processes and their impact on performance. Journal of Applied Business Research, 14(1), 107-125.

Kumar, N., &Parumasur, S. (2013). Managerial Perceptions of the Impact of HRIS on Organizational Efficiency.Journal Of Economics And Behavioral Studies, 5, No. 12(ISSN: 2220-6140), 861-875.

Lawler, E. E., III, & Boudreau, J. W. (2009). Achieving excellence in human resources management: An assessment of human resource functions. Stanford, CA: Stanford Business Books.

Lawler, E. E., III, Levenson, A., & Boudreau, J. W. (2004). HR metrics and analytics: Use and impact. Human Resource Planning, 27(4), 27–35.

Mintzberg, H. (1979). The Structuring of Organizations, Prentice-Hall.

New York: AMACOM/American Management Association.performance. Boston: Harvard Business School Press.

Rampton, GM., Turnbull, IJ., and Doran, A. (1999). Human Resource Management Systems: A Practical Approach, 2nd Edition, Thomson CARSWELL, Canada.

Schuler, R., & Jackson, S. (1987). Linking Competitive Strategies with Human Resource Management Practices.The Academy Of Management EXECUTIVE, 1(3), 207-219. Retrieved from http://www.jstor.org

Shiri, S. (2012).Effectiveness of Human Resource Information System on HR Functions of the Organization—A Cross Sectional Study.US-China Education Review, A 9(1548-6613), 830-839.

Smith, A. F., & Kelly, T. (1997).Human capital in digital economy. In F. Hesselbein, M. Goldsmith, & R. Beckhard (Eds.), The organization of the future (pp. 199-212). San Francisco: Jossey-Bass.

Teo, TSH, Soon, LG., &Fedric, SA. (2001). Adoption and Impact of Human Resource Information Systems (HRIS).Research and Practice in Human Resource Management, vol. 9, no.1, pp. 101-117.

The McKinsey Quarterly (2006). Improving strategic planning: A McKinsey survey. Atlanta: McKinsey & Company (July/August).

The mediating role of internal social structure.Journal of Management, 31, 758–775.

Thompson, A., Strickland, A., & Gamble, J. (2008).Crafting and executing strategy. Boston: McGraw-Hill/Irwin.

Ulrich, D., & Beatty, D. (2001). From partners to players: Extending the HR playing field. Human Resource Management, 40(4), 293–307.

Weis, D. S., & Finn, R. (2005). HR metrics that count: Aligning human capital management to business results. Human Resource Planning, 28(1), 33–38.

Wernerfelt, B. (1984). A resource-based view of the firm. Strategic Management Journal, 5, 171-180.

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