A STUDY ON ROLE OF INFORMATION TECHNOLOGY IN HR DEPARTMENT.

Chirangini Parmar (Student, MBA Human Resource)
Mahenoor Memon (Student, MBA Human Resource)
Prof. Sugandha Sinha (Asst. Professor, MBA Human Resource)
Parul Institute of Management (Vadodara)

Abstract
In the recent era for technological upgradation and implementation for various activities, IT is playing very important and crucial part in all the organization’s. Our world has become a global village. The improved means of communication, technological advancements, computer and internet have brought the horizons closer and changed the functioning of the business world in a great way. The impact of technology has been observed in all areas of business including HR practices. Human Resource Management (HRM) is no longer limited to recruitment and training. It has become an indispensable part of every organization. Technology and HRM both are closely associated to each other. IT has significant impact on increasing the efficiency of recruitment, maintenance, development, training and decision-making functions. The present paper is an attempt to study the impact of information technology (IT) on HR department.

Key Words- Technology, Information Technology (IT), Human Resource Department (HR), Recruitment, Training, Development, HRIS.

INTRODUCTION
In modern era of globalization, HR department plays an important role globally. IT plays an important role in providing data from any corner of the world. As time is passing every organization is upgrading its norms of working and looks out ways that can ease their work and also provide effective information in accurate or minimal time period. Industries have adopted many of new trends to keep upgrading themself according to demand and retain their place in the market. HR professionals transformed from traditional administrative to more strategic roles during the high-tech era from 1990. Technology makes the tasks of recruitment, payroll and performance evaluation more manageable and allows HR staff members to better engage with the
company's employees. Human Resources are the most significant and vital for the success of any organization. The roles and skills of HR managers have grown considerably in recent times due to the adoption and use of new technologies. The managers are now able to perform the traditional functions of procurement, maintenance, development and utilization more effectively and efficiently. The human resource managers can now take up more challenging roles in the organizations. The growing use of information technology in human resource has significantly increased the efficiency of HR management activities and processes, increased their speediness and reduced cost. It has created an effective and efficient communication system, employee engagement, talent management, employee development, performance management, training and learning. In addition, the use of HRIT provides value to the organization and raise HR professionals’ status in the organization.

The traditional HRM style mainly focused on supportive personnel activities for a company including collecting employee information, monitoring individual performance, and implementing organization policies. The new role of HR manager should understand the business strategy and formulate the corresponding management strategy on human resources to improve delivered service, and act as a strategy partner with top management team.

In this paper, we used HR related data from to study the impact of IT on Human Resource Department. We have collected data from candidates to study how this IT has changed the whole HR Practices and functions. Our goal is to know how positively Information technology have effect on HR department and how all the functions of HR is become easy with the use of different types of software.

ABOUT INDUSTRY/SECTOR

Human Resource Management (HRM) includes activities such as recruiting, training, developing and rewarding people in the organization. HRM must aim at achieving competitiveness in the field of HR by providing constant educational and training programs for the personal and professional development of the employees of the organization.

It has been conventionally proved that Information and Communication Technology (ICT), such as the Internet, mobile communication, new media, and such in HR can greatly contribute to the fulfilment of personnel policies of the organization. Technological advancement can have a huge impact on the HR department of an organization. It allows the company to improve its internal processes, core competencies, relevant markets and organizational structure as a whole.

Human Resource must mainly be focused on the strategic objectives of the organization. These strategies must be led to incorporate an IT strategic plan for the organization. These are activities related to any development in the technological systems of the entity, such as product design (research and development) and IT systems.
Information Technology may have a greater impact on organizations that exist in a dynamic environment. This will lead to greater efficiency and effectiveness of the Human Resources. Hence, utilizing IT application for database management and advances recruitment system will increase the efficiency of the business.

RESEARCH METHODOLOGY

- **UNIVERSE:**
  - Employees working in any organization within Vadodara and Students of HR department.

- **RESEARCH DESIGN:**
  - Descriptive Research Design is used to study such topic.
  - Descriptive research is defined as a research method that describes the characteristics of the population or phenomenon that is being studied. This methodology focuses more on the “what” of the research subject rather than the “why” of the research subject.

- **SOURCE OF DATA COLLECTION:**
  - The primary as well as secondary sources were used for collection of data.
  - Primary data was obtained through questionnaires filled by 40 employees/students.
  - **Primary Data:** Questionnaire
  - **Secondary Data:** Books and Website.
    - Primary as well as Secondary data was collected.
    - Instrument used for Data Collection:

The instrument used for data collection is Questionnaire.

- **SAMPLE DESIGN:**
  - Sample Size: 40
  - Sample Location: Vadodara

- **ANALYTICAL TOOL:**
  - Pie Chart, Bar Graph
• **LIMITATIONS OF THE STUDY:**

- Collecting Data properly from the employees become difficult due to time constraint and the Companies policies..
- Busy schedule of employees also effected to some extend.
- The study was based on sample hence results were not fully absolute

**LITERATURE REVIEW**

1) **The role of information systems in human resource management.**

Persistency of the organization, competitive advantage and realization of extra profit, in contemporary environment, are directly connected with balance of the resources available to the firm. One of the key issues of successful business is human resource management and that process is under great influence of modern information technology. Human Resources Information Systems (HRIS) are systems used to collect, record, store, analyze and retrieve data concerning an organization's human resources, but it is not merely reduction of administrative procedures. The importance of HRIS system is multifaceted, ranging from operational assistance in collecting, storing and preparing data for reports, simplifying and accelerating the processes and controlling the available data, reducing labour costs for HR departments, and providing timely and diverse information to the management of the company, based on which it is possible to make quality strategic decisions related to human capital. The aim of this paper is to highlight the importance of HRIS and to give a comprehensive insight of the subject. Special focus in the paper will be on companies in Serbia, which have started to apply this concept, but in most situations not widely, but just partially. They must be aware that positive results can be expected only if this subject is approached in the right way.

2) **Role of IT in HRM: Opportunities and Challenges**

Technology in the present era has shoot up over all the essential business activities. Technological innovations are shaping a new world towards swift advancement. One may utilize the full potential of human resource of the organization by introducing the concept of information technology in their HRM system. This paper encloses the role of IT in major dimensions of the HRM function of the organization. It also focuses on the opportunities and challenges faced by the organizations in implementing IT across HRM function. Several critical areas of HR function are also highlighted where IT has been implemented by various organizations successfully.
3) The impact of IT on the HR functions transformation

The focus of this research is to understand the changing role of HR professional through technological advancements. This includes looking into recruitment technologies which reduce the amount of time it takes recruiters to go through every application. The research shows that the role of HR will shift towards training, development and strategic roles for the most part, while also concentrating on reward systems and benefits for the employees. The lack of data on HRM and the lack of HR technologies in Kosovo, make it difficult to understand how citizens of this country view the role of an HR manager. Lastly, it gives recommendations on how this situation can improve in Kosovo and why the use of HR technologies is important in helping to shift these new roles of HR professionals, in the benefit of them but also for the organization and employees.

4) The Role of Information Systems in Human Resource Management

Accelerated investment and innovation in information technology (IT) offers prospects for conducting business in ways that are radically different from the past. Despite the growing presence of IT within organizations, however, we do not have a clear understanding of how IT impacts the role of professionals. We address this issue by investigating how jobs in one professional occupational segment, human resources (HR) professionals are influenced by extensive use of IT within the human resource department. Specifically, we examine how HR professionals handle HR information as well as the expectations placed on them resulting from an increased reliance on IT. Our findings suggest that IT enables HR professionals to more efficiently access and disseminate information while it also influences what is expected of them. Implications and future directions are discussed.

5) Human Resource Technology and the Changing Role of Human Resource Professionals

This study examines HR function, HR function transformation and Human Resource Information Technology (HRIT), by investigating the role of HRIT playing in HR function transformation process, and the interrelationship between them. This research reveals that HRIT not only is considered to support HR professionals to be strategy partner of business but also boosts a wide level of participation into HR practices. Academic researches consider the usage of HRIT focuses on supporting strategic HRM, but the analysis of practical evidences shows that most companies are still in middle of the transformation process where HRIT is shifting HR function from transaction activities to strategic ones.
PROBLEM STATEMENT

HR is no longer now restricted to procurement of manpower. HR professional are rather involved in complete transformation of HR processes with the use of latest technology. The use of IT in HR is likely to reduce cost, improve service, and achieve effectiveness. So our study is focusing on how IT has effect on HR department.

OBJECTIVE OF THE STUDY

- To gather the viewpoint of people on what they think, whether IT plays an important role in organization or not.
- To know the impact of Information technology on HR department.
- Visualize the future aspect of HR department.
- To know which information technologies are used now a days in HR departments.
- Find out whether involvement of IT in HR department is boon or ban.

HYPOTHESIS

H0 = The future use of IT in HR department will not increase.
H1 = The future use of IT in HR department will increase.
H0 = IT has no significant impact on employee performance.
H1 = IT has significant impact on employee performance.

DATA INTERPRETATION

Note~The data represented below is pure and taken from primary data we have collected through google form questionnaire.

1. Number of people who filled questionnaire.

![Count of Designation](image)  
Source-Primary Data
2. Perception of people on whether HR department is necessary or not.

3. Perception of people on whether IT plays any role in organization or not.
4. Viewpoint of employees/student’s in reference to IT impact.

5. Response regarding HRIS in an organization.

Source - Primary Data
6. Viewpoint of people on ATS system.

7. Response from employees/students regarding separate IT department in organization.
8. Responses regarding the role of IT in retaining the employees.

Do organization retain employees with the use of IT?

- Yes
- No
- Maybe

Source: Primary Data

9. Viewpoint of employees/students on whether IT is used in training of employees or not.

Does IT is used in training of employees in your organization?

- Yes: 33
- No: 4
- Maybe: 3

Source: Primary Data
10. Specifying the viewpoint of responder’s regarding whether IT have negative impact or not.

11. Hypothesis testing on the topic, how much impact IT have on performance of employees.
Q. How much impact IT have on the performance of employees in your Organization?

<table>
<thead>
<tr>
<th>Perceptions</th>
<th>High</th>
<th>Medium</th>
<th>Low</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>21</td>
<td>17</td>
<td>2</td>
<td>40</td>
</tr>
</tbody>
</table>

Hypothesis Testing: Using Z – test

H0 = IT has no significant impact on employee performance

H1 = IT has significant impact on employee performance

N=40, \( x = \frac{40}{3} = 13.33 \), \( \mu = \frac{21+17}{40} = 0.95 \), \( \alpha = 5\% \),

Confidence level = 95%

\[
Z_{cal} = \frac{\bar{x} - \mu}{\sqrt{\frac{x}{N}}}
\]

\[
= \frac{13.33 - 0.95}{6.32}
\]

\[
= 2.0063
\]

Calculated value of \( Z = 2 \). The critical value of \( Z \) at 5\% level of significance is 1.64. Calculated value is greater than critical value i.e. \( 2 > 1.64 \). Hence \( H_0 \) is rejected.
12. Future use of IT along with hypothesis testing for the same.

![Graph showing perceptions of IT use increase or decrease.]

<table>
<thead>
<tr>
<th>Perceptions</th>
<th>Increase</th>
<th>Decrease</th>
<th>Not Sure</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Increase</td>
<td>36</td>
<td>0</td>
<td>4</td>
<td>40</td>
</tr>
</tbody>
</table>

Hypothesis Testing: Using Z-test

H0 = the future use of IT in HR department will not increase.
H1 = the future use of IT in HR department will increase.

N=40, \( x = \frac{40}{3} = 13.33 \), \( \mu = \frac{36+0}{40} = 0.9 \), \( \alpha = 5\% \),

Confidence level = 95%

\[
Z_{cal} = \frac{\bar{x} - \mu}{\sigma / \sqrt{n}} = \frac{13.33 - 0.9}{6.32} = 1.9667
\]
Calculated value of $Z = 1.97$. The critical value of $Z$ at 5% level of significance is 1.64. Calculated value is greater than critical value i.e. $1.97 > 1.64$. Hence $H_0$ is rejected.

13. Which software is used for recruitment in your organization?

Following are the responses:

- CANVA
- ERP & SAP
- HRIS
- Naukri, indeed, Linkedin
- Cakehr
- ZOHO
- Achieve
- CRM
- Indeed
- Naukri.com, indeed, LinkedIn, monster
- Developed by Own for use
- LinkedIn
- Naukri. Com
- Indeed, LinkedIn
- Ceipal - Monster, Dice, Career Builder, LinkedIn Recruiting
- Vesta
- Company website portal
- Naukri and Indeed
- Company software
- Monster
- LinkedIn
14. Which software is used for payroll in your organization?

Following are the responses:

- SAP
- CBM
- ERP
- Cake hr
- Tally ERP
- Achieve
- HR berry
- HRIS and Darwin Box
- Honour
- Hr mantra
- OnPay
- Gusto

The Human Resource Role in Information Technology recruiting, Training and development and employee’s performance

In nowadays, managers realize that human capital has become asset and IT recruiting can broadly support efficient hiring together with forming the workforce. In order to attract the best candidates, it is vital that both HR and IT departments cooperate together. The HR role in IT recruiting is of key importance, including time of crisis. The HR IT tools can support hiring and retaining a high potential. It begins with launching the career website what is a very good promotional tool.

Employer can present all necessary information related to job, careers or personal development of each applicants there. The career website should focus not only on potential employees, but target group should also include the students, graduates or school pupils in order to have a possibility to "raise“ new employees for the future.

Various software is used to increases the skills of the employees through training so IT has significant impact on training in HR department. After the training the performance of the employee will increase so in this way the IT also contributes towards the productivity of the employees and many daily task of the employees become easy because of the various type of software.

RESULT & FINDINGS

After analyzing the data of all the samples collected it is being found that the IT has effective impact on the HR department. The survey confirms that companies use HR IT tools and should contain all HR processes which will sustain all parts of HR it means from "Recruit to Retire” functions within the company. The research
presents that the importance of HR – IT usage is getting more and more important not only due to the fact that HR productivity increases but at the same time, the value of the organization increases, including the most important asset – Human Resource.

We have tested the hypothesis and found that the use of the IT will increase in the future. As per the survey show that 95% respondents confirmed that the use of the IT will increase in the future and whereas 5% of the respondent are not sure about it.

We have tested the hypothesis and found that the use of the IT will increase in the employee performance. As per the survey show that 52.7% respondents confirmed that there will be high impact of IT on employee performance and whereas 42.5% respondent confirmed that there will be medium impact and 5% respondent confirmed that there will be the low impact.

So for the above survey, we had confirmed that there IT play very significant role in the HR Department.

**CONCLUSION**

Globalization brings the requirement to think how IT can contribute to achieve the business goal in the frame Human Resource Management. Despite the fact questionnaire revealed that information technology sustains reaching the HR goals moderately, precise plan of implementation of HR information system can significantly support HR strategy in the company to attain defined key performance indicators (KPI). The task of HR professionals has been simplified with new technological tools, communication technologies and new application software have made and they can now spend more of their time on policy framework, strategic planning and other such issues.

**BIBLIOGRAPHY**

- [https://essay.utwente.nl/59968/1/MSc_Yu_Long.pdf](https://essay.utwente.nl/59968/1/MSc_Yu_Long.pdf)
- [https://scholarworks.rit.edu/cgi/viewcontent.cgi?article=11375&context=theses](https://scholarworks.rit.edu/cgi/viewcontent.cgi?article=11375&context=theses)
- http://www.ripublication.com/impact of information technology in human resource management
- https://www.researchgate.net/publication/257978898