

The Effect of Training and Development on Work Performance: The Mediating Role of Intrinsic Motivation

Eğitim ve Gelişimin İş Performansına Etkisi: İçsel Motivasyonun Aracı Rolü

Makale Başvuru Tarihi: 16.08.2022

Makale Kabul Tarihi: 24.08.2022

Makale Türü: Araştırma Makalesi

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Keywords:

Management and Strategy, Training and Development, Intrinsic Motivation, Work Performance.

ABSTRACT

This research is specific to employees of telecommunication industry working in different organization of Federal Capital Territory (FCT) Islamabad and Rawalpindi city of Pakistan. It is aimed empirically to inspect the influence of training and development on intrinsic motivation and work performance by investigating the mediation effects of intrinsic motivation in association of training and development with work performance. Survey data were gathered from different telecommunication organizations of the (FCT) Islamabad and Rawalpindi. The final sample data of 304 employees were used to test the hypotheses through structural equational modeling. Training and development impacts significantly on the work performance and intrinsic motivation of employees and ultimately intrinsic motivation influenced positively on work performance. Finally, intrinsic motivation reduces the greater influence of training and development on work performance of individuals. However, it still remains significant relationship which exhibits partially mediation among between relationship of training and development and work performance. This research will assist the public policy decision-makers to better understand the consequences of training and development, and intrinsic motivation. Moreover, management office holders/ community may formulate strategies for the motivation of employees to maximize the work performance of employees which contribute to the welfare of society.

Anahtar Kelimeler:

Yönetim ve Strateji, Eğitim ve Geliştirme, İçsel Motivasyon, İş Performansı.

ÖZET

Bu araştırma, Pakistan'ın Federal Başkent Bölgesi (FCT) Islamabad ve Rawalpindi şehrinde farklı işletmelerde çalışan telekomünikasyon sektörü çalışanlarına uygulanmıştır. Eğitim ve gelişimin iş performansı ile ilişkilendirilmesinde içsel motivasyonun aracılık etkileri araştırılarak, eğitim ve gelişimin içsel motivasyon ve iş performansı üzerindeki etkisinin ampirik olarak incelenmesi amaçlanmaktadır. Anket verileri (FCT) Islamabad ve Rawalpindi'deki farklı telekomünikasyon işletmelerinden toplanmıştır. Hipotezleri yapısal eşitlik modellemesi yoluyla test etmek için 304 çalışanın nihai örnek verileri kullanılmıştır. Eğitim ve geliştirme, çalışanların iş performansını ve içsel motivasyonunu önemli ölçüde etkiler ve nihayetinde içsel motivasyon, iş performansını olumlu yönde etkiler. İçsel motivasyon, eğitim ve gelişimin bireylerin iş performansı üzerindeki daha büyük olan etkisini azaltır. Ancak, eğitim ve gelişim ilişkisi ile iş performansı arasında kısmen aracılık sergileyen anlamlı bir ilişki varlığını korumaktadır. Bu araştırma, kamu politikası karar vericilerinin eğitim ve gelişimin ve içsel motivasyonun sonuçlarını daha iyi anlamalarına yardımcı olacaktır. Ayrıca, yönetimdeki kişi ve gruplar, toplumun refahına katkıda bulunan çalışanların iş performansını en üst düzeye çıkarmak amacıyla çalışanların motivasyonu için stratejiler formüle edebilir.

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1. INTRODUCTION

Individual motivation had been big concerns for public and private organization for many decades as defined by George and Jones (2012: 157) as psychological forces which determine the direction of a person's behavior in an organization, level of effort and level of persistence. Employee level of inspiration depends upon type of profession and environment of work (Lawler & Hall, 1970). All organizations assure the job satisfaction of employees because it is compulsory for better performance of the company's employees. The motivation of employees in public and private companies plays a major role which includes many factors such as human resource practices, teamwork, structure, leadership styles, culture, and internal politics (Achieng, Okoth & Florah, 2019; Gould-Williams & Gatenby, 2010). An innovative technique engages staff positively, changing the behavior and attitude of employees, and supporting staff in more flexible ways in achieving success by training and development programs in any firm which enrich the motivation of employees and the primary aim of increasing the internal and external motivation of employees (Gould-Williams & Gatenby, 2010; Güllü, Çelik, Güllü & Bayram, 2017). The organization's research and development assess employee's innovative behaviors, training, intrinsic motivation, and incentive pay system. On the other side, it positively impacts employee's motivation, if they give managerial coaching training to every individual employee (Wang, 2013). Training and development increases the technical data and services of the organization and worker's enactment; it also enhances satisfaction level, quick decision power, and individual working experiences and creates positivity for the employees and then employees show positivism in work (Achieng et al., 2019; Güllü et al., 2017).

2. LITERATURE REVIEW

2.1. Theoretical Framework

Self-determination theory associated with intrinsic motivation suggested that employees with their own voluntary choice for different training and development activities may involve in optimistic influence and cognitive flexibility which should lead towards organizational enhancement. Voluntary kind of participation of individuals exhibits an apparent self-determined behavior optimistically linked with proactive task engagement and intrinsic motivation (Ryan & Deci, 2002). The self-determination theory is used to analyze how safety climate elements can forecast distinct kinds of motivation like intrinsic, identifiable, introjected, external, etc. (Wen Lim, Li, Fang & Wu, 2018). Moreover, Self-determination

theory proposed that independent motivation which is important to achieve persistent individual behavior as well as it improves employee performance. For example, those individuals who take initiative with their own choices lead towards motivation and increased positive affect. In addition to this, employees who are participating in training and development voluntarily may perceive that these types of training and development activities linked with professional growth and skills development (Bidee, Vantilborgh, Pepermans, Huybrechts, Willems, Jegers & Hofmans, 2013; Vandercammen, Hofmans & Theuns, 2014). Victor Vroom (1964) established the expectancy theory of motivation with the premise that motivation is based on the anticipation of desired results. The theory is founded on three concepts: valence, expectancy, and force. Valence is the attraction of possible rewards, results, or incentives. Expectancy is an individual's belief on their assumption that they will or will not achieve the desired outcome and a person's motivation to perform is force. Further, employees would work hard if they believe it will lead to organizational incentives they seek (Skemp-Arlt & Toupence, 2007).

2.2. Training and Development and Work Performance

Training and development demonstrate a worldwide perspective, multidisciplinary and multilevel work in the organizations which assist stakeholders, whereas coaching and training not only improve performance but also help to achieve their goals (Aguinis & Kraiger, 2009; Losch, Traut-Mattausch, Mühlberger & Jonas, 2016). A lack of qualified human capital is a major development hindrance and training programs are commonly used in international development cooperation to improve work capacity in developing nations (Mikami & Furukawa, 2018). Certain training policy elements have a major impact on organizational performance and training plans should have a beneficial influence on all stakeholders (Ubeda-García, Marco-Lajara, Sabater-Sempere & García-Lillo, 2013). The management of the selected organizations to assess and plan for effective training and staff development needs which will improve the organizations' performance (Ibrahim, Boerhannoeddin & Kayode, 2017). Managerial training straight influences employees' job performance as well as an unintended effect through intervening job fulfillment, business goals, and leader-member exchange quality and management should emphasize increasing the separate absorptive capacities of their employee through human resource development program and professional development programs (Ali, Lodhi, Raza & Ali, 2018; Arubayi, Eromafuru & Egbule, 2020). Organizations deliver new standards for preparation, assessment, bring in to line training with business goals (Kraiger, McLinden & Casper, 2004). Furthermore, some employee

development programs play a pivotal role to boost the organization and some organizations provide a career development program to improve employees' skills and growth of innovative ideas, these programs help employees to shift to another job in the organization i.e. job rotation (Tansky & Cohen, 2001). Training and development program enhances work capability and also increased the competence and usefulness of employees and firms, those employees who perform well, organization give rewards to them (Gunu, Oni, Tsado & Ajayi, 2013). Additionally, training and development have a constructive outcome on employees because employees generate new ideas (Sung & Choi, 2018). All organization that needs to increase their worker's performance should focus on training to accomplish better levels, training contributes extraordinarily to workers' presentation in relationship with diverse components like stimulation, innovation, the panel conduct, working condition and training and development have anticipated optimistic effects on the performance of staffs in organizations (Khan, 2012). Therefore, following hypothesis is developed on the basis of literature:

H1: Training and development have a positive significant influence on work performance.

2.3. Training and Development and Intrinsic Motivation

In organizations, the engagement of training and development is correlated with the motivation of staff (Tharenou, 2001). Training and development help employee's innovative work behavior for maintainable growth and the training program is necessary for any organization because it increases employee self-confidence and proficiency in the organization (Turanli & Yolsal, 2020; Deepa & Rajasekar, 2021). Organization improved work performance of staff environment if the manager is very skillful in the human resource department because recruitment of employees depends upon on this department and management should rises the number of motivated staff to take part in training and development plans (Mpofu & Hlatywayo, 2015; Olagunju, Hassan, Abd Samad & Kasin, 2021). Training can influence not only motivation, performance and satisfaction, but also can affect the work-life of workers and intrinsic motivation is interconnected in management using inquiry and training (Derfler-Rozin & Pitesa, 2021; Hung & Wong, 2007). If employees perform work well in the organization, so organization upgrades the position of the employee (Cakil & Guney, 2019). Training and development have a lot of influence on the human resource practices in encouraging worker commitment for appropriate structural consequences (Isimoya, Bakare & Olaniyan, 2020). Worker training and development who motivate worker in different ways as such as training news update technology in the world as which have

balancing abilities is authoritative for employee's worker commitment. Moreover, development and also other different programs of work performance as these events increase the internal growth of employees and exhibit high degrees of intrinsic motivation (Isimoya et al., 2020; Kuvaas & Dysvik, 2009). Dynamics such as excellent functioning settings, competitive packages, and collaboration with staff may increase job consummation. Similarly, aspects such as an appreciation for accomplishing the task may increase motivation (Dobre, 2013). Any organization that achieved its target depends deeply on employee enthusiasm and the manager, if an organization can't give the value and appreciation to the employees then it will demoralize and demotivate the employees (Kim, 2006; Pratheepkanth, 2011). In the last two decades, the concept of human resources has been changed and increased innovation through strategic management over time. (Anca-Ioana, 2013). All these contexts are compulsory for every employee to polish their skills and pay a high role plan progress process, causal to achievement and retaining benefit (Wang, 2013). Firm in that harsh time face different things, such as competition in different companies, so firm needed training and development program to motivate employees, staff requires well knowledge skill, and capabilities (Bayraktaroglu & Čičkušić, 2013). So following hypothesis is prepared on grounds of review:

H2: Training and development have a positive significant influence on intrinsic motivation.

2.4. Intrinsic Motivation and Work Performance

Increasing workplace satisfaction can enhance workers' excitement and intrinsic motivation and the association between intrinsic motivation and occupation performance is sequentially mediated by work innovation and customer orientation (Hahm, 2018; Moon, Hur & Hyun, 2019). Indirect effects of employee happiness and work satisfaction on job performance are vital and the programs of training and development highlight workers' weaknesses and strongest points and they give chance to employees to polish their skills to take the company in the direction of goal achievement (Ismail et al., 2019; Nguyen, Le, Trinh & Do, 2019). Training and development emphasize the performance of employees, cultural variances have also an effect on inside and outside organization performance. Employees can face a lot of challenges as well as the role of social appearances in the design of training and development activities (Nikandrou, Apospori, Panayotopoulou, Stavrou & Papalexandris, 2008). Training and development triggers growth for employees in the organization and is also used to keep maintain the ability and employees develop all-time knowledge and numerous organization announces individual development plans to maintain employee learning (Lejeune, Mercuri,

Beusaert & Raemdonck, 2016; Patel & Gor, 2015). Company performance cannot be reinforced if the organizational idea of a firm is not reliable with the standards, approaches, and opinions of the workers (Iyanda, Awawdeh, Al-Hiyari & Isiaka, 2021). Training and development programs in any company increase decision-making adeptness and the link between job enactment and work growth is useful for staff training, progress strategies, plans, procedures, training needs scrutiny, observing, and valuation method (Adejare, Olaore, Udofia & Emola, 2020; Cobblah & van der Walt, 2017). Employees are the strength of all organizations because employees play the role of a pillar to standing company, the work performance of employees is good if they developed a healthy relationship. (Mir & Amin, 2016). The connection between a pragmatic asset in worker development and organizational citizenship behavior, balance exposed an optimistic association only for personnel with high degrees of intrinsic motivation (Kuvaas & Dysvik, 2009). Given the significance of intrinsic motivation factors of trainers, imagination and self-efficacy factors have a tougher link the performance as associated to individual awareness aspect of motivation. (Tripathi & Tripathi, 2018). Motivation is fundamental to the strength of workers act and work value (Grant et al., 2018). Basic enthusiasm had an important positive connection with job performance but they also influence the fundamental motivation (Guo, Liao, Liao & Zhang, 2014). Work itself can be a potent intrinsic motivator for the simple reason that the job holder derives genuine satisfaction from completing important, gratifying, and difficult job obligations and responsibilities required by a particular profession (Van Dorssen-Boog, Van Vuuren, De Jong & Veld, 2021). Training and development and job sovereignty are important for the staff as they improve the personality of the employees and growing the level of self-management and self-control of people allows staff to work with inside energy (Tas & Tortumlu, 2021; Turanli & Yolsal, 2020). Assessment of motivation of employees is compulsory in all organizations and also identifies the poor performance of the employees. Some techniques and facilities are used to motivate the employees such as refreshments during working hours, leave for study, communication (Bosco & Sreedhara, 2017). Thus, following hypothesis is given below:

H3: Intrinsic motivation have a positive significant influence on work performance.

2.5. Intrinsic Motivation as a Mediator

Self-motivation leads to task completion and innovative work but workplace loneliness has recently gained prominence in scholarly and practical issues, a substantial source of innovation that could help the business combat loneliness and recovery-oriented psychosocial interventions can directly assess, monitor, and intervene to increase intrinsic motivation in

people with schizophrenia (Sajjad, Riaz, Chani & Hussain, 2020; Yamada, Lee, Dinh, Barrio & Brekke, 2010). Rewards for the accomplishment of an activity increase task interest and motivation to perform the activity and similar activities in the future, rewards can activate processes involving both internal and external sources of motivation. Moreover, external and internal motives may combine to influence the overall exercise of motivation (Cameron, Pierce, Banko & Gear, 2005). Human resource development research is working on basic tools of development programs to increase the benefits and growth of any organization which is organizational performance, employee development, and career development as these programs make positive contributions to firm performance (Jacobs & Washington, 2003). Loyalty factors include encouragement, rewards, teaching and growth of employees, free communication, and providing a respectable atmosphere. (Alrawabdeh, 2014). The importance of employee development programs is increasing in the organizations to receive an advantage between competitors (Jehanzeb & Bashir, 2013). Organizations give priority to training and advanced programs as a tactical instrument for increasing worker performance and firms must have enlarging training financial plan per annum source with considering that will receive an economic advantage, apart from this solid connection happens among training and development and employee's enactment (Falola, Osibanjo & Ojo, 2014). Any organizations, must also give compulsory training to employees, because they will be experienced people and they will understand how to tackle the situation of the organization in the consequences of loss (Zwick, 2015). Workers' intrinsic motivation, job satisfaction, and intention are related to competence, and competence, intrinsic desire, and job satisfaction are significant determinants of intention (Ordun & Ghaleb, 2021; Wu, Li & Khoo, 2016). Work performance of any organization depends upon employees' motivation (Slamet, Palutturi & Thaha, 2020). Employee's inventive work behavior through basic motivation has a progressive connection with innovative work behavior (Bin Saeed, Afsar, Shahjeha & Imad Shah, 2019). Involvement of senior managers in the training and coaching practice centered on genuine office situations enable the desired results and coaching skills can help people enhance their ability to work together and solve problems (Boak & Crabbe, 2019). Quality of human resources in international organizations is substantially more difficult than in domestic corporations with big homogeneous personnel structures (Popovski, Popovska & Jovcheska, 2014). Graduates and managers had a larger gap in some competencies than others, but not across firms and self-ratings didn't rise with tenure. There is a focus on organizational practices that encourage emotions of competence and the role of the supervisor in such activities (Arnold & Davey, 1992). Perceived self-efficacy and intrinsic motivation positively

influence adaptability and proactivity, and create a strong intrinsic motivation to keep satisfaction from profession (An, 2019; Bande & Fernández-Ferrín, 2015). Employee motivation is compulsory because they stimulate staffs which directly affects performance at the work. Training and development program uses some professional techniques that affect the performance of employees such as specialized rewards, appreciation and upright and straight promotion (Bosco & Sreedhara, 2017). Hence, following hypothesis are developed:

H4: Intrinsic motivation mediate the association of training and development with work performance

Based on the hypotheses developed, the following research model was created:

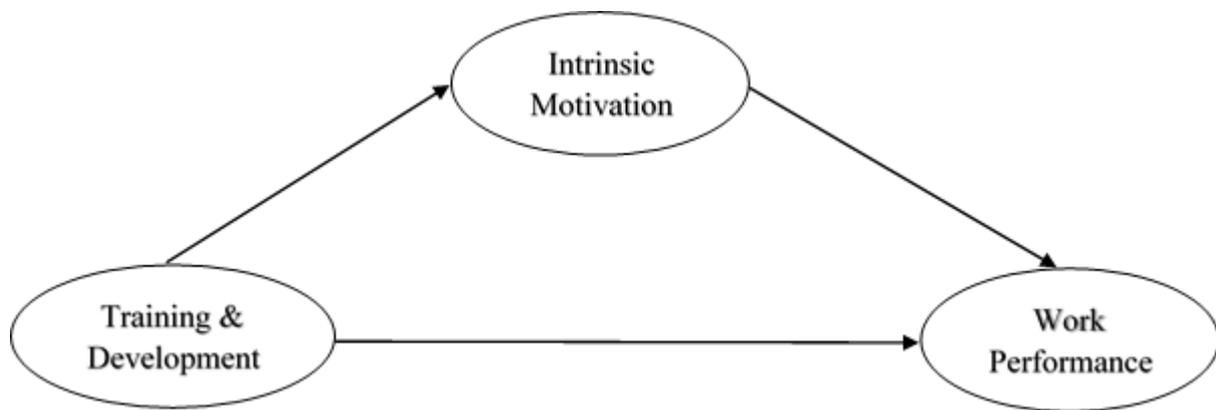


Figure 1

Currently, in this era, all kinds of organizations i.e. public/private/multinational corporations require skillful employees due to the advancement of technology over time. Therefore, employees training and development is compulsory for every organization for its survival because employees are the main asset for any organization and it determines success or failure. The main objective of this research is to examine the effect of training and development on individual motivation and work performance and also find out the mediation influence of employee motivation on the association of training and development with work performance. Because, as it is seen from literature, researches which had been carried out previously in this specific area in the context of the telecommunication industry are not sufficient.

3. METHODOLOGY

3.1. Participants and Procedure

In this specific research, data is collected from employees of multinational organizations working in Pakistan. Currently, many multinational telecommunication companies are

working. Due to Covid-19 pandemic consequences, it is decided to collect the data online instead of physically distribution of questionnaires in target organizations, therefore online survey link was shared. To be more specific, only targeted those employees who are working in twin cities of Federal Capital Territory (FCT) Islamabad and Rawalpindi within state of Pakistan. Convenience sampling is opted and final sample of 304 respondents were measured out of which 34.5% were female and 65.5% were male. Different characteristics of sample detail is given below in Table 1, which include qualification in which postgraduate participants were mainly 21.7%, Graduate participant were mainly 34.2% and undergraduate were 44.1% respectively. Moreover, participants with 1 to 4 years of industrial experience were 28.9%, experience with 5 to 8 years was 24.7%, less than 1 year of experience was 34.9% and above 8 years of experience were only 11.5 % of respondents. Furthermore, the 25 years or under were 48.4% the majority of employees, 26 to 40 years of age group were 39.5% and above 40 were only 12.2% of respondents. Finally, the details are mentioned in below Table 1.

Table 1. Detail of Sample Characteristics

Characteristics	Detail	Number	Percentage (%)
Gender	Male	199	65.5%
	Female	105	34.5%
Qualification	Undergraduate	134	44.1%
	Graduate	104	34.2%
	Post Graduate	66	21.7%
Age	25 years or under	147	48.4%
	26 to 40 years	120	39.5%
	Above 40	37	12.2%
Experience	< 1 year	106	34.9%
	1 - 4 years	88	28.9%
	5 - 8 years	75	24.7%
	Above 8 years	35	11.5%

3.2. Scales

Different reliable measures by former researchers were considered which was already used in different researches to test the different hypothesizes of this research. Training and development is measured using the nine-item which was developed by Boon, Den Hartog, Boselie and Paauwe (2011). Similarly, intrinsic motivation is measured using six-items and work performance is measured using the ten-items developed by Kuvaas and Dysvik (2009). All items were measured on five-point likert scale.

Table 2. Descriptive Statistics, Mean, Standard Deviation and Correlation Analysis

Variable	Mean	SD	TD	IM
TD	3.1564	1.07740		
IM	3.3053	1.02413	.490**	
WP	3.3658	1.06320	.580**	.650**

Where $N = 304$, TD = training and development, IM = intrinsic motivation, WP = work performance ** $p < 0.01$

Table 2 which exhibits mean values, standard deviation and correlation of training and development, intrinsic motivation and work performance. In the research, Cronbach's Alpha reliability of Training and Development is (0.946), Intrinsic Motivation is (0.931) and Work Performance is (0.953) which lies between the range of 0.70 – 0.90; therefore, that shows results are reliable (Hair, Anderson, Tatham & Black, 1998).

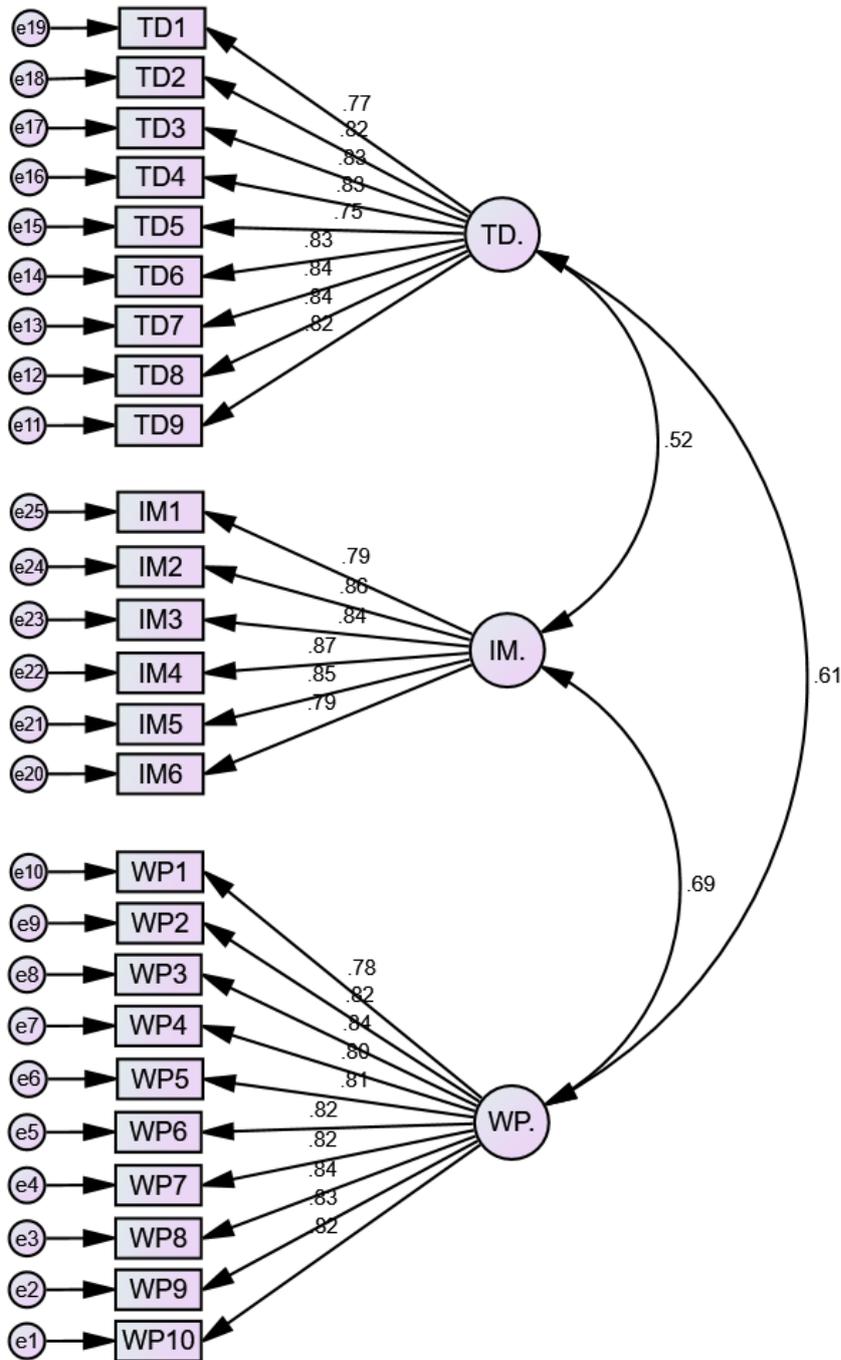


Figure 2. Path Diagram

For all variables, Average Variance Extracted (AVE) and Construct Reliability (CR) were measured and the factor loading of each item equal to or more than 0.50 would be consider valid (Cua, McKone & Schroeder, 2001). All twenty-five items were valid, which is shown in the below path diagram in Figure 2. AVE more than 0.50 signifies the instrument is valid (Fornell & Larcker, 1981).

4. ANALYSIS AND RESULTS

Structural Equation Modeling (SEM) is used for data analysis and Confirmatory Factor Analysis (CFA) was performed for instrument validity. SEM is executed to examine the links between training and development, intrinsic motivation and work performance and mediating influence of intrinsic motivation between training and development and work performance.

In 2000, Steenkamp and Baumgartner described the CFA approach to measure the strength and weakness of latent variables. The psychometric properties which were generally comprised of Adjusted Goodness of Fit Index (AGFI), Chi-Square, Goodness of Fit Statistic (CMIN/DF), Comparative Fit Index (CFI), the Goodness of Fit Index (GFI), Root Mean Square Error of Approximation (RMSEA), Tucker-Lewis Index (TLI). The model seems to be fit if the RMSEA value were 0.08 or less. In addition to this value of AGFI, CFI, GFI and TLI were closer to 0.95 or higher and CMIN/DF would be from 3.0 to 5.0 (Bentler & Bonett, 1980), path analysis, structural equation modeling, and related multivariate statistical methods are based on maximum likelihood or generalized least squares estimation developed for covariance structure models (Hu & Bentler, 1999) which includes using the maximum likelihood (ML). Model fitness index direct and indirect effects are shown in Table 3.

Table 3. Model fit index

Indexes of fit factors	Direct effect	Indirect effects values	Acceptable threshold levels
χ^2/ df	2.927	2.787	3.0 to 5.0
AGFI	0.828	0.800	Closer to 0.95 or higher
TLI	0.933	0.920	Closer to 0.95 or higher
RMSEA	0.080	0.077	0.08 or less
GFI	0.863	0.826	Closer to 0.95 or higher
CFI	0.941	0.927	Closer to 0.95 or higher
NFI	0.914	0.901	Closer to 0.95 or higher

It is hypothesized that training and development leads to work performance among employees of telecommunication industry, the direct influence of training and development on work performance without mediation is shown below in Figure 3. These results stated that training

and development influences the work performance positively therefore, it supports hypothesis 1 and proves that training and development is an essential predictor of work performance, and details are mentioned in Table 4.

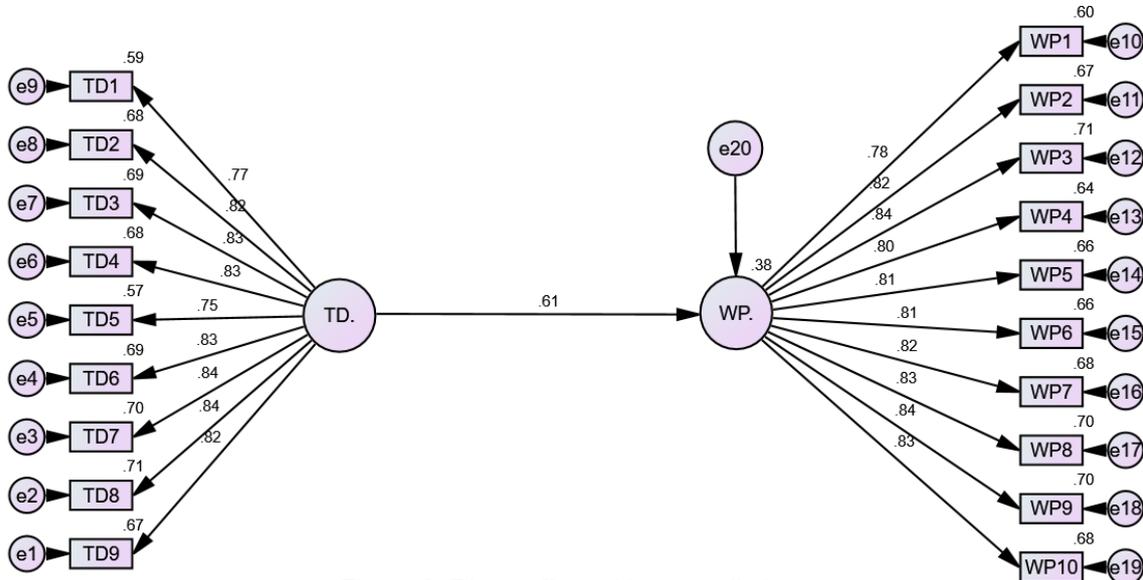


Figure 3. Direct effect without mediation

Similarly, it is hypothesized that training and development maximizes intrinsic motivation and further intrinsic motivation maximize the work performance among employees. The indirect influence of training and development on work performance with the mediation of intrinsic motivation is shown below in Figure 4. Here, results stated that training and development positively influences intrinsic motivation and also intrinsic motivation positively influences work performance. Therefore, it supports hypothesis 2 and hypothesis 3, and details are mentioned in Table 4.

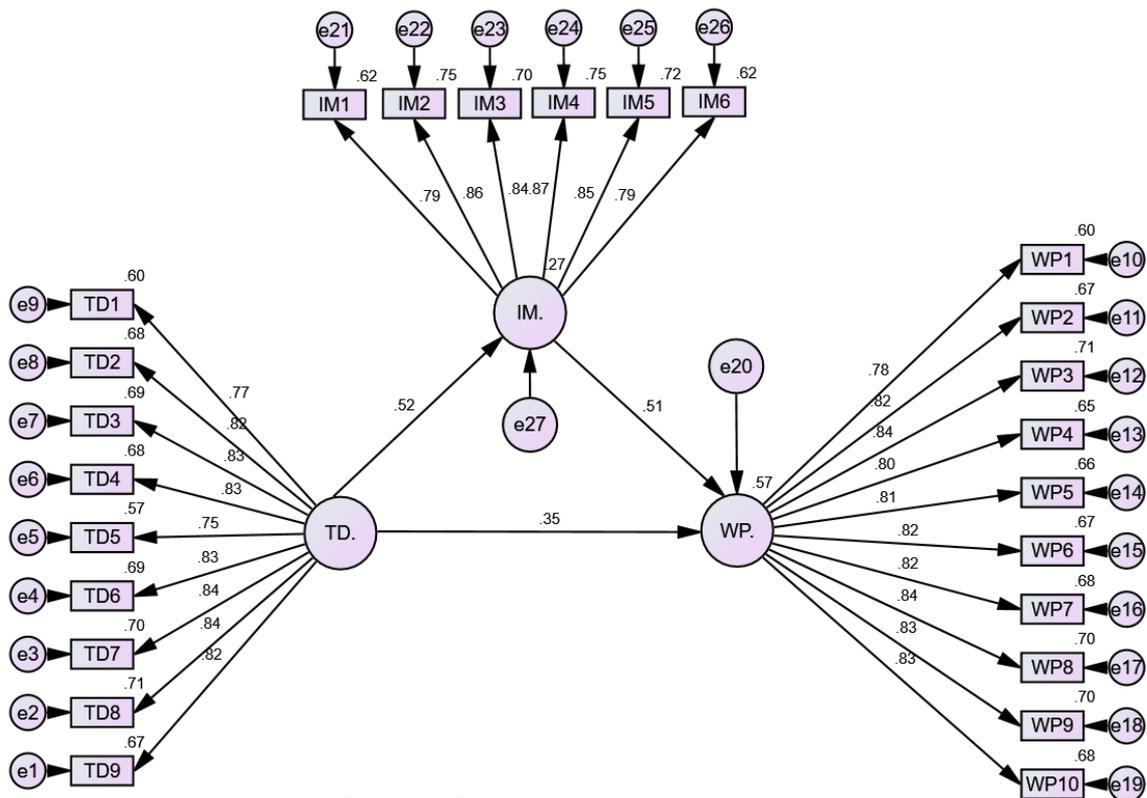


Figure 4. Indirect effect with mediator (Intrinsic Motivation)

Likewise, to confirm the mediation hypothesis requires direct, indirect, and total effects under mediation analysis are shown in table 4. Moreover, the presence of mediator i.e. intrinsic motivation between training and development and work performance, the indirect effect is significant but reduced compared to the direct effect of training and development on work performance, and the decrease in beta indicates the occurrence of partial mediation, so, therefore, it supports hypothesis 4 and details are mentioned in Table 4. Training and development, intrinsic motivation and work performance are variables having positive impact on each other (Kompaso & Sridevi, 2010).

Table 4. Mediation Analysis

Model 1			Model 2			Model 3	
Total Effect			Direct Effect			Indirect Effect	
Path	Coefficient	S.E	Path	Coefficient	S.E	Path	Coefficient
TD→WP	0.613***	.054	TD→WP	0.348***	.048	TD→IM→WP	0.265***
WP→IM	0.520***	.056					
IM→WP	0.510***	.056					

Where N = 304, TD = training and development, IM = intrinsic motivation, WP = work performance ***p < 0.001

5. CONCLUSIONS AND LIMITATIONS

Developing country like Pakistan the demanding of the two sector is increasing, first one is telecommunication and other is Information Technology. Organizations are facing much difficulties regarding performance of employees and most of individuals are not aware very well about telecom, because employees of developing countries in most of the organizations are doing paper work generally but due to advancement in technologies mostly organizations are shifting their work from physically to online. Intrinsic motivation states that, employee who takes more interest in works and enjoy while performing their job, when they are doing their job they enjoy the works. When employee feel internally satisfied they keep positive motivation to arise to gain some external reward such as bonuses, prize and money because these rewards put energy to take more interest in job and internally they feel satisfaction. It is founded that training and development directly affects work performance of employees of telecommunication industry in FCT Islamabad and Rawalpindi. Former researchers revealed that training and development increase individual growth as well as organizational performance and create awareness among employees (Aguinis & Kraiger, 2009; Ibrahim et al., 2017; Losch et al., 2016), Similarly, it is found that training and development positively influence intrinsic motivation, correspondingly, the earlier research discovered training and development are linked with the motivation of personals which can stimulate or debilitate the employee and influence the worker separately (Hung & Wong, 2007; Tharenou, 2001), similarly, organizations require training and development programs to motivate their workers (Bayraktaroğlu & Čičkušid, 2013). Moreover, it is found that intrinsic motivation has a significantly optimistic influence on work performance consistently to former research in which intrinsic motivation is associated with performance (Bosco & Sreedhara, 2017; Tripathi & Tripathi, 2018). Finally, results revealed that an increase in intrinsic motivation among employees weakens the association of training and development, and work performance to

some extent but is still significant which exhibits that intrinsic motivation partially mediates this relationship which is somehow consistent with past research in which, work performance is depend on appropriate training and coaching, so, therefore, intrinsic motivation may play a necessary role in this regard in any organization (Adejare et al., 2020; Bosco & Sreedhara, 2017). So therefore, intrinsic motivation plays major role in training and development and performance of individuals of telecommunication industry. Overall, these results should assist the management of the different organizations to take protective measures for their staffs for better performance by increasing their intrinsic motivation through addressing the concerns of employees i.e. training, procedures, awareness, efficiency of a mixture of tools etc. Management of organizations with their leadership should adopt strategies for implementation to get desired results.

The main limitation of this research is that it was carried out in the federal capital territory of Pakistan, Islamabad and Rawalpindi city, which is an urban area that is included in the highest positive rate of Corona affected cities, therefore it is confined to the capital territory and Rawalpindi. Future studies should focus on different regions with other jurisdictions locally or internationally, which may be contributed to the betterment of organization as well as economy of the country.

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