


MANAGERIAL KNOWLEDGE AND SKILLS TRANSFER PRACTICES IN BANGLADESH

Md. Ashraful Alam<sup>A</sup>, Razu Ahmed<sup>B</sup>, Shakhawat Hossain Sarkar<sup>C</sup>



ARTICLE INFO	ABSTRACT
<p><b>Article history:</b></p> <p><b>Received</b> 20 February 2023</p> <p><b>Accepted</b> 08 May 2023</p>	<p><b>Purpose:</b> The favorable attitude of the trainees and a transfer-friendly climate are highly expected for effective training transfer. Therefore, the purpose of this study was to examine the characteristics of trainees and the work environment in transferring managerial knowledge and skills to the job.</p>
<p><b>Keywords:</b></p> <p>Transfer of Training; Trainee Characteristic; Peer Support; Supervisor Support; Managerial Knowledge Skills.</p>	<p><b>Theoretical framework:</b> This study focuses on three factors considering both the characteristics of trainees and the role played by their peers and supervisors, in relation to the transfer of training based on the theories of training transfer.</p> <p><b>Methodology:</b> Data was collected from service holders who completed an MBA degree from a weekend/evening program, using a structured questionnaire. The number of usable questionnaires was 302. The Garret ranking method and structural equation modeling (SEM) with Amos 23 was used to analyze the research data.</p>
	<p><b>Findings:</b> This study found that peer and supervisor assistance for training transfer was not satisfactory. Lack of autonomy, shortage of the required materials in the workplace, as well as an excessive workload, were identified as noteworthy impediments in the transfer of training.</p> <p><b>Research, Practical and Social implication:</b> This study could increase recognition among coworkers and managers about the significance of supporting fellow workers in applying their recently acquired knowledge and abilities on the job. Additionally, the authorities might receive advice on how to create a congenial environment for training transfer in their organization.</p> <p><b>Originality/Value:</b> Assessment of training application and transfer practices would become helpful for Bangladesh to ensure progress and development as a developing country.</p> <p>Doi: <a href="https://doi.org/10.26668/businessreview/2023.v8i5.2068">https://doi.org/10.26668/businessreview/2023.v8i5.2068</a></p>

PRÁTICAS DE TRANSFERÊNCIA DE HABILIDADES DE GESTÃO E CONHECIMENTO EM BANGLADESH

RESUMO

**Objetivo:** A atitude favorável dos estagiários e um clima propício para a transferência são altamente esperados para alcançar uma transferência efetiva de treinamento. Portanto, o objetivo deste estudo foi examinar as características dos estagiários e do ambiente de trabalho na transferência de conhecimentos e habilidades gerenciais para o trabalho.

<sup>A</sup> MBA in Management. Associate Professor. Department of Human Resource Management, Jatiya Kabi Kazi Nazrul Islam University. Bangladesh. E-mail: [alamashraful0208@gmail.com](mailto:alamashraful0208@gmail.com)

Orcid: <https://orcid.org/0000-0002-5151-5624>

<sup>B</sup> PhD. Professor. Department of Accounting and Information Systems. Jatiya Kabi Kazi Nazrul Islam University. Bangladesh. E-mail: [razuahmed99@yahoo.com](mailto:razuahmed99@yahoo.com) Orcid: <https://orcid.org/0009-0009-0128-1522>

<sup>C</sup> PhD. Professor. Department of Accounting and Information Systems. Jatiya Kabi Kazi Nazrul Islam University. Bangladesh. E-mail: [sarkar\\_knu@jknui.edu.bd](mailto:sarkar_knu@jknui.edu.bd) Orcid: <https://orcid.org/0000-0001-5528-896X>

**Enquadramento teórico:** Este estudo centra-se em três fatores que consideram quer as características dos formandos, quer o papel desempenhado pelos seus pares e supervisores, relativamente à transferência de formação com base nas teorias de transferência de formação.

**Metodologia:** Os dados foram coletados de servidores que concluíram um MBA de um programa de fim de semana/noite, por meio de um questionário estruturado. O número de questionários utilizáveis foi de 302. O método de classificação de Garrett e modelagem de equações estruturais (SEM) com Amos 23 foram usados para analisar os dados da pesquisa.

**Resultados:** Este estudo constatou que a assistência de colegas e supervisores para transferência de treinamento foi insatisfatória. A falta de autonomia, a escassez de materiais necessários no local de trabalho, bem como a carga horária excessiva, foram apontados como obstáculos importantes na transferência da formação.

**Implicações para pesquisa, prática e sociedade:** Este estudo pode aumentar o reconhecimento entre colegas e gerentes da importância de apoiar os trabalhadores na aplicação de seus conhecimentos e habilidades recém-adquiridos no trabalho. Além disso, as autoridades poderiam receber recomendações sobre como criar um ambiente propício para a transferência de treinamento em sua organização.

**Originalidade/Valor:** A avaliação das práticas de aplicação e transferência de treinamento seria útil para Bangladesh para garantir o progresso e o desenvolvimento como um país em desenvolvimento.

**Palavras-chave:** Transferência de Treinamento, Características do Aluno, Apoio dos Pares, Apoio do Supervisor, Conhecimentos e Habilidades de Gestão.

## PRÁCTICAS DE TRANSFERENCIA DE CONOCIMIENTOS Y HABILIDADES GERENCIALES EN BANGLADESH

### RESUMEN

**Finalidad:** La actitud favorable de los aprendices y un clima propicio para la transferencia son altamente esperados para lograr una transferencia efectiva del entrenamiento. Por lo tanto, el propósito de este estudio fue examinar las características de los aprendices y del entorno laboral en la transferencia de conocimientos y habilidades gerenciales al trabajo.

**Marco teórico:** Este estudio se centra en tres factores que consideran tanto las características de los aprendices como el papel desempeñado por sus compañeros y supervisores, en relación con la transferencia de entrenamiento basada en las teorías de la transferencia de entrenamiento.

**Metodología:** Se recopilaron datos de titulares de servicios que completaron un MBA de un programa de fin de semana / nocturno, utilizando un cuestionario estructurado. El número de cuestionarios utilizables fue 302. Se utilizó el método de clasificación Garret y el modelado de ecuaciones estructurales (SEM) con Amos 23 para analizar los datos de investigación.

**Resultados:** Este estudio encontró que la asistencia de compañeros y supervisores para la transferencia de capacitación no fue satisfactoria. La falta de autonomía, la escasez de materiales requeridos en el lugar de trabajo, así como una carga de trabajo excesiva, fueron identificados como obstáculos importantes en la transferencia de capacitación.

**Consecuencias para la investigación, la práctica y la sociedad:** Este estudio podría aumentar el reconocimiento entre compañeros y gerentes sobre la importancia de apoyar a los trabajadores en la aplicación de sus conocimientos y habilidades recién adquiridos en el trabajo. Además, las autoridades podrían recibir recomendaciones sobre cómo crear un ambiente propicio para la transferencia de capacitación en su organización.

**Originalidad/valor:** La evaluación de las prácticas de aplicación y transferencia de la capacitación sería útil para Bangladesh para asegurar el progreso y el desarrollo como un país en desarrollo.

**Palabras clave:** Transferencia de Capacitación, Características del Aprendiz, Apoyo de Compañeros, Apoyo de Supervisores, Conocimientos y Habilidades Gerenciales.

## INTRODUCTION

Transfer of training refers to the continuous and effective application of the learning (knowledge, skills, behaviors, cognitive strategies) into the job what the trainees acquired from training (Noe, 2008). Formal education or training programs help to develop human resources

of the organizations. Management courses are crucial in enhancing the managerial skills of participants and helping them adapt to the ever-changing business environment (Nyaribo et al., 2012). In particular, executive MBA programs provide highly motivated, mature, and experienced managers with the opportunity to gain advanced knowledge in management (Crotty & Soule, 1997). The Master of Business Administration (MBA) course is a popular management training program for managers seeking to enhance their managerial skills (Cheng, 2000).

An effective MBA program is a combination of business education and training, where education deals with the acquisition of knowledge, while the focus of training is on skills development. Training is considered effective if trainees successfully transfer the acquired knowledge, skills, and attitude to their jobs. Many trained individuals reportedly failed to transfer their competencies to the workplace. Researchers have long examined the problem of transfer of training (Grossman & Salas, 2011). Participants often fail to transfer optimally what they have learned in the training programs to their everyday work life (Tonhauser & Buker, 2016). Billions of dollars spent annually on the development program of the employees, but most of the transfer process is not well understood (Paradise, 2007; Martin, 2010; Grossman & Salas, 2011). Assessing the efficiency of the training program and validating its current structure has become increasingly popular in the market. There is now a considerable demand for optimal and productive training structures within organizations (Sivathanu & Radhika, 2023). An investment in a training and development program is considered effective when it becomes possible to successfully transfer the learned content to practical situations (Tonhauser & Buker, 2016). The 'transfer problem' is a persistent challenge for organizations that want to benefit from training because trained skills are often not utilized on the job after training (Hughes, Zajac, Spencer & Salas, 2018). Organizations can accomplish their desired goals only when employees use their newly acquired talents in their work. However, it is often observed that employees transfer only a small portion of their newly acquired skills, which poses a significant challenge. Therefore, it is crucial for organizations to recognize these barriers and work towards eliminating them, as suggested by scholars such as Bhatti, Ali, Isa and Battour (2014) and Turab and Casimir (2015). The success of a development program now heavily depends on the ability of trainees to apply the skills and knowledge acquired from the training program to their job, which is why there is growing concern over the transfer of training (Khan, Mufti & Nazir, 2015). The study regarding the transfer of educational knowledge such as MBA is highly cautious. There is a question being raised about whether the MBA program

can be effectively utilized as a means of developing managerial skills. There is a need to examine knowledge and skills transfer practices among the MBA graduates in view of the growing popularity of the MBA degree (Cheng, 2000). It becomes mandatory to examine the factors that influence the training transfer outcomes, since huge financial and human resources are employed in the training programs (Khan, Mufti & Nazir, 2015). Although research has been conducted on the transfer of different types of knowledge and skills in other countries in recent decades, no significant studies have been found on this issue in Bangladesh. As a result, there is no specific idea about training transfer practices in viewpoint of Bangladesh. Therefore, this study is an attempt to analyze the characteristics of employees and their work environment in transferring newly obtained managerial knowledge and skills to different workplaces in Bangladesh which may be helpful to reduce the literature gap in the field of study. The study also aims to explore the challenges associated with transferring newly obtained managerial knowledge and skills across different organizations in Bangladesh, which may help organizations to achieve their training and development goals.

## **LITERATURE REVIEW**

Transfer of training, a fundamental challenge for researchers and human resources development (HRD) practitioners. The researchers are focused on designing interventions that support individual, collective and organizational performance to transfer training successfully (Burke & Hutchins, 2007). Positive transfer of training is hampered when trainees do not get opportunity to use their newly acquired information in the workplace (Brinkerhoff & Montesino, 1995; Gaudine & Saks, 2004). The process of transferring training is influenced by the readiness of the learner, how they respond to the training, the usefulness of the training, and how well they remember it. The transfer of training is most effective when trainees have a strong belief in their ability to perform well and are motivated to apply what they have learned (Bhatti, Ali, Isa & Battour, 2014). Motivation to transfer can be regarded as the willingness of the trainee to use the knowledge and skills at work which have been acquired through training (Noe, 1986; Axtell et al., 1997; Nijman, et al., 2006). The motivation for transfer is thought to be influenced by trainees' perceptions of the relevance of training to work and their perceptions of the possibilities of using learning at the workplace (Foxon, 1997; Nijman, et al., 2006). Motivational factors have a significant role in predicting training efficacy and training transfer to the workplace (Gegenfurtner et al., 2019). Expected association and contribution were shown to be favorably connected with

attitude toward training transfer. When trainees believe that training transfer would boost their social capital and stature, they are more likely to have a positive attitude toward it (Turab & Casimir, 2015). Baldwin and Ford mentioned that the strongest and most consistent factors with the transfer of training are trainee characteristics, which is composed of cognitive ability, self-efficacy, motivation and perceived utility of training (Grossman & Salas, 2011). Characteristics of the trainee, including skills or abilities, motivation, and personality, are significant factors in training transfer (Baldwin & Ford, 1988). The trainee's characteristics motivate them in learning and transferring. The characteristics of trainees considered to be important in the training transfer process as well as in the design and management of the training program (Nikandrou, Brinia & Bereri, 2009). The above literature indicates a positive relationship between trainees' characteristics and training transfer. Thus, it is hypothesized that:

***H<sub>0:1</sub>***. Trainees' characteristics are positively related to transfer of training in the organizations of Bangladesh.

Transfer climate has been considered as an important condition for transfer of training in views of the trainees. Organizations should focus more on creating supportive environments that enhance relationship among coworkers (Homklin, Takahashi & Techakanont, 2014). A training program can be failed to yield positive outcomes of training if the subsequent work environment does not encourage the use of targeted behaviors even if the programs are adequately planned and administered (Grossman & Salas, 2011). Blume and colleagues (2010) found that the relationship between transfer climate and transfer was stronger than that of other constructs in the work environment (Khan, Mufti & Nazir, 2015). The prevailing new knowledge and skills of the organizational climate plays a significant role on whether the transfer will take place or not (Rouiller & Goldstein, 1993; Tracey et al., 1995). A supportive climate helps the trainees to adopt with the transfer strategies and increases the transfer of learning (Burke & Baldwin, 1999).

Superiors and colleagues are important factors of training transfer mentioned in the literature (Goldstein & Musicante, 1986; Noe & Schmitt, 1986; Baldwin & Ford, 1988; Nikandrou, Brinia & Bereri, 2009). Knowledge transfer is affected by supervisors' roles in training program culture. Supervisors' ability to properly practice direct communication (empathy and support, open communication, respect and guidance) and training feedback (i.e., providing suggestions for improvement, performance evaluation) in carrying out daily tasks strongly invoke employees' intrinsic training motivation (Mohamad & Rahman, 2023).

Support from managers and supervisors have been considered to be one of the most powerful tools that play a crucial role in the achievement of transfer of training (Baldwin & Ford 1988; Nijman, et al., 2006). The extent to which supervisors assist in case of maximizing workers' utilization to transfer information and abilities to the job can be defined as supervisor support. Several forms of assistance have been recommended for the trainees, including emotionally and practically before, during, and after training (Nijman, et al., 2006). Support from the supervisor is found to be positively correlated with trainee motivation. A significant association between general supervisor assistance and transfer results has also been shown in various researches (Cromwell & Kolb, 2002; Nijman, et al., 2006). It has been established by Broad and Newstrom in 1992 that managers and supervisors of the trainees played a major role in the transfer process (Khan, Mufti & Nazir, 2015). The assistance of supervisors, in particular, has been identified as the component that influences training transfer procedures the most but has been least studied (Blume et al., 2010). Most of the study found a positive relationship between supervisors' support and training transfer. Thus, it is hypothesized that:

***H<sub>0</sub>:2.*** Supervisors' support is positively related to transfer of training in the organizations of Bangladesh.

Peer support lessened the consequences of a hostile environment. Peer support enabled learners in a bad environment to transmit knowledge just as effectively as those in a good environment. If peer support is present, trainees transfer the same degree in both good and unfavorable environments. Peer support has the ability to surpass the impact of more remote factors, such as climate, in fostering transfer (Martin, 2010). Peer support refers to peers' behaves in a way that helps to maximize trainees' utilization of their on-the-job training. The motivation of trainees for training and transfer is thought to be influenced by peer support (Noe, 1986; Nijman, et al., 2006). Peer support is one of the most important elements of the workplace that has an influence on how acquired information and skills are used on the job (Baldwin & Ford, 1988). The influence of peers on the motivation to transfer is greater than that of supervisors (Yaghi & Bates, 2020). Employees are more likely to complete tasks at higher levels when they perceive strong levels of peer support for training transfer (Tian et al., 2016). Peers might even aid to lessen a negative environment by offering support and boosting confidence (Martin, 2010). Organization needs to be proactive in establishing a conducive atmosphere to ensure transfer of training through increasing the relationship among the peers

(Najeemdeen et al., 2018). The literatures suggest that there is a positive correlation between the characteristics of trainees and the transfer of training. Thus, it is hypothesized that:

***H<sub>0</sub>:3.*** Peers' support is positively related to transfer of training in the organizations of Bangladesh.

## **METHODOLOGY**

The study was mostly based on primary sources of data. A cross-sectional survey design was used to understand the attitude of the respondents on this issue. Though the evening MBA program is conducted by most of the business faculties in the public universities of Bangladesh; University of Dhaka, University of Rajshahi, University of Chittagong, Islamic University, Jatiya Kabi Kazi Nazrul Islam University and Begum Rokeya University were selected as the study area for collecting data in this study. The universities of Bangladesh were divided into three strata on the basis of the establishment period and then two universities were selected from each of the strata by using simple random sampling technique for selecting the study area. A questionnaire survey method was used for collecting data from the professionals as alumni of the evening MBA programs, those admitted between the 2015 to 2017 session with work experience and obtained the degree successfully. Most of the questions were formed in the pattern of 5- point likert type scale ranges between 1 and 5. Moreover, the respondents were requested to organize a rank based on the challenges of training transfer mentioned in the questionnaire. It was become possible to contact with the 589 potential respondents from the list preserved by the academic sections of the evening MBA programs. A structured questionnaire was developed with the help of Google form and e-mailed as well as sent the link through messenger. A follow-up reminder was also sent to the respondents after three weeks of the initial mailing. Moreover, the questionnaire was posted in some groups of the alumni of the evening MBA programs available in the social groups with the help of the former class representatives. A total 327 alumni responded, though the usable response was 302, where the numbers of the male and female were 244 and 58, respectively. The majority of the respondents belonged to the age groups of 36-40 (42.7%) and 31-35 (32.1%). Most of the respondents (65.2%) were the employees of the private organizations in this study, whereas the number of the employees from government organization was 28.1 percent. A larger number of the respondents had 3 to 5 years of job experience after accomplishing the MBA degree. Garret ranking method and structural equation modeling (SEM) with Amos 23 were used to analyze the research data.

Table 1: Demographics

Characteristics	Frequency	Percent
<b>Gender:</b>		
Male	244	80.8
Female	58	19.2
<b>Age:</b>		
26-30	17	5.6
31-35	97	32.1
36-40	129	42.7
>40	59	19.5
<b>Type of employment</b>		
Private	197	65.2
Government	85	28.1
Autonomous	18	6
Others	2	0.7
<b>Total job experience:</b>		
1-5	78	25.8
6-10	139	46
11-15	75	24.8
>16	10	3.3
<b>Job experience after obtaining the MBA degree:</b>		
≤ 2	125	41.4
3-5	148	49
6-8	27	8.9
>8	2	0.7
<b>The evening/weekend MBA degree obtained from:</b>		
University of Dhaka	67	22.2
University of Rajshahi	53	17.5
University of Chittagong	45	14.9
Islamic University	31	10.3
Jatiya Kabi Kazi Nazrul Islam University	70	23.2
Begum Rokeya University	36	11.9

Source: Prepared by the authors (2023)

## RESULTS AND DISCUSSION

### Application of Garret's Ranking Technique in Identifying the Impediments

Garrett's Ranking Technique was used in this study to rank the different problems of the training transfer practices mentioned by the respondents. The following table represented the responses of the respondents regarding the reasons of training transfer problems in the organizations of Bangladesh.



Table 2: Impediments of Transferring Managerial Knowledge and Skills on the Job

Challenges of transferring managerial knowledge and skills	Ranks given by the Respondents							
	1 <sup>st</sup>	2 <sup>nd</sup>	3 <sup>rd</sup>	4 <sup>th</sup>	5 <sup>th</sup>	6 <sup>th</sup>	7 <sup>th</sup>	8 <sup>th</sup>
Lack of employees' ability	29	10	10	12	17	116	43	65
Lack of employees' interest in case of learning	12	29	4	10	14	53	151	29
Lack of employees' interest in case of transferring newly learned managerial knowledge and skills	7	4	29	12	17	63	27	143
Lack of expected cooperation from the supervisor	36	88	58	72	43	01	—	4
Lack of anticipated support from the colleagues	101	76	52	43	26	4	—	—
Lack of autonomy (freedom)	53	58	110	19	18	32	8	4
Excessive workload	43	35	21	99	35	15	45	9
Lack of required materials	21	2	18	35	132	18	28	48

Source: Prepared by the authors (2023)

### Percent Positions

The percent position estimated is converted into scores according to the table specified by Garret and Woodworth (1973).

$$\text{Percentage position} = \frac{100 \times (R_{ij} - 0.50)}{N_j}$$

Where

$R_{ij}$  = Rank given for the  $i$ th variable by  $j$ th respondents

$N_j$  = Number of variable ranked by  $j$ th respondents

Table 3: Percent Positions and Garret Values

SL No.	$100(R_{ij}-0.5)/N_j$	Calculated Value	Garret Value
1	$100(1-0.5)/8$	6.25	80
2	$100(2-0.5)/8$	18.75	68
3	$100(3-0.5)/8$	31.25	60
4	$100(4-0.5)/8$	48.75	51
5	$100(5-0.5)/8$	56.25	47
6	$100(6-0.5)/8$	68.75	40
7	$100(7-0.5)/8$	81.25	32
8	$100(8-0.5)/8$	93.75	20

Source: Prepared by the authors (2023)

### Calculation and Interpretation of Garret Value and Ranking

The Garret ranks were calculated by using appropriate Garret Ranking formula, where the garret value was calculated based on the Garret ranks. The total Garret score was obtained by multiplying the scores of each problem in the frequency table with the Garret values in the

next table and then adding each row. The mean value is obtained by dividing the total value of the score by the total number of respondents. The most important factor is determined based on the highest mean value. The factors with the mean value indicate how significant it is in the order.

The calculation of Garret value and ranking of reasons related to the training transfer problems have been presented below:

Table 4: Order of the Challenges according to the Garret's Ranking Method

Challenges of transferring managerial knowledge and skills	Ranks given by the respondents								Total	Average	Rank
	1 <sup>st</sup>	2 <sup>nd</sup>	3 <sup>rd</sup>	4 <sup>th</sup>	5 <sup>th</sup>	6 <sup>th</sup>	7 <sup>th</sup>	8 <sup>th</sup>			
Lack of employees' ability	2320	680	600	612	799	4640	1376	1300	12327	40.82	VI
Lack of employees' interest in case of learning	960	1972	240	510	658	2120	4832	580	11872	39.31	VII
Lack of employees' interest in case of transferring newly learned managerial knowledge and skills	560	272	1740	612	799	2520	864	2860	10227	33.86	VIII
Lack of expected cooperation from the supervisor	2880	5984	3480	3672	2021	40	—	80	18157	60.12	III
Lack of anticipated support from the colleagues	8080	5168	3120	2193	1222	160	—	—	19943	66.04	I
Lack of autonomy (freedom)	4240	3944	6600	969	846	1280	256	80	18215	60.31	II
Excessive workload	3440	2380	1260	5049	1645	600	1440	180	15994	52.96	IV
Lack of required materials	1680	136	1080	1785	6204	720	896	960	13461	44.57	V

Source: Prepared by the authors (2023)

Garret's Ranking Techniques showed that the lack of peer support is highly responsible for poor training transfer where the highest Garret score observed 19943 and an average score was 66.04. Lack of autonomy observed as the second reasons for meager training transfer perceived by the 18215 Garret score and 60.31 average score. The Garret score in case of the expected supervisor's support found 18157 and average score 60.12 which recognized as the third reasons of poor transfer of training. Lack of employees' interest in case of transferring newly learned managerial knowledge and skills, Lack of employees' interest in case of learning and Lack of employees' ability identified as the less significant reasons of poor training transfer in the organization addressed with the average scores 33.86, 39.31 and 40.82 sequentially. Significant barriers to training transfer include inadequate materials and excessive workload.

### Analysis with Structural Equation Modeling (SEM)

Table 5 shows that the internal consistency of all scales is above then 0.7, which indicates that all scales have higher internal consistency level (Hair, Black, Babin, & Anderson, 2010).

Table 5: Reliability of the Scale

Name of the variables	Internal consistency
Trainees' Characteristics	0.983
Supervisors' support	0.985
Peers' support	0.940
Transfer of training	0.975

Source: Prepared by the authors by using Amos 23 (2023)

### Convergent Validity and Discriminant Validity

Convergent and Discriminant validity were used to evaluate the construct validity of the research variables. The degree to which various measurements of the same construct have strong correlations is known as convergent validity (Hair et al., 2010). Factor loadings and Average Variance Extracted (AVE) were used for measuring convergent validity, which should be more than 0.5 (Fornell & Larcker, 1981; Hair et al., 2010). In Table 6, it was observed that the values of the factor loadings and the average variance extracted (AVE) were both above 0.5.

Table 6: Convergent Validity

Construct/ Variable	Item/ Composite	Factor Loadings	Variance	SSL	AVE
Trainees' Characteristics	CT1	0.984	0.968	2.85	0.951
	CT2	0.976	0.952		
	CT3	0.966	0.933		
Supervisors' support	S1	0.925	0.919	1.77	0.887
	S2	0.959	0.855		
Peers' support	P1	0.977	0.954	2.86	0.955
	P2	0.974	0.948		
	P3	0.981	0.962		
Transfer of training	TT1	0.974	0.948	1.90	0.952
	TT2	0.978	0.956		

Source: Prepared by the authors by using Amos 23 (2023)

### Discriminant Validity

Discriminant validity evaluates if there are associations among the measurements of variables that are not expected to be related, guaranteeing that a construct is not overly linked with measures from which it is intended to diverge (Campbell, 1960 as cited in Chauhan et al., 2017). In Table 7, the square roots of AVE are leading diagonals (shown in bold), and the lower half entries are correlation coefficients. Discriminant validity is measured by comparing square root of AVE with the latent variables correlation. The values of square root of AVE have to be more than the values of latent variables correlation for ensuring Discriminant validity.

Table 7: Discriminant Validity

	Trainees' Characteristics	Supervisors' support	Peers' support	Transfer of training
Trainees' Characteristics	<b>0.97536113</b>			
Supervisors' support	0.652**	<b>0.942153385</b>		
Peers' support	0.478**	0.868**	<b>0.97733754</b>	
Transfer of training	0.912**	0.643**	0.486**	<b>0.976002049</b>

Source: Prepared by the authors by using Amos 23 (2023)

### Structural Model Assessment

A structural equation model generated through AMOS was used to test the relationships. A good fitting model was accepted if the value of CMIN/df, the goodness-of-fit (GFI) indices (Hair et al., 2010); the Tucker and Lewis (1973) index (TLI); the Confirmatory fit index (CFI) (Bentler, 1990) is >0.90(Hair et al., 2010). In addition, an adequate fitting model was accepted if the AMOS computed value of the standardized root mean square residual (RMR) <0.05, and the root mean square error approximation (RMSEA) is between 0.05 and 0.08 (Hair et al, 2010).

Table 8: Measurement Model Fit

Model Measurement	Model Score	Acceptable Model Fit	Acceptable Baseline
GFI	0.922	Passed	≥0.90
AGFI	0.851	Passed	≥0.80
RMR	0.026	Passed	≤5
RMSEA	0.095	Passed	<0.10
CMIN/DF	4.996	Passed	≤5
TLI	0.971	Passed	≥0.89
CFI	0.981	Passed	≥0.90
IFI	0.981	Passed	≥0.90

Source: Prepared by the authors by using Amos 23 (2023)

The fit indices for the model shown in Table 8 fell within the acceptable range; CMIN/df= 4.996, the goodness-of-fit (GFI) =0.922, TLI=0.971, CFI= 0.981, RMR=0.026, and RMSEA= 0.095.

### Hypothesis Findings and Discussion

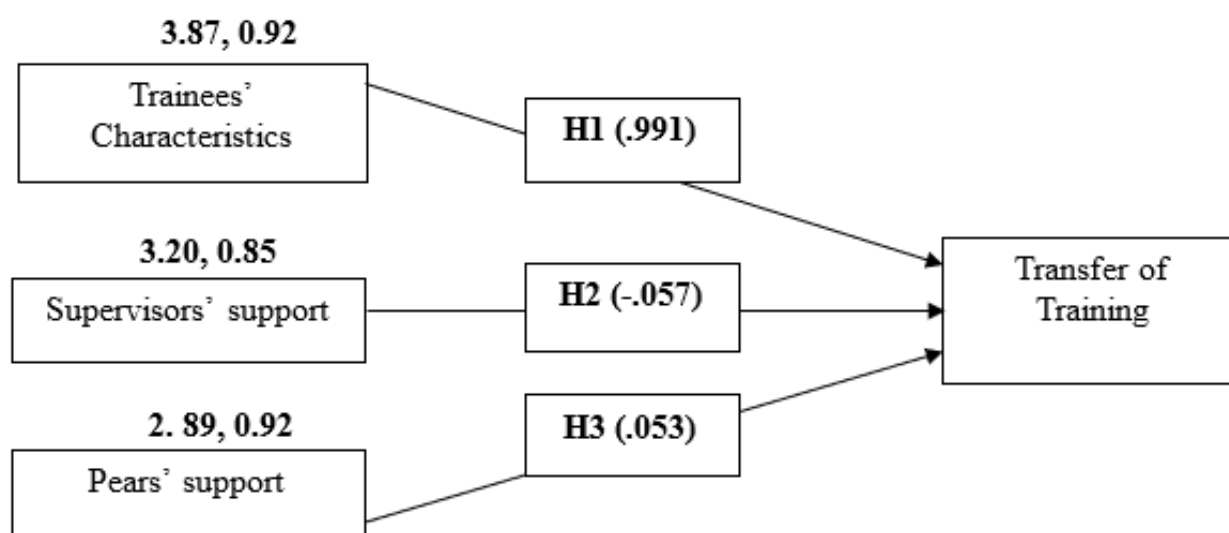
Hypothesis resulting based on path analysis shows that trainees' characteristics are positively and significantly associated with training transfer ( $\beta=0.991$ ,  $P<.05$ ). Supervisors' support negatively and insignificantly effect on training transfer ( $\beta=-.057$ ,  $P>.05$ ). Peers' support showed insignificant influence on transfer of training ( $\beta=.053$ ,  $P>.05$ ). Though H1 is accepted but H2 and H3 is rejected since the p value is insignificant based on these results. Significance level:  $p$ -values < 0.05;  $t$ -value > 1.96 (Hair et al., 2007).

Table 9: Summary of the Analysis of Hypothesis Testing

H. No.	Paths	Estimate	S.E.	C.R.	P	Remarks
H1	Trainees' Characteristics->Training Transfer	.991	.015	67.134	***	H1 Supported
H2	Supervisors' support->Training Transfer	-.057	.140	-.410	.681	H2 Not Supported
H3	Peers' Support->Training Transfer	.053	.031	1.705	.088	H3 Not Supported

Source: Prepared by the authors by using Amos 23 (2023)

The squared multiple correlation was 0.98 for training transfer. It shows that 98% variance in training transfer is announced by trainees' characteristics, supervisor's support and peers' support. The study assessed the impact of trainees' characteristics, supervisor and peer support on training transfer. The impact of trainees' characteristics on training transfer found positive and significant ( $b=1.044$ ,  $t= 49.752$ ,  $p <0.001$ ), where supervisor and peers' support showed insignificant influence on the transfer of training.



Source: Prepared by the authors by using Amos 23 (2023)

The characteristics of the trainees found positively related to transfer of training. The findings are consistent with the prior research on this issue (Baldwin & Ford, 1988; Nijman, et al., 2006, Nikandrou et al, 2009; Bhatti et al., 2014). However, no significant relationship was found between supervisor support and transfer of training though several authors (e.g; Bhatti et al., 2014; Chauhan et al., 2017; Muduli & Raval, 2018) have noted a strong positive correlation between supervisor support and training transfer. Moreover, the peer support in training transfer was also found insignificant in the study. These results are in contrast with previous research (Martin, 2010; Homklin, 2014; Bhatti et al., 2014; Chauhan et al., 2017; Muduli & Raval, 2018;

Yaghi & Bates, 2020). Tian et al. (2016) pointed out that the influence of supervisor/peer support on training transfer is moderated by the regional context, specifically coastal and inland regions, with a more significant effect observed in economically underdeveloped inland regions. The impact of region as a moderator suggests that researchers exploring cross-cultural differences should take into consideration the potential differences in attitudes and values among employees within a country. Holton et al. (2003), as cited in Homklin (2014), cultural variations across organizations could potentially disrupt the influence of various forms of support on the transfer of learning.

## CONCLUSION

Nowadays, many professionals are returning to academia, especially in MBA programs, to enhance their managerial knowledge and skills and meet career demands. The recognition of these newly acquired knowledge and skills by authorities is highly expected for the development of both employees and organizations. The more professionals are able to apply their recently obtained knowledge and skills to their jobs, the more inspired they will be to develop themselves with the required knowledge and skills, which will ultimately bring success to both employees and employers. The failure in achieving expected goals related to the benefits of training program may be a cause of dissatisfaction to both of the employees and employers. Most of the studies express that billions of investment in training programs become futile due to the problems in training transfer. The scenario of newly acquired managerial knowledge and skill transfer practice in the different organizations of Bangladesh is not different. Although employees' abilities and interests in learning, as well as their willingness to transfer newly acquired managerial knowledge and skills, were identified as less significant factors contributing to poor training transfer in the organization, this study observed that the support provided by peers and supervisors for training transfer was dissatisfactory. The study also found that a lack of autonomy and an excessive workload were identified as causes of poor training transfer. These findings may raise awareness among both peers and supervisors about the importance of assisting colleagues with the application of newly acquired knowledge and skills on the job. Additionally, the authorities may receive guidelines on how to ensure a proper environment for training transfer in their organization. Organizations possibly will understand the significance of individual and team performance equally in order to appropriately assess their employees. A behavioral training program based on team building, cohesion, and cooperation could be arranged regularly within the organization to uplift the positive attitude

of employees. Organizations need to take the necessary initiative to train supervisors and colleagues, so they can provide support and encourage workers to use their new skills. If supervisors and colleagues appreciate and encourage the application of training, employees would be more motivated to apply it in the workplace. Organizations should arrange training programs for employees at the same level and at the same time to maximize the transfer of training. However, the research is limited to observing trainees' characteristics and work environment (supervisors and peer support) in transferring managerial knowledge and skills on the job. The role of training design factors in effective training transfer remains an unknown issue in the context of organizations in Bangladesh. Furthermore, this study presents a general state of training transfer practice across different sectors in Bangladesh as a whole. Future research could focus on observing the scenario of training transfer in different sectors of Bangladesh separately. As a developing country, it is high time for Bangladesh to assess the level of training application and transfer practices in different sectors to ensure progress and development.

### ACKNOWLEDGEMENT

The article is part of the research project funded by Jatiya Kabi Kazi Nazrul Islam University, Trishal, Mymensingh-2224, Bangladesh.

### REFERENCES

- Axtell, C. M., & Maitlis, S. (1997). Predicting immediate and longer-term transfer of training. *Personnel Review*, 26(3), 201-213.
- Baldwin, T.T., & Ford, J.K. (1988). Transfer of training: A review and directions for future research. *Personnel Psychology*, 41(1), 63-105.
- Bhatti, M.A., Ali, S., Isa, M.F.M., & Battour, M.M. (2014). Training transfer and transfer motivation: The influence of individual, environmental, situational, training design, and affective reaction factors. *Performance Improvement Quarterly*, 27(1), 51-82.
- Blume, B.D., Ford, J.K., Baldwin, T.T., & Huang, J.L. (2010). Transfer of Training: A Meta-Analytic Review. *Journal of Management*, 36(4), 1065-1105.
- Brinkerhoff, R.O., & Montesino, M.U. (1995). Partnerships for training transfer: Lessons from a corporate study. *Human Resource Development Quarterly*, 6(3), 273-274.
- Broad, M., & Newstrom, J. (1992). *Transfer of Training: Action Packed Strategies to Ensure High Payoff from Training Investments*. New York: Addison-Wesley.

- Burke, L. A., & Hutchins, H. M. (2007). Training transfer: An integrative literature review. *Human Resource Development Review*, 6(3), 263-296.
- Burke, L.A., & Baldwin, T.T. (1999). Workforce training transfer: A study of the effect of relapse prevention training and transfer climate. *Human Resource Management*, 38(3), 227–242.
- Campbell, D.T. (1960). Recommendations for APA test standards regarding construct, trait, or discriminant validity. *American Psychologist*, 15(8), 546-553.
- Chauhan, R., Ghosh, P., Rai, A., & Kapoor, S. (2017). Improving transfer of training with transfer design: Does supervisor support moderate the relationship? *Journal of Workplace Learning*, 29(4), 268-285.
- Cheng, E.W.L. (2000). Test of the MBA knowledge and skills transfer. *The International Journal of Human Resource Management*, 11(4), 837-852.
- Cromwell, S.E., & Kolb, J.A. (2004). An examination of work-environment support factors affecting transfer of supervisory skills training to the workplace. *Human Resource Development Quarterly*, 15(4), 449-471.
- Crotty, P.T., & Soule, A.J. (1997). Executive education: yesterday and today, with a look at tomorrow. *Journal of Management Development*, 16(1), 4-21.
- Elangovan, A.R. & Karakowsky, L. (1999). The effects of trainee and environmental factors on transfer of training: A framework for research. *Leadership and Organizational Development Journal*, 20, 268-275.
- Facteau, J.D., Dobbins, G.H., Russell, J.E.A., Ladd, R.T., & Kudisch, J.D. (1995). The influence of general perceptions of the training environment on retraining motivation and perceived training transfer. *Journal of Management*, 21(1), 1-25.
- Ford, J.K., Quinones, M.A., Segó, D.J., & Sorra, J.S. (1992). Factors affecting the opportunity to perform trained tasks on the job. *Personnel Psychology*, 45, 511-527.
- Fornell, C., & Larcker, D.F. (1981). Evaluating structural equation models with unobservable variables and measurement error. *Journal of Marketing Research*, 18(1), 39-50.
- Foxon, M. (1997). The influence of motivation to transfer, action planning, and manager support on the transfer process. *Performance Improvement Quarterly*, 10(2), 42-63.
- Garrett, H. E., & Woodworth, R. S. (1973). *Statistics in psychology and education*. Bombay, India: Vakils, Feffer and Simons Private Ltd.
- Gaudine, A. P., & Saks, A. M. (2004). A longitudinal quasi-experiment on the effects of posttraining transfer interventions. *Human Resource Development Quarterly*, 15(1), 57– 76.
- Gegenfurtner, A., Knogler, M., & Schwab, S. (2019). Transfer interest: measuring interest intraining content and interest in training transfer. *Human Resource Development International*, 22(1), 1-22.
- Goldstein, I. L., & Musicante, G. R. (1986). The applicability of a training transfer model to issues concerning rater training. In E. A. Locke (Ed.), *Generalizing from laboratory to field settings* (pp. 83-98). Lexington, MA: Lexington Books.



- Grossman, R., & Salas, E. (2011). The transfer of training: What really matters. *International Journal of Training and Development*, 15(2), 103-120.
- Hair, J.F., Black, W.C., Babin, B.J., & Anderson, R. (2010). *Multivariate data analysis* (7th ed.). Boston, MA: Pearson Prentice Hall.
- Homklin, T., Takahashi, Y., & Techakanont, K. (2014). The influence of social and organizational support on transfer of training: Evidence from Thailand. *International Journal of Training and Development*, 18(2), 116-131.
- Hughes, A. M., Zajac, S., Spencer, J. M., & Salas, E. (2018). A checklist for facilitating training transfer in organizations. *Journal of Training and Development*, 2(1), 1-12.
- Israel, G.D. (1992). Determining sample size. Fact Sheet, PEOD-6, University of Florida.
- Khan, I., Mufti, S., & Nazir, A. N. (2015). Transfer of training: A reorganized review on work environment and motivation to transfer. *International Journal of Management, Knowledge and Learning*, 4(2), 197–219.
- Martin, H. J. (2010). Workplace climate and peer support and determinants of training transfer. *Human Resource Development Quarterly*, 21(1), 87-104.
- Martin, H. J. (2010). Improving training impact through effective follow-up: Techniques and their application. *Journal of Management Development*, 29(6), 520-534.
- Mohamad, N. I., Rahman, I. A. (2023). Supervisors' roles in training program culture, training intrinsic motivation and knowledge transfer: An empirical study. *International Journal of Professional Business Review*, 8(2), e01539, <https://doi.org/10.26668/businessreview/2023.v8i2.1539>
- Najeemdeen, I. S., Abidemi, B. T., & Anuforo, P. U. (2018). The relationship between peer relationships on transfer of training among employees. *Asian Journal of Multidisciplinary Studies*, 6(6), 66-72.
- Nijman, D.J.J.M., Nijhof, W.J., Wognum, A.A.M., & Veldkamp, B.P. (2006). Exploring differential effects of supervisor support on transfer of training. *Journal of European Industrial Training*, 30, 529–549.
- Nikandrou, I., Brinia, V., & Bereri, E. (2009). Trainee perceptions of training transfer: An empirical analysis. *Journal of European Industrial Training*, 33(3), 255-270.
- Noe, R. A. (2008). *Employee Training and development*. Tata McGraw-Hill.
- Noe, R. A. (1986). Trainees' attributes and attitudes: Neglected influences on training effectiveness. *Academy of Management Review*, 11, 736-749.
- Noe, R.A. and Schmitt, N. (1986). The Influence of Trainee Attitudes on Training Effectiveness: *Test of a Model*. *Personnel Psychology*, 39, 497-523.
- Nyaribo, M., Prakash, A., & Edward, O. (2012). Motivators of choosing a management course: A comparative study of Kenya and India. *The International Journal of Management Education*, 10, 201-214.

- Paradise, A. (2007). State of the industry: ASTD's annual review of trends in workplace learning and performance. Alexandria, VA: ASTD.
- Pham, N.T.P., Segers, M.S.R., & Gijsselaers, W.H. (2012). Effects of work environment on transfer of training: empirical evidence from Master of Business Administration programs in Vietnam. *International Journal of Training and Development*, 17(1), 1-19.
- Rouiller, J.Z., & Goldstein, I.L. (1993). The Relationship between organizational transfer climate and positive transfer of training. *Human Resource Development Quarterly*, 4, 377-390
- Sivathanu, N., Radhika, R. (2023). A conceptual study to identify the problems & challenges in current training systems in IT industries. *International Journal of Professional Business Review*, 8(4), e01380. <https://doi.org/10.26668/businessreview/2023.v8i4.1380>
- Tian, A. W., Cordery, J., & Gamble, J. (2016). Returning the favor: Positive employee responses to supervisor and peer support for training transfer. *International Journal of Training and Development*, 20(1), 1-16.
- Tonhauser, C., & Buker, L. (2016). Determinants of transfer of training: A comprehensive literature review. *International Journal for Research in Vocational Education and Training (IJRVET)*, 3(2), 127-165.
- Tracey, J.B., Tannenbaum, S.I., & Kavanagh, M.J. (1995). Applying trained skills on the job: The importance of the work environment. *Journal of Applied Psychology*, 80(2), 239- 252.
- Tucker, L. R., & Lewis, C. (1973). A reliability coefficient for Maximum Likelihood Factor Analysis. *Psychometrika*, 38(1), 1-10.
- Turab, G.M., & Casimir, C.G. (2015). A model of the antecedents of training transfer. *International Journal of Training Research*, 13(1), 82-95.
- Yaghi, A., & Bates, R. (2020). The role of supervisor and peer support in training transfer in institutions of higher education. *International Journal of Training and Development*, 24(3), 202-217.