

# THE CURRENT HRM PRACTICES IN BANKING INSTITUTIONS OF PAKISTAN WITH REFERENCE TO TECHNOLOGICAL ADVANCEMENT

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### Abstract

Organizations are being forced to adapt, and new trends are emerging in human resource management as a result of rapid technological development, rapid penetration, and accelerated globalization. Various technological advancements have not only saved the hustle of the management system but have also proved to be less expensive and time-saving. This study validates the impact and significance of the new technological gears, technology in HR practices, and the extent and effectiveness of HR technology on in the banking Institutes of Pakistan. The study is conducted by adapting a questionnaire survey filled out by the professionals serving the banking industry of Pakistan. The collected data is analyzed using descriptive analysis, correlation, and regression analysis. The study concludes that technological tools used, technological HR practices, and the extent of HR technology is positively correlated through technology effectiveness. The result of this study is limited as it chooses only a few E-HR practices related to banks' performance. Electronic Human Resource strategies are important in improving bank performance therefore, there is a need to adopt E-HR practices that aim to improve banks' performance.

**Keywords:** Technological Tools Used, Extent of HR Practices, Bank Performance.

## 1. INTRODUCTION

In the present competitive world, companies are required to position and sustain themselves in a rapidly changing dynamic environment. This environment is said to be very competitive and even chaotic (Maheshwari & Vohra, 2015). Globalization requires changes in a company's business strategy and work organization, creating uncertainty in how it manages its talent (HR) strategy (Vivas, Ribeiro, 2002).

The rapid development of information technology (IT) in recent years has influenced how companies do business and how their support functions must function. Today, HRM is dramatically changing towards more technical management to address globalization and the "increasing demands and trouble of a rapidly changing environment" (Kidron, Tzafrir, Meshulam & Iverson, 2013). HR needed to leverage technology and data analytics to build a global HR information system that collects and stores data from multiple sources. Companies that can anticipate and sustainably manage the talent requirements of particularly talented employees gain a decisive competitive advantage (Dutta & Mia (2011). Currently, 72% of active candidates visit the company's website on their mobile

phones to learn about career opportunities, and 45% of candidates apply for jobs from their mobile devices. Also, relying on your resume is not enough to find the right candidate. Therefore, how social media presents itself in front of professional and social websites enables candidates to converse with others and enlighten their actual interpersonal skills used to validate (Manjula & Rama, 2019).

In this research, we are going to study the significance of technological tools used for Technology effectiveness. Technological tools usage is based on data and evidence instead of personal experience and intuition. Nowadays, organizations including the banking sector are looking for ways to enhance the performance of the companies and better management of their Human Resources (HR). In contrast to traditional Human Resources for better performance and better management of resources and Technology, companies are now relying on E-HR to get maximum results out of the organization and their employees (Ghazy & Fedorova, 2022).

### **1.1. Background**

Since technological advancement have had a massive effect on the complete HR practices cycle. Unfortunately, studies aren't always progressing at an identical pace, and empirical studies on those troubles have best lately been published. For example, there are nonetheless few studies on how company profession sites, activity listings, and social platforms have a powerful effect on the hiring and finalization of favorable applicants.

During modern-day years, technology in banks (E-HR) has incredibly affected the acts of HR divisions With Pakistan's globalization, liberalization, and privatization, the banks has focused more on becoming technologically advanced. Cutthroat competition, shifting employee expectations, changes in the work environment and the desire to be at the top are all driving forces for the deployment of E-HRM. E-HRM is used by almost every organization, whether private or public (Bag, Dhamija, Pretorius, Chowdhury & Giannakis, (2021). They use a variety of IT solutions to carry out their HR tasks. Foreign corporations are simply investing in Pakistan as foreign policies are liberalized. Many companies have their headquarters or subsidiaries in different nations. The use of e-HRM facilitates communication and engagement between and within organizations. The organization in Pakistan has numerous E-HRM tools. (Talukdar & Ganguly, 2021).

### **1.2. Problem Statement**

There is a gap in HR practices for Recruitment and Selection, Employee Training and Development, Performance Appraisal, and managing Compensation & Benefits, and other HR practices in the banking industry (Nassazi, 2013).

The focus of this research is to highlight the key HR Activities and the E-HR tactics that can contribute to better banks' performance. Since Recruitment and Selection, Training and Development are time-consuming activates and are considered as relatively expensive processes, this paper will highlight the healthy construction among E-HR for employee ease and for the sake of the bank's better performance

In the modern time, technological advancements are the talk of town no matter what area or subject is it about. Technology not only saves cost, and time and makes everything easier to operate but it also provides a great competitive advantage to companies who utilize it in their functions. The banking sector has been the backbone of Pakistan's economy for the last two decades. Yet, they still face problems in finding ways to improve employee performance. Banks are spending millions to figure out ways to improve employee performance. Technological tools used, HR practices, and the extent of HR technology seem to have a correlation with Technology effectiveness. This research is about finding the impact of Technological tools used, HR practices, and the extent of HR technology on technology effectiveness for better employee and bank performance.

### **1.3. Scope**

The target population for this research will be the Professional working in banking industry of Pakistan. This research will be limited to the banking institutions in Pakistan. The research will focus on how the incorporation of technology in HR activities of banking industry.

### **1.4. Significance of the study**

Amplification of research involves HRM technologies in a banks and discussing the implications, consequences, blessings, and implications of HRM technologies in banking. This view helps us understand the implications of implementing technologies in banks within the board staff. (Goodman 2018) The result of this look helps us understand the importance of technologies in banks. The importance of this statement is to observe HRM in banks' research, problems, and improvements of technologies in banks (Gutman, Olatunji, & Edan, 2021)

### **1.5. Limitations**

Some respondents were hesitant to provide information on E-HRM and complete the questionnaire. Few respondents have insufficient or no information about their bank's use of e-HRM. Due to a limited resources, convenience sampling was used for the purpose of the study.

### **1.6. Research Questions**

- a) What technological applications do Pakistani banks use for HRM activities?
- b) What are the new HRM technologies in the banking sector?
- c) Up to what extent the banks implements and uses technologically advanced systems in the hiring and recruitment process?
- d) Is the usage of advanced features in HRM practices worth it?

### **1.7. Research Objective**

- a) To identify the importance of technology in HRM for the banking industry of Pakistan.
- b) To categorize the efficiency and effectiveness of HR technology for HRM Department in Banking Industry of Pakistan.
- c) To recognize the impact of technology that affects the functioning of Pakistani banks.
- d) To study the Current E-HRM activities that are the part of the Banking Industry in Pakistan.

## **2. LITERATURE REVIEW**

Being digital in completing HR duties is a difficult undertaking in today's competitive industry. Banks must adapt to new technologies and innovations that will make HR operations simpler and faster than before. E-HRM may be useful in boosting the performance of the banking sector. According to Shamaileh, AlHamad, Al-Qudah, Mohammad, Alhalalmeh, Al-Azzam, & Alshurideh (2022), e-HRM aids organizations in talent management, including talent attraction, recruitment, development, and retention.

According to a study conducted by De Alwis, Andrić & Šostar (2022), 93% of organizations agree that after implementing E-HR, HRM fulfills the function of strategic partner, change management, and administrative expert. IT spending has changed the way the HR department handles records and shares information. It significantly reduces paperwork and provides easy access to large amounts of data. Nenwani & Raj (2013). IT has a huge impact on enlistment interaction since different kinds of data innovation can improve enrollment procedures. Innovation is supposed to be the main HRM pattern in the next few decades (Hendrickson 2003). Intranets, the World Wide Web, and programming bundles that have further developed HR processes have made enrollment processes more virtual (Lin & Sanders, 2017).

Computerized reasoning is currently applied in an assortment of areas, including research, designing, business, assembling, and the executives. Any association's human asset division is the most essential piece or capacity. Thus, in the present firms, the use of insightful methodologies in different elements of human assets on the board with the end goal of navigation has extremely high worth. Accordingly, a specialist framework is an exceptionally successful device for the favor of faculty activities (Mehrabad, & Brojeny 2007).

### **2.1. Key variables of the study**

The key variables of this study are Technology tools used, HR technology Practice, the Extent of HR technology, and challenges faced. HR technology is how banks fulfill their duties as well as carry out their necessary responsibilities. HR technology refers to the efficiency, superiority, and competence of their output (Prasetyaningtyas, Aishah, Hansen

& Kuspriandani (2021). This research is going to find the connection present among these independent variables as well as the dependent variables.

## **2.2. Theoretical Framework**

This research is focused on determining the impact of technology effectiveness in the banking sector of Pakistan. The research is centered on analyzing the gap between Technological tools used, HR practices, and the extent of HR technology regarding technology effectiveness (Nassazi, 2013). The aim is to highlight the importance of technological HR management practices such as employee training, performance appraisal, and compensation & benefits, etc. on technology effectiveness. Technology effectiveness is the key dependent variable (DV) in this study, which is dependent on certain independent variables, which affect the effectiveness of the technology in one way or another. Independent Variables of this study include technology tools used, HR practices, and the extent of HR technology of Banks.

## **2.3. Technology Effectiveness**

Technological HR practices create quite an impact on the performance of the employees as well as the performance of the association. HR analytics has a direct relation with the enhanced performance of the employees. HR practices like data-driven decisions for employee training, performance appraisal, and compensation & benefits have positive outcomes on the technology effectiveness (Wingard, 2019).

## **2.4. Technology Tools Used**

Technological tools used and effectiveness is closely related to each other. Proper use of tools of the technology leads to better effectiveness of the technology within an association. Managing Recruitment is an indispensable tool for attractive employee performance and organizations are putting effort into technology (Mehrabad & Brojeny, 2007).

## **2.5. HR Practice**

The reception of the possibility of "advancement" is somewhat new in semi-government associations. Specialists executed development as a novel insight of improvement, strategy, and interaction. The idea of advancement considers either a reception interaction or the course of new practices and data. Concentrates on portraying that advancement reception prompts the making of novel thought ability and associations can apply these plans to their most recent items, HR cycles, and yet again organize their systems and clients' administrations. The advancement is characterized as an interaction that can foster different strategies for associations, re-organized new items, inventive methods of creation, mechanical strategies and procedures, clients' new administrations, and reception of new designs and data assets (Tam, 2020)

## 2.6. The Extent of HR Technology

The persistence of the technology gap suggests that the causes are deep-rooted and at least partly structural. A lot of steps have been taken by the current government to foster productivity and TFP as proposed in the PSDP 2021-22. An amount of Rs12 billion has been allocated to science and IT while a total amount of Rs13 billion has been earmarked for knowledge economy initiatives.

Other than this, the other initiatives adopted and in consideration pertaining to the TFP and digitalization are Vision 2030, MTFD, Growth Strategy, Vision 2025, and above all the 12th Five-Year Plan along with other models.

## 2.7. Banking Technology and HR

The banking area in rising international locations has advanced from an essential technique of changing guide data-maintaining structures to automatic structures. According to Al-Tarawneh & Tarawneh (2012) research, there is powerful statistical impact proof among the exceptional HR data gadget outputs and organizational overall performance inside the banking industry (Josh, 2016)

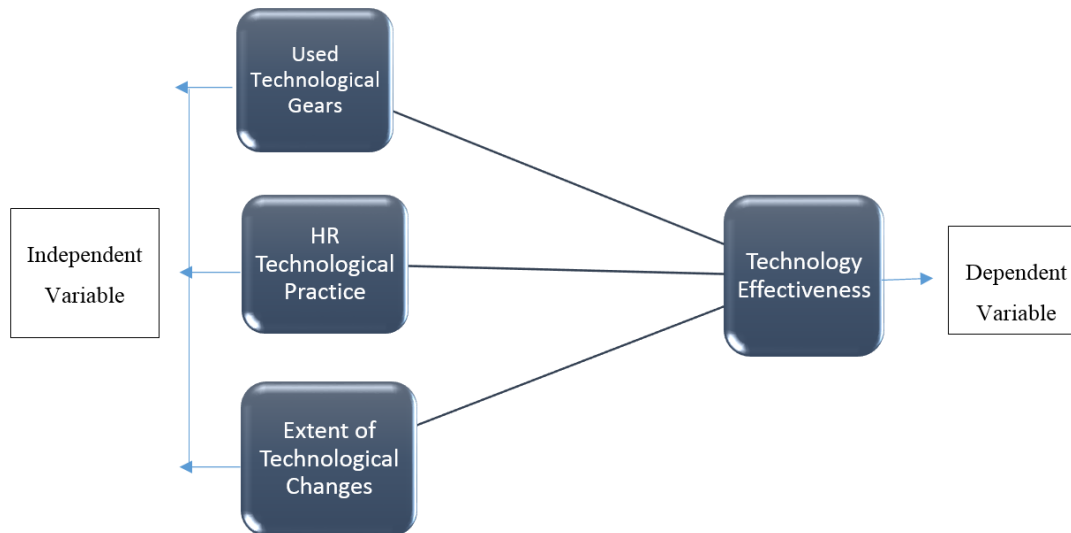
## 2.8. International and local Banks use HR Technology

Since 2000, the State Bank of Pakistan had been using Temenos solutions, when it implemented two instances of **Globus G11** software—the forerunner to Temenos Transact: one for its currency operations, and another for its banking functions Temenos has more than 10 customers in Pakistan including NIB Bank, Soneri Bank, Allied Bank, Meezan Bank, Bank Alfalah and JS Bank. Infotech Pakistan has incorporated IBM middleware in the bank, for the integration of front and back office systems whereas, Banks are extensively implementing AI and ML to offer just-in-time, personalized services to their customers. AI and ML automate the banking processes and facilitate better customer services, and credit, and loan services. They also combat fraud.



## 2.9. Conceptual Framework

Figure 1: Conceptual Framework



## 2.10. Hypothesis

The hypothesis formulated are as follows:

H<sub>1</sub>: Used technological gears used have an impact on Technological effectiveness.

H<sub>2</sub>: HR technological practices have an impact on technology effectiveness.

H<sub>3</sub>: The extent of HR technology changes has an impact on technology effectiveness.

## 2.11. Chronological Literature Review

Research on E-banking challenges in Pakistan was conducted on the employees of several banks and the main purpose of this examination was to find out the way to build trust and promote E-Banking in Pakistan. The banking sector is one of the sectors which are moving toward E-banking services by which customers easily access their accounts through their smartphones and PCs. There are many benefits to adopting E-banking but it also generates some new difficulties for organizations to execute these changes which are continuously changing due to the transformation of the latest technology. The main purpose of this study is to highlight the serious challenges faced by Pakistan in implementing E-banking. For the last few years, the banking sectors of Pakistan provide many internet banking facilities to their customers. SBP also plays an important role in the implementation of E-banking in Pakistan. But still, there are some significant issues due to which many clients still prefer traditional banking rather than e-banking (Khan, Hameed, & Hamayun, 2019).

## **2.12. Research Gap**

The relation of technological HR practices and their impact on bank performance is under-explored in the banking sector of Pakistan. There have been studies before on human resource management in the banking sector but there is very little work on understanding the impact of e-HR practices on technological tools used in HR practices, and the extent of HR technology on Technology effectiveness. This research focuses on covering this gap of research in the banking sector of Pakistan. This research will highlight the impact of technological tools used, HR practices, and the extent of HR technology on Technology effectiveness in the banking sector of Pakistan.

## **3. METHODOLOGY**

Data collection is done through a questionnaire which was adopted from Batool, Hussain, Baqir, Islam, & Hanif (2021). Deductive approach and quantitative data collection approach is has been followed through a questionnaire, since, this is the most effective tool for our research to evaluate the recent changes due to technology. The questionnaire was prepared on a Likert scale of 1 to 5, where 1 strongly disagrees and 5 strongly agree. We used convenience sampling. The data were treated by using statistical tools such as correlation analysis and regression analysis by using SPSS. These statistical tools are suitable for understanding and developing a relationship between different variables and they also help to examine the impact of independent variables and dependent variables. Respondents are selected through convenience sampling. The sample size of this research is 384. This study is based on a cross-sectional time horizon.

### **3.1 Ethical Considerations**

Participants were made aware that their involvement is voluntary and participants are free to opt-out of data collection and research. The collected data will be confidential. Research is neutral and unbiased so that it doesn't interfere with our results.

## **4. DATA ANALYSIS AND FINDINGS**

### **4.1. Demographic Information**

The demographic variables are designation, age group, gender, qualification, and how long the respondents have worked for the representative bank. To represent the results of these variable frequencies tables and pie charts are used. The descriptive analysis of each demographic variable is given below.



Table 1: Demographics					
		Frequency	Percent	Valid Percent	Cumulative Percent
Gender	Male	175	45.6	46	46
	Female	209	54.4	54	100.0
	<b>Total</b>	<b>384</b>	<b>100.0</b>	<b>100.0</b>	
Age	Less than 30	132	34.4	34	34
	21-35	93	24.2	24	58
	36-40	94	24.5	25	83
	31& above	65	16.9	17	100.0
	<b>Total</b>	<b>384</b>	<b>100.0</b>	<b>100.0</b>	
Qualification	Bachelors	250	64.5	64	64
	Masters	86	22.7	23	87
	Others	48	12.8	13	100.0
	<b>Total</b>	<b>384</b>	<b>100.0</b>	<b>100.0</b>	
Working Experience	Less than 1 year	83	21.6	22	22
	1-10 years	120	31.3	31	53
	11-20 years	99	25.8	26	79
	20 and more	82	21.4	21	100.0
	<b>Total</b>	<b>384</b>	<b>100.0</b>	<b>100</b>	

The above table reflects the data of 384 participants of the study. It shows that 54% of the participants of the study are female and 46% are male. The descriptive analysis of age of the participant's shows that majority of the participants are less than 30 years (34%). The qualification of majority of participants are reported as Bachelors (64%) and the working experience of 31% participants are between 1-10 years.

## 4.2. Reliability Tests

Reliability of research will be determined using inter item consistence test. A study which produces consistent results in Cronbach's alpha on testing is said to be a reliable research. The reliability of each research variable is explained below.

Table 2: Reliability Statistics			
	Cronbach's Alpha	Cronbach's Alpha Based on Standardized Items	N of Items
Used Technological Gears	0.817	0.817	7
HR Technology Practice	0.764	0.764	6
Extent of HR Technology	0.795	0.795	7
Technology Effectiveness	0.731	0.731	4

The table shows that Cronbach's Alpha value of Used Technological Gears is 0.817 which shows that internal consistency is good, and the results of Technological tools used are highly reliable. The Cronbach's Alpha value of HR Technology Practice is 0.764 which is between the range of 0.7 to 0.80 which shows that internal consistency is acceptable, and the results of HR technology practice are reliable.

The table shows that Cronbach's Alpha value of Extent of HR Technology is 0.795 which shows that internal consistency is acceptable, and the results are reliable. The Cronbach's

Alpha value of Technology Effectiveness is 0.731 which shows that internal consistency is acceptable, and the results of Technology Effectiveness are reliable.

### 4.3. Validity Tests

The below tables of correlation shows that all the significance values are less than 0.05 so, the results of the recent technological tools used, recent HR technology practice, the recent extent of HR technology, and technology effectiveness are valid.

### 4.4. Correlation

Table 3: Correlations			
Technology Effectiveness & Used Technological Gears		Technology Effectiveness (TE)	Used Technological Gears (UTG)
Technology Effectiveness (TE)	Pearson Correlation	1	0.612
	Sig. (2-tailed)		0.000
	N	384	384
Used Technological Gears (UTG)	Pearson Correlation	0.612	1
	Sig. (2-tailed)	0.000	
	N	384	384
Technology Effectiveness and HR Technology Practice		Technology Effectiveness (TE)	HR Technology Practice (HRT)
Technology Effectiveness (TE)	Pearson Correlation	1	0.663
	Sig. (2-tailed)		0.000
	N	384	384
HR Technology Practice (HRT)	Pearson Correlation	0.66	1
	Sig. (2-tailed)	0.000	
	N	384	384
Technology effectiveness and Extent of HR technology		Technology Effectiveness (TE)	Extent of HR Technology (EHRT)
Technology Effectiveness (TE)	Pearson Correlation	1	0.690
	Sig. (2-tailed)		0.000
	N	384	384
Extent Of HR Technology (EHRT)	Pearson Correlation	0.690	1
	Sig. (2-tailed)	0.000	
	N	384	384

The results show that the correlation between the Technology Effectiveness (TE) and Used Technological Gears (UTG) is 0.612 and their significance value is less than 0.05 which shows that there is a high and significant correlation between Technological Effectiveness (TE) and Used Technological Gears (UTG).

The correlation between the Technology Effectiveness (TE) and HR Technology Practice (HRT) is 0.663 and their significance value is less than 0.05, which shows that there is a high and significant correlation between Technology Effectiveness (TE) and HR Technology Practice (HRT).

The correlation between the Technology effectiveness and Extent of HR Technology (EHRT) is 0.690 and their significance value is less than 0.05 which shows that there is a high and significance correlation between Technology Effectiveness (TE) and Extent of HR Technology (EHRT).

#### 4.5. Regression Analysis

Regression analysis investigates the relationship between dependent and independent variables. To investigate the research hypothesis multiple regression analysis is used.

Table 4: Model Summary				
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	0.740	0.548	0.545	0.432
a. Predictors: (Constant), Used Technological Gears (UTG), HR Technological Practice (HRTP), Extent of HR Technology (EHRT)				
b. Dependent Variable: Technology Effectiveness (TE)				

The model summary shows that the  $R^2$  value is 0.548 which means that 0.548 or 54.8% of Technology Effectiveness (TE) is explained by Used Technological Gears (UTG), HR Technology Practice (HRTP), the Extent of HR Technology (EHRT), and challenges faced. In other words, 54.8% variability in Technology Effectiveness (TE) is due to Used Technological Gears (UTG), HR Technology Practice (HRTP), and the Extent of HR Technology (EHRT).

Table 5: ANOVA					
Model	Sum of Squares	df	Mean Square	F	Sig.
1 Regression	86.198	3	28.733	153.623	0.000
Residual	71.073	380	0.187		
Total	157.272	384			
a. Dependent Variable: Technology Effectiveness (TE)					
b. Predictors: (Constant), Used Technological Gear (UTG), HR Technology Practice (HRTP), Extent of HR Technology (EHRT)					

The significance value of the F test is 0.000 which is less than 0.05 at a 5% level of significance. This significance value shows that at a 5% level of significance the overall model is statistical significance

Table 6: Coefficients						
Model		Unstandardized Coefficients		Standardized Coefficients	T	Sig.
		B	Std. Error	Beta		
1	(Constant)	0.747	0.152		4.919	0.000
	Used Technological Gear (UTG)	0.174	0.046	0.188	3.779	0.000
	HR Technology Practice (HRTP)	0.260	0.056	0.256	4.618	0.000
	Extent of HR Technology (EHRT)	0.384	0.053	0.382	7.246	0.000
a. Dependent Variable: Technology Effectiveness (TE)						

This table is representing the coefficients of the variables. All the coefficient values are positive which indicates a positive relationship between the TE, UTG, HRTP, and EHRT. The proposed regression equation for this model is

$$\text{Technology Effectiveness} = 0.747 + 0.174(\text{UTG}) + 0.260(\text{H RTP}) + 0.384(\text{EH RT})$$

#### 4.6. Hypothesis

H<sub>01</sub>: Technological tools used to have no impact on Technological Effectiveness.

H<sub>1</sub>: Technological tools used have an impact on Technological Effectiveness.

Table 7: ANOVA for Technology Effectiveness and Used Technological Gears						
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	58.861	1	58.861	228.482	0.000
	Residual	98.410	382	0.258		
	Total	157.272	384			
a. Dependent Variable: Technology Effectiveness (TE)						
b. Predictors: (Constant), Used Technological Gears (UTG)						

The ANOVA table shows that the significance value between UTG and TE is 0.000 which is less than 0.05 so, H<sub>0</sub> is rejected and H<sub>1</sub> is accepted. The data conclude that UTG have an impact on TE.

H<sub>02</sub>: HR Technology Practices have no impact on Technology Effectiveness.

H<sub>2</sub>: HR Technology Practices have an impact on Technology Effectiveness.

Table 8: ANOVA for Technology Effectiveness and HR Technology Practice						
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	69.227	1	69.227	300.353	0.000
	Residual	88.045	382	0.230		
	Total	157.272	384			
a. Dependent Variable: : Technology Effectiveness (TE)						
b. Predictors: (Constant), HR Technology Practice(H RTP)						

The ANOVA table shows that the significance value of H RTP and TE is 0.000 which is less than 0.05 so, H<sub>0</sub> is rejected and H<sub>2</sub> is accepted. The data conclude that H RTP has an impact on TE.

H<sub>03</sub>: The Extent of HR Technology has no impact on Technology Effectiveness.

H<sub>3</sub>: The Extent of HR Technology has an impact on Technology Effectiveness.

Table 9: ANOVA for Extent of HR Technology and Technology Effectiveness						
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	74.861	1	74.861	347.004	.000 <sup>b</sup>
	Residual	82.411	382	.216		
	Total	157.272	383			
a. Dependent Variable: Technology Effectiveness						
b. Predictors: (Constant), Extent of HR Technology						

The ANOVA table shows that the significance value between the EHRT and TE is 0.000 which is less than 0.05 so,  $H_0$  is rejected and  $H_3$  is accepted. The data conclude that the EHRT has an impact on TE.

#### 4.7. Analysis with References to Literature

Literature shows that there is a significant relationship between Used Technological Gears (UTG) have an impact on Technology Effectiveness (TE), HR Technology Practice (HRT) has an impact on TE, and the Extent of HR Technology (EHRT) has an impact on TE.

Hansson (2007) checks the relation between technological tools used and an impact on technology effectiveness in his paper "COMPANY-BASED DETERMINANTS OF TRAINING AND THE IMPACT OF TRAINING ON COMPANY PERFORMANCE". His finding shows that the correlation (based on 3,419 observations) between the tools and the proportion of effectiveness is 0.18 at a 1% level significant. The results show that technological tools used and technology effectiveness are significantly related to each other. In our research, the correlation between HR practices having no impact on technology effectiveness is 0.612 and it is significant at a 5% level of significance. And also, they are significantly related to each other.

Iqbal, Ahmad, Allen & Raziq (2018) check the relation between HR practice's impact on technology effectiveness in their research "DOES E-HRM IMPROVE LABOUR PRODUCTIVITY?" His finding shows that the correlation between HR practices and technology effectiveness was 0.590 which shows a moderate correlation between them. Also, the reliability of HR practices was 0.788, and the reliability of technology effectiveness was 0.681. His regression model shows that the significance value between them is 0.000 so its model was significant. In our research, the correlation between HR practices and technology effectiveness is 0.663 which is a little bit small as compared to Iqbal Ahmad's finding but it is significant. Also, the reliability value is 0.764 which is close to Iqbal Ahmad's finding and also, and the regression model shows that the significance value between HR practices and technology effectiveness is 0.000 which is significant at a 5% level of significance.

Khan and Khan (2017) determine the relationship between the extents of HR technology has an impact on technology effectiveness in their paper "IMPACT OF HUMAN RESOURCE MANAGEMENT PRACTICES ON EMPLOYEE JOB SATISFACTION AT MEEZAN BANK LIMITED, KARACHI". His findings show that the Cronbach Alpha value of extent was 0.839, and the regression model showed it was significant at a 5% level of significance. In our study, the Cronbach Alpha value of Extent is 0.795 which highly shows reliability, but low reliability as compared to khan results. Our regression model's significance value is less than 0.05 which indicates that our model is also significant. So, after comparing our results with the literature we conclude that technological tools used have an impact on technology effectiveness, HR practices have an impact on technology

effectiveness, and the Extent of HR technology has an impact on technology effectiveness.

## **5. CONCLUSION**

The main purpose of this research study was to study the recent changes in HR practices like employee training, performance appraisal, and compensation & benefits, etc. on services of the banking sector of Pakistan. For this purpose, we used quantitative research methodology to understand the context of the present study and we used a population of employees working in the banking sector of Pakistan. The sample size of the research study is 384. The literature review has presented the theoretical perspective from previous studies with regard to Used Technological gears, HR practices, the extent of HR technology, and technology effectiveness. In this research study, we opted for three HR-related technological practices that are considered to be correlated to technology effectiveness. These HR practices included employee training, performance appraisal, and compensation & benefits, etc. There is a gap in the technological tools used, HR practices, and the extent of HR technology regarding technology's effectiveness (Nassazi, 2013). The focus of this research was to highlight these factors, and how technological HR tactics can result in better technology effectiveness. In this research study, we have used descriptive analysis to describe data and regression analysis to build relationships between variables of the study.

The correlation analysis between technological tools used and technology effectiveness proves to be statistically significant. To develop the relationship between HR practices and technology effectiveness correlational analysis proved the significant relationship between data-driven HR practices and technology effectiveness. A very significant relationship was found Extent of HR technology and technology effectiveness through regression analysis. Regression analysis showed a significant relationship between independent variables which are technological tools used, HR practices, and extent of HR technology, and dependent variable which is technology effectiveness. For hypothesis testing, ANOVA was used and all the null hypotheses were rejected. All the hypotheses  $H_1$ ,  $H_2$ , and  $H_3$  were approved proving that the independent and dependent variables are positively correlated with each other.

### **5.1. Recommendation (based on coefficients of variables)**

Based on research study results and the relationship between variables banking sector needs to better use technological HR tactics to further enhance the performance of their services. There is a need for proper investment in E-HR departments to evaluate and analyze each and every aspect of bank services and make technology useful accordingly. Bank industry should put more weight on technology and performance-driven incentives to employees to improve their performance further.



## 5.2. Future Studies

This research study is only limited to the banking sector of Pakistan and the results of this research study may not be applicable to banks all over Pakistan. It is recommended that future researchers need to study the relationship between technological HR practices and technology effectiveness for other industries.

This research study is only focusing on a few technological HR practices such as employee training, performance appraisal and compensation & benefits, etc. and there is a need to explore other technological HR practices such as block chain, cloud banking, artificial intelligence, and machine learning and chat-bots, etc. in the banking sector.

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