

Influence of Individual Characteristics, Organizational Support System and Learning Organizational Practices in Post-program Transfer of Training: A Study on Management Development Programs of Bangladesh Civil Service

Md Sanwar Jahan Bhuiyan

(Deputy Secretary, Ministry of Public Administration, Bangladesh)

Ph D Candidate, Graduate School of Public Administration

National Institute of Development Administration (NIDA)

Bangkok 10240, Thailand

E-mail: sanwarsamia@gmail.com

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Abstract

Management development programs of Bangladesh Civil Service are traditionally seen as a piecemeal approach; no linkage is found among program performance, transfer performance and career advancement of trained officials. Moreover, no effective mechanism is found in public organization to assess or monitor the issue of post-program transfer of training. The study employed an in-depth investigation into factors affecting post-program transfer of training. It made a detailed investigation into ultimate effectiveness of management development programs by examining contribution of three sets of influencing factors under individual characteristics, work environment (social and logistic support), and learning organizational practices on post-program transfer of training. The study was conducted on two management development courses like Advanced Course on Administration and Development (ACAD) and Senior Staff Course (SSC) by administering survey on purposively selected 212 graduated participants of both the courses. The findings of the study suggest that the predictors like post-program motivation and self-efficacy to transfer, peer support, learning organizational practices like collaboration and team learning and strategic link of transfer performance with career advancement have direct and positive influence on

post-program transfer of training. The findings of the study would guide the policy planner to formulate prudent HRD policy and strategy linking training performance (performance of learning acquisition as well as post program transfer) and career advancement (placement and promotion).

Keywords: Bangladesh Civil Service, Management Development Program, Post-program Transfer of Training, Individual characteristics, Working Condition, Learning Organizational Practices.

1. Introduction

The training and development program for civil services of almost all countries is considered as one of the important policy interventions for managing and retaining capable human resources in public administrative system. Realizing the importance of training and development, Public Administration Training Policy (MoPA, 2003) of Bangladesh intended for need-based and effective program interventions for developing knowledgeable and dynamic managerial leaders for formulating and implementing prudent public policies, rendering cost-effective services to people, innovating citizen-centric services, maintaining capable administrative system and managing change for transforming the public organization into a productive and result-oriented agency. In order to materialize the intended objectives of Public Administration Training Policy, two management development courses have been conducted by Bangladesh Public Administration Training Centre (BPATC) since its establishment in 1984. The Ministry of Public Administration of Bangladesh is the sponsoring agency of these two management development courses. The Advanced Course on Administration and Development (ACAD) is the career development compulsory program for the officers of the rank of Deputy Secretaries to the government and equivalents from different departments. The main focus of ACAD is to develop capacity of policy analysis, strategic management, development management, public service management and negotiation skills. The two-month long Senior Staff Course (SSC) is one of the career development core courses of Bangladesh Civil Service for the Joint Secretaries of the Government and equivalents from different departments. The main focus of the SSC course is to provide participants with an insight to the dynamics of socio-cultural, politico-economic and natural environment of the country so that they can contribute more effectively in formulating pragmatic policies, strategies, plans and programs as well as implement development programs of the government efficiently. But, are the training and management development interventions for Bangladesh Civil Service contributing in achieving those intended outcomes—is a valid question. But, it is a matter of regret that since enactment of PATP in 2003, no initiative has yet been taken nor any institutional mechanism has yet been set up to monitor and evaluation of post-training utilization (PTU) or post-program transfer training of imparted HRD interventions. Among the key stakeholders of management development programs of Bangladesh Civil Service, only training providing agency, like BPATC, traditionally knows about the primary outcomes (reaction and learning) of those management development programs (since the BPATC uses to do end-of-course evaluation of every course). A limited number of follow-up and impact studies are found in Bangladesh which actually displays mixed and incomplete findings about the effectiveness of those programs

and basing on those partial studies it is not possible for policy planners to formulate HRD strategy for senior civil servants of Bangladesh. Second, being the sponsoring organization of those two management development programs, the Ministry of Public Administration (MoPA) is mandated to assess, monitor and study the problems and barriers to post-program transfer of training. But, in real sense, the MoPA does not know the level of transfer of training of sponsored programs nor it has enough empirical information about the level of post-training utilization or level of ultimate outcome and impact of those management development programs. The current study, in this regard, is expected to partially contribute in responsibility of Ministry of Public Administration as a sponsoring organization of management development programs like ACAD and SSC. Third, there is a clear policy-gap regarding guideline of post-training utilization or transfer monitoring in organizational level. What type of policy interventions or what type of monitoring mechanism can be effective to ensure optimum utilization or transfer of training must be known to HRD policy planner. The PATP vests the responsibility of making proper strategy and institutional arrangement for assessing, monitoring and evaluation of post-training utilization to all concerned ministries (MoPA, 2003). The prospective finding and recommendations of current study will make essential recipe for formulation and implementation of strategies for post-program transfer of training. Lastly, the management development programs of BCS have seen as piecemeal approach; no linkage is found among program performance, transfer performance and career advancement of trained officials. The study findings, thus, would guide the policy planner to formulate prudent HRD policy and strategy linking training performance (performance of learning acquisition as well as post program transfer) and career advancement (placement and promotion).

The study employed an in-depth investigation into factors affecting post-program transfer of training. It made a detailed investigation into ultimate effectiveness of training by examining contribution of three sets of influencing factors under individual characteristics, work environment (social and logistic support), and organizational climate as learning organizational practices on transfer of training.

1.1 Research Questions

The research is about studying the level of post-program transfer of training of management development programs of Bangladesh Civil Service. The study will specifically investigate the direct influence of factors like individual characteristics, support mechanism of working place and learning organizational practices in post-program transfer of training in public organizations of Bangladesh. The specific research questions are:

- i) Is there any influence of ‘post-training individual motivation’ and ‘post-training self-efficacy’ in post-program transfer of training; if yes, to what extent it influences transfer of training?
- ii) Is there any influence of ‘supervisory supports’, ‘peer supports’, and ‘opportunity to use’ in post-program transfer of training; if yes, to what extent it influences transfer of training?

- iii) Is there any influence of ‘learning organizational practices’ like, ‘inquiry & dialogue’, ‘collaboration & team-learning’, ‘nurturing innovation’, ‘capturing & sharing new learning’, ‘opportunity to continuous learning & self-development’, ‘leadership for learning & transfer’, ‘empowering people to collective vision’ and ‘strategic link with career development’ in post-program transfer of training; if yes, to what extent it influences transfer of training?
- iv) How far the factors like individual characteristics, working condition and learning organizational practices are justifiable as the predictors to post-program transfer of training?

1.2 Significance of the Study

The current research is deductive in nature and the main intention of the research is to test a modified model of transfer of training originally given by Baldwin and Ford (1988). In preparing and testing the transfer model Baldwin and Ford (1988) presumed transfer of training as psychological and cognitive process. But, the current research took a different perspective in proposing the new model of transfer of training. The findings of current study in Bangladesh context on post-program transfer of training of management development interventions of senior officials of BCS would have expected to contribute in following ways:

- a. The traditional transfer model of Baldwin and Ford (1988) and Holton (1996) assume that transfer is a psychological and cognitive issue. But, the current research has viewed transfer issue as an organizational management issue. Considering the above assumption, the proposed model took three important management issues like individual characteristics, working environment and learning organizational practices as prospective predictors to transfer of training. The research findings will help concerned organizations in devising sound strategies in transfer of training after completion of the program.
- b. Almost all the policies, procedure and manual of training management concentrated to ‘during the training activities’—how training inputs and acquisition of learning could be made more effective. Saks, Alan M and Belcourt, Monica (2006) opined that the organizations are not giving due attention to pre- and post-program activities for improving the level of transfer of training (p.645). Their study recommended for improving post-program organizational support network like supervisory support, supportive work environment, evaluation, booster training, buddy system, discussion and dialogue, feedback, accountability, and arranging incentive for supervisor who is dedicated to support his supervisees (pp.633-641). The recommendations of the study will help the sponsoring organization like Ministry of Public Administration to formulate effective support net-work and system for post-program efficient transfer of training.
- c. In the traditional transfer model of Baldwin and Ford (1988) and Holton (1996) have seen ‘working environment’ as three types of supports like ‘supervisory support’, ‘peer support’ and ‘opportunity to use’. In current study, the horizon of ‘working environment’ has extended to ‘organizational learning practices’ as supportive to transfer of training (Watkins & Marsick, 1993; Lim & Nowell, 2014). So, beyond the purview of traditional

transfer model of Baldwin and Ford (1988) and Holton (1996), in current research, the post-training transfer has been taken as an integrated, strategic and continuous process of organizational efforts and environment. In this way, the current study is expected to contribute new dimension in transfer of training literature.

- d. Management development is a strategic intervention and the main purpose of management development is to create sustained competitive advantage for the organization. But, counting ultimate results of transfer of training as only ‘generalization’ of learning and ‘maintaining training learning’ over a period of time may not serve the strategic goals of management development. So, Tannenbaum (1997) opines that more training interventions is not necessarily better but training could be an effective part of continuous learning (p. 447). Moreover, according to him, in addition to quality, appropriateness, supportiveness of work environment and appropriate training policies and practices, it is the ‘continuous learning’ that must be considered as one of the core issues and distal outcomes of program interventions (p.447). In the current study, in addition to Baldwin and Ford’s (1988) definition of transfer of training (generalization and learning maintenance), the ‘the zeal of continuous learning and self-development initiative’ by graduated trainee himself has been included as the third dimension in definition of transfer outcome.
- e. The Public Administration Training Policy of Bangladesh formulated in 2003 which is already got backdated. In the existing policy-paper, it is more about process of conducting training and ignores the issues of post-training utilization as well as transfer of training. The research outcome will help the public policy planners of Bangladesh to formulate strategies for transfer of training to optimize the potentialities of human resources for the benefit of the organization. Moreover, there is a strategic-gap between training performance and career advancement (specifically promotion and transfer) in HR practices of Bangladesh Civil Services. The study result will contribute in formulating a prudent and updated career development policy linking strategically the issues of training and transfer performance with promotion and placement.

1.3 Brief Definition of Terms

A single term may have different meanings in different settings and contexts. The key concepts and terms used in the study also have definite meanings and understanding for the current study. The concepts, constructs and key terms used in the study are defined below.

Bangladesh Civil Service is defined as the person in services of the Republic structured under Schedule-I, who is directly appointed on recommendation of Bangladesh Public Service Commission and also the specified posts structured in Schedule-II for appoint by promotion prescribed in Bangladesh Civil Service Recruitment Rules, 1981. The BCS includes the officers of 27 cadre services of Bangladesh.

Training is a process of developing knowledge, skill and attitude needed for discharging effectively and efficiently the job specific responsibilities. It is generally a specific skill based educational process arranges for non-managerial positions.

Management Development Program is a long term educational process to learn

conceptual knowledge and theoretical issues for improvement of managerial and leadership competencies essentially linked with his career growth and self-development. It is thus an in-service program intervention generally arranges for managerial and leadership positions of the organization.

Post-program Transfer of Training refers to the extent to which the acquired knowledge and skill are utilized back in the job (generalization), maintained the learned KSA over a period of time (maintenance) as well as zeal for continuous learning and self-development.

Individual Characteristics/Factors refer to the levels of confidence and self-efficacy as well as post-training motivation which drive an individual to utilize and maintain acquired KSA in back to the job.

Organizational Factors are the issues and conditions which ensure supervisory support, peer support and opportunity to use for applying and maintaining of acquired KSA from training and development program in back to the job.

Learning Organization Learning organization is a flexible form of social entity where individual, group and organizational learning initiatives are welcomed, innovations are entertained, mistakes in trail and error process are tolerated, new ideas are valued and barriers to learning and development are reduced and minimized. It is, thus, such type of organization where all types of learning initiatives are recognized, practised and maintained for developing distinct competitive advantages both for individual as well as organization.

Learning organizational practices refer to the organizational learning and knowledge management practices which includes inquiry & dialogue, collaboration & team-learning, nurturing innovation, capturing & sharing new learning, opportunity to continuous learning & self-development, leadership for learning & transfer, empowering people to collective vision and strategic link of learning performance with career advancement (Senge, P. M. 1990; Watkins & Marsick, 1993).

2. Literature Review

In order to develop the conceptual framework for the study, a comprehensive literature review has been done. The existing models and theories on transfer of training were reviewed below for developing and proposing a valid model for post-program transfer of training.

2.1 *The Meaning of Transfer of Training*

Transfer of training has seen and described as an outcome of training program which is just a continuous manifestation of learned KSA on the job (Noe 2008, p.169). Noe (2008) also mentions that transfer of training refers to applying learned knowledge, skills, attitudes and capabilities by the trainees to their respective jobs (Noe 2008, p.169). According to Olsen (1998), "Transfer is an evidence that what was learned is actually being used on the job for which it was intended (p.61)". In simple term, transfer is translating and maintaining of learning from any training into practice on the job. It is like a positive and practical response and reaction on learning to solving a problem. It is not all about just to learn something from

training program for being a master only but according to Baldwin & Ford, (1988), transfer is occurred when learning generalized to the job context and maintained over a period of time on the job in the organization (p. 63). So, transfer of training is not an abstract feature; rather it has to be manifested and demonstrated into practical behaviors to the job situation. According to Noe (2008), generalization means trainee's ability and positive intension to utilize acquired competencies from training program to job situation to solve problem in different contexts and take action for improved performance. And maintenance refers to a process of carrying over the application of learned capability over a reasonable period of time (p.169). Actually, in defining transfer of training by only 'generalization' and 'maintenance', Baldwin and Ford (1988) ignored the issues of further education and continuous self-development. The only way of smooth and constant level of maintenance of learned KSAs from management development program is creating zeal for continuous self-development in graduated participants. According to Blanchard and Thacker (2004), continuous learning and development is influenced by challenging job, social support and employee development scheme like opportunity to learn and participating career development training (p.214). The nature of management development program is strategic, long-term and futuristic which demands for continuous learning and self-development in order to maintain and sustain a credible level of competency comprising updated knowledge, skill and attitude. In the current research, thus, the horizon of definition of transfer of training has extended up to 'zeal for continuous self-development' in addition to two traditional dimensions like 'generalization' and 'maintenance'.

2.2 The Transfer Theories

Theories under transfer of training can be categorized into two distinct domains. First, the motivational theories those influence zeal for learning and transfer. Second, the design theories that influences and supports transfer process practically though creating favorable organizational environment. All the domains of transfer theories are discussed below:

2.2.1 Motivational Theories for Learning and Transfer

Motivation is a critical factor in obtaining overall effectiveness of training and management development program. In whole process of training intervention from pre-training motivation to transfer of training, motivational activities can play facilitating and inspiring roles for successful management of program. Motivation is the inner force of a person to act positively in a situation. It is an important factor for success in every level of training process: pre-training, during training and after training. Tannenbaum & Yukl (1992) stated that training motivation refers to the intensity and persistence of efforts that trainees apply in learning-oriented activities, before, during and after training (Tannenbaum & Yukl, 1992). In a good number of training researches, motivation-relevant constructs like pre-training motivation and motivation to learn were examined. According to Blume et al. (2010), motivation to learn was found significantly related to learning measures and transfer measures (p. 1071). Post-program motivation and self-efficacy are also considered as important predictors to post program utilization and transfer of training.

Expectancy theory of motivation (Vroom, 1964) narrates that an individual show

performance when he predicts that such action will beget valued outcomes. After completion of assigned responsibility if sees that the agreed reward is not awarded then as a result the employee concerned reduces his level of performance. The expectancy theory has a strong influence over human behavior. In whole process of learning to transfer, it has very practical implications. First, a trainee wants to know about how well he/she is able to learn from the ongoing program. Second, a trainee's beliefs about what the outcome will be come out if he/she is successful to learn from the program (Blanchard et al., 2012). The expected outcome and its possibility of occurrence make up the expectancy. Finally, how far the the obtained goal carries expected level of value and desirable outcome. **The Needs Theory** of motivation helps the training manager to formulate need-based curriculum and effective methods for delivery. According to Blanchard et al. (2012), needs theory leads the implications for the whole training process even after completion of the program. The training providing agency must ensure that how the acquired KSAs help them to fulfill their job-requirements after going back from the program (p.70). **Goal-Setting** theory has direct and indirect influence on the behavior of trainees during and after the training program. According to Noe (2013), learning as well as transfer can be accelerated by setting challenging goal. The curriculum designers can follow Goal-Setting theory in designing training and management development program. Noe (2013) also suggested that the goal can be set by introducing individual action plan (IAP) or performance improvement project (PIP) for ensuring better level of post-program transfer of training (p.158). **Reinforcement theory** is concerned with learning as well as transfer after completion of learning. The supervisor of the graduated trainee could use the theory as an instrument for reinforcing positively or negatively for ensuring desired level of performance on the job. **Self-efficacy** (Bandura, 1982) is another important motivational theory that relates the confidence on own ability or competency of the trainee with resultant behaviors. One of the objectives of training and management development programs is to develop sufficient confidence of trainee officers for taking higher responsibility. In the process of building better level of self-efficacy, there is a strong role of trainer, facilitator, demonstrator, supervisor and peer in different levels of teaching to transfer. The more self-efficacious graduates will naturally take more responsibility than less-efficacious graduates. Since, transfer is related to replication and maintenance of acquired KSAs, so better level of self-confidence and self-efficacy directly influence transfer of training. Finally, the adult-learning or **Andragogic Learning Theory** of Malcolm Knowles has enough implications both in designing contents as well as method of delivery. The experienced learners want to learn through constructive and self-directed way. If they perceive possibility of immediate application of lesson (transferability), they will be motivated to learn (Noe, 2012. p.161). So, according to andragogic theory, learning and transfer will be maximized when the adult learner gets immediately transferable and useful contents, constructive and self-directed method, and participative development of training curriculum.

Holton (1996), Yamnill and McLean (2001) and Noe (2012) contended that those motivational theories have direct positive implications on transfer motivation. They categorized influences of transfer motivation into four categories. First, intervention fulfillment that refers to the extent which fulfills the expectations from training and

development interventions. If the trainees perceive that what they learn is relevant to their assignment or HRD interventions is ready to fulfill their learning-need related to performance-goal, they will be motivated better to transfer of training on the job (p.200). Second, learning outcomes which confirms that learning intensity of a successful learner would expect to transfer better back in the job. Third, job attitude; it is the prediction that people with high job-satisfaction and commitment would be more likely to exert transfer interventions on the job. Lastly, expected utility of reward; if the trainee officers see that there is a strategic link of transfer performance and career advancement, they would obviously feel committed to change their behavior positively to transfer of training for improving performance on the job.

2.2.2 Theories of Transfer Design

There are three theories behind the transfer performance which have direct implications in creating favorable learning environment through designing program. Holton (1996), Yamnill and McLean (2001) and Noe (2012) summarized the theories for transfer design and categorized the theories into Identical Element Theory, Stimulus Generalization and Cognitive Theory.

Theory of Identical Elements indicates that the degree of similarity of designed contents and methods with actual work setting expedites transfer of training. Blanchard et al. (2010) categorized similarity into two areas: first, the similarity of task and responsibility; second, the similarity of environment where the task and responsibility are to be performed (p.190). The theory, however, is found best-fit with the training of motor or technical skills where the trainee gets maximum similarity of job situation with imparted training.

The Theory of Stimulus Generalization advocates in favour of providing general principles of management and leadership for making decision in different situations and contexts. In case of improvement of leadership and managerial skills, the identical elements theory is not applicable. In managerial and leadership development program, it is not possible to present exact situation and context of decision-making in training sessions. The managerial situation and context is ever-changing and in line with the changing situation, the organization also adaptive to business strategies. In this situation, it is better to provide with general principles and theories of managerial and leadership skills so that the graduated trainees can apply the acquired KSAs in different situations and contexts in the long run.

The Organizational Theory for smooth transfer of training extends its supportive mechanism from traditional social and logistic support to creating a flexible form of learning environment in working places where the graduated trainees get best platform to maintain, share and replicate their acquired ideas back in the job. In that form of open system organization, learning and sharing, trial and error, dialogue and debate, collaboration and team learning, innovation and creativeness are found as embedded practices of organization. This type of learning organization allows managers of the organization to learn continually and receive appropriate management development programs (Blanchard & Thacker, 2004, p. 214). The learning organization is, thus, an important tool as well as a conspicuous platform to facilitate learning and transfer of those learning on the job for enhancing performance both

individual and organizational levels (Buhler, 2002; Davis & Daley, 2008).

2.3 The Transfer Variables

For conducting the current study, two types of variables have been chosen like: independent and dependent variables. The study is on determining the factors influencing post-program 'transfer of training'. So, 'transfer of training' is here dependent variable. According to Baldwin and Ford (1988) and Holton (1996), learning and transfer of training are directly and indirectly influenced by individual characteristics, training design and working environment. Since, the current study is about post-program transfer of training so, individual characteristics, working conditions and learning organizational practices were taken as predicting factors of post-program transfer of training. The elements of individual characteristics that specified in conceptual framework are post-training motivation and self-efficacy to transfer. Motivation to transfer induces and provokes the participants to apply and maintain learning acquired from training on the job. It actually contributes to make readiness and eagerness in participants for utilizing the acquired KSA on the job. Yamnill et al. (2001), extensively reviewed the relevant theories of motivation for validate the factor like motivation to transfer (p. 195). Bandura (1982) defined self-efficacy as self-belief and self-confidence about own capability to perform an assigned task. Grossman & Salas, 2011 concluded in their meta-analysis that the graduated trainees must have confidence on their ability to exert certain skill before they are to be placed to own jobs. Individual with higher level of self-efficacy will be found more self-confident in their capability to learn and use new things and also be found him or her enough motivated to transfer of training (Grossman, & Salas, 2011, p.7).

Work environment includes support from supervisor, peers and opportunity to use acquired KSA back in the job. Velada et al. (2007) and Neo, (1986) found the importance of favourable working conditions for smooth transfer of training. The process of supervisory support validates positive reinforcement theory of motivation. Holton & Baldwin (2003), Russ-Eft (2002), Xiao (1996) and Montesino (2002) found positive correlation between level of support from top and effective transfer of training. Coetsee and Basson (2006) specify that in supervisory support, a manager clarifies performance expectations, sets goals based on training objectives, identifies opportunities to apply acquired KSA, helps mitigating adverse situation to apply and provides feedback on successful application of new competencies (p.48). The study, conducted by Martin (2010), concluded that both working environment and peer support impacted positively in transfer of training. The study revealed more transfer results when the workplace and peer-support facilitate favourable climate. (p.87). Even, peer-support also potential to mitigate effects of negative climate of workplace (Martin, 2010, p.87). Opportunity to use is about providing with all necessary logistic support and all types of material and morale support from the organization (Holton & Baldwin, 2003:67) for making smooth transfer of training. Early studies on transfer of training tended to focus on structure of learning and cognitive mechanism to learn and transfer but since mid-nineties organizational support system and work environment are being treated and recognized as important determinant of transfer of training (Merriam and Leaty, 2005). So, the organizational support system (supervisory support and peer support) along with opportunity

to use the learned KSAs were considered as important predictors of transfer of training.

Moreover, learning organizational practices are also taken as another factor for transfer of training. Learning organization is a flexible form of social entity where individual learning initiatives are welcomed, innovations are entertained, mistakes in trail and error process are tolerated, new ideas are valued and barriers to learning and development are reduced and minimized. The graduated trainees face comparatively less challenge in the congenial environment of learning organization in applying and maintaining their KSA over a reasonable period of time. According to Watkins and Marsick (1993) for becoming a learning organization it must (i) create an environment which continuously supports learning, (ii) promote inquiry and dialogue, (iii) encourage collaboration and team learning, (iv) create opportunity to capture and share learning, (v) facilitate shared vision for people, (vi) integrate organization with changing environment and (vii) leadership that facilitate strategic support to learning (p.16). Since organization is such an intricate entity where every individual has to perform and act interdependently. Transfer of learning is also an inter-related and interdependent business where individual initiative is obviously important but help, support and collaboration from peers, colleagues and supervisors are also equally imperative. So, issues like organizational learning practice, knowledge management practice, opportunity of continuous learning and strategic link of transfer performance with career advancement are some of the important practices which expedite transfer of training.

2.4 Transfer Models

Transfer of training is probably one of the widely discussed issues in the literature of strategic human resource development. Traditionally, it is seen as a horizontal and linear linkage between training and performance (Yamhill, Siriporn, 2001. p.196). But Weldy (2009) describes it as a three-step process involving learning or acquiring KSA from training, using those on the job and finally maintaining those changed behaviour over a period of time (p.61). Similarly, training evaluation Guru Donald Kirkpatrick (1967) first described a four-step model of evaluating effectiveness of training and development consisting of assessing feedbacks from reaction level to result level (from reaction to learning to behaviour to result) (Kirkpatrick, 1998). Though it is being widely used in evaluation of training but Kirkpatrick's model is criticized for its over simplified technique which ignores contextual issues, and basing on wrong assumption of casual linkages of one level to preceding level and incremental importance of information (Bates, Reid, 2004: p. 342). The limitations of Kirkpatrick's Model induced researchers of HRD field to come up with alternative models for transfer of training.

Baldwin and Ford, in 1988, first categorized the factors influencing transfer of training as well as made linkages of those three areas into a single model. The model is a horizontal but linear flow of following three steps, like (i) training inputs, (ii) training output; and (iii) condition of transfer. In defining their model of transfer of training, Baldwin and Ford (1988), did not make linkage between learning and performance. Under their model of transfer of training they considered learning as the 'output' of management development programs and finally considered 'generalization and maintenance' of those learning over a period of time as

‘outcome’.

Another transfer model, given by Holton (1996), hypothesizes three types of primary outcomes like learning, individual performance and organizational results which are regarded as the function of motivation (motivation to transfer, transfer effort to performance to outcomes), environment or transfer climate (feedback, peers support, supervisor support and openness to change, personal outcome—positive, personal outcome—negative and supervisor sanction) and ability (content validity, transfer design, personal capacity to transfer and opportunity to use). But motivation to transfer, transfer effort to performance and performance to outcomes has direct influence and performance self-efficacy and learner readiness has secondary influence on learning outcome (Holton and Bates, 1999). Finally, the learning will lead to increase the individual performance when the primary influences like motivation to transfer, training environment and training design are found at appropriate levels (Yamnil, 2001. p.21).

Birchall & Kirwan (2006) identified a couple of limitations in Holton’s Model of transfer of training. First, this model only describes a sequence of influence on outcome on a particular learning event and does not exhibit any feedback loops. Second, the model does not explain the far-reaching consequences and possibilities of particular factor, for example, acquisition of learning which may enhance further motivation to learn. Third, Holton’s as well as other successive models do not explain possibility of interaction between the factors of same type, for example, the model does not explain whether or not there is a relation among the factors like peer support, supervisory support, allowing innovation and sharing knowledge in organization. Fourth, the model does not explain how the factors affect transfer of training rather it explains only guiding role of the factors, not the real examination of effects of the factors (p. 257).

Other than the models given by Baldwin and Ford (1988) and Holton (1996), there are a couple of transfer models which also attracted the attention of transfer researchers. Thayer and Teachout (1995) developed model on the basis of findings of previous studies. Subsequently, Machin and Forgarty (2004) developed a transfer model following Thayer and Teachout (1995) with a small modification. Kontoghiorghes (2002) developed system model with giving emphasis on socio-technical system (STS) and total quality management (TQM) (Hunter-Johnson, Yvonne Olive, 2012, pp.37-41). All the three models are not basically very different from Baldwin and Ford’s Model. But, Kontoghiorghes (2002) gave emphasis on assessment of individual’s transfer performance in an organizational environment where transfer opportunity is conducive and there is a practice of continuous learning (Hunter-Johnson, Yvonne Olive, 2012, p.41).

After reviewing of the existing models of transfer of training, it is evident that the transfer model of Baldwin and Ford (1988) is the basic one. But, the forgoing review of literature also suggests that there is an enough scope to expand the horizon of model including learning organizational practices as important predictors to transfer of training.

Management development program is quite different from job-specific but skill-based typical training program. Moreover, there are some special difficulties also found in developing

capacity of managerial staffs of organization through management development programs. The outcomes of management development program are not easy to translate and transfer into an improved performance in working place. Kirwan & Birchall (2006) opine that among the models of transfer of training a few are perfectly tested or suitable for studying management training context. (p.02). The proposed model considered the issues of ‘soft vs. open skills’, ‘long-term effects of learning utilization’, ‘far-reaching impacts of transfer’, and ‘social support and learning organizational practices’. The proposed model (Figure 1) of transfer of training describes independent variables under three predicting factors like individual characteristics, working conditions and learning organizational practices. The dependent variable—transfer of training is described by three dimensions like generalization, maintenance and continuous self-development.

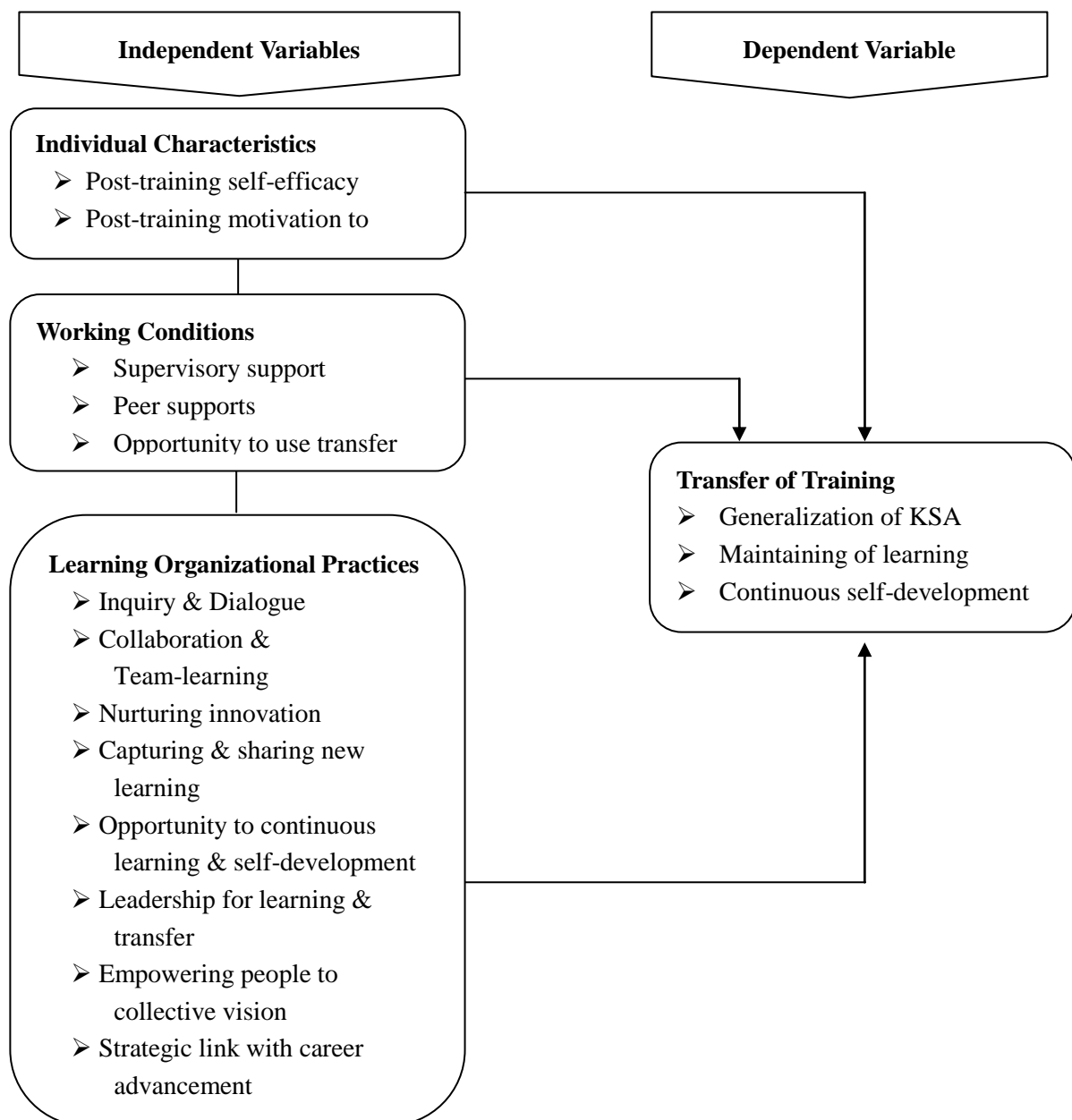


Figure 1. Proposed Model for Post-program Transfer of Training

3. Methodology and Research Design

Quantitative method was applied to obtain research objectives. Multiple regression analysis was the main technique of data analysis. The study is about the influence of individual characteristics, working environment and learning organizational practices to post-program transfer of management development program of the members of the Bangladesh Civil Service. Naturally, the unit of analysis is individual—the graduated participants of the management development programs. A brief description on research design, sampling techniques and survey administration are given below:

3.1 Research Design and Survey Administration

225 graduated participants from both the courses were selected purposively as sample. The graduated participants of 97th to 100th ACAD courses and 67th to 70th SSC courses have been included purposively in sample frame as respondents for the study. All of them were successfully graduated within the period of 16/09/2014 to 17/06/2015. The constructs are measured by applying survey questions—normally self-administered. The questionnaire was formulated using a 7-point Likert scale with denominations of ‘1 for strongly disagree’, 2 for disagree’, ‘3 for moderately disagree’, ‘4 for neither agree nor disagree’, ‘5 for moderately agree’, ‘6 for agree’ and ‘7 for strongly agree’ for measuring each item. Before selecting the constructs for the current study, a rigorous review of literature has been done.

3.2 Survey Administration

The survey was conducted using the finalized version of questionnaire. Questionnaires were distributed to 225 officers of Bangladesh Civil Service those who graduated during the period of the 3rd August 2014 to the 17th June 2015. The graduated participants who completed the 97th ACAD to the 100th ACAD and the 67th SSC to the 71st SSC ranked as Deputy Secretary and Joint Secretary to government respectively were included as respondents. 148 questionnaires were sent by postal mail and rest were distributed during the feedback seminar of the 100th ACAD, 70th and 71st SSC courses. Batch-wise contact lists of graduated participants were collected from BPATC. Following the contact addresses the questionnaires were sent with return envelop with forwarding letter to graduated officers of above mentioned batches and rest of the questionnaires were personally distributed in feedback seminars of the courses. Since the researcher persuaded the responded by telephone as well as personal contact, the rate of returning of questionnaires is highly satisfactory. Among the distributed questionnaires total 214 questionnaires were returned to the researcher. So, rate of return is 95%. After final checking, total 212 cases were found valid and correct. Two unfinished questionnaires were declared invalid. The survey was conducted during the period of September 2016 to December 2016.

3.3 Validity and Reliability

On the basis of provisional constructs and items, a pre-test survey has been administered on 30 prospective respondents and on the basis of results of Cronbach alpha the scale has been finalized. The wording of questionnaire and scale of measurement have been revised as per comments obtained from the respondents of pre-test survey. Moreover, in order to obtain an

acceptable level of content validity, a comprehensive literature review has been done covering conceptual as well as empirical literature. The conceptual and operational definitions including corresponding items were empirically and theoretically supported by relevant literature. Secondly, the validity of contents was obtained after adjustment of recommendations and observations from prospective respondents of a pre-test survey using provisional questionnaires. Thirdly, before developing operational definition, out-lining corresponding items and ascertaining measurement scales a widely accepted two survey instruments like Learning Transfer System Inventory (LTSI) of Holton and Bates (2000) and Dimensions of Learning Organization Questionnaires (DLOQ) of Marsick and Watkins (2003) were consulted exhaustively. A good number of measurement items were included in this research from LTSI and DLOQ after required modification and customization. Finally, the questionnaires were validated by the panel of HRD experts of Graduate School of Public Administration of National Institute of Development Administration, Bangkok, Thailand after presentation of Ph D proposal defense. The panel was headed by learned Advisor of the Ph D research Professor Nisada Wedchayanon, Ph D including 3 more subject matter specialists. The panel approved a questionnaire with 69 items under 16 variables for measuring by 7-point Likert scale.

Moreover, for ensuring construct validity for the study, relevant literature and previous studies were reviewed exhaustively. Specifically, for determining the questionnaire items for the study two widely accepted survey instruments like LTSI of Holton and Bates (2000) and DLOQ of Marsick and Watkins (2003) were consulted. LTSI is an item inventory for measuring level of transfer of training which was revealed in USA, and according to Devos et al. (2007), was replicated in some countries of Asia and Middle East and found valid (p.185). DLOQ is an item inventory for measuring dimensions of learning organization constructed by Watkins and Marsick (1997) and a good number of studies have been conducted in USA, Colombia, China and Taiwan and internal consistency of the items found reliable (Song et al.: 49). So, the theoretical basis of proposed research framework is strong enough to satisfy its construct validity. In addition to theoretical backup, an exploratory factor analysis was done to examine the construct validity of survey instrument.

The reliability of measurement tools were tested through detailed screening of data including handling outliers and missing data, test of normality, test of linearity, test of heteroscedasticity, test of multicollinearity and test of autocorrelations. During the screening process, no outlier or missing data is found. For the current study, univariate normality of data was tested through histogram, kurtosis and skewness; and the same way multivariate normality and heteroscedasticity were tested through Normal P-P plot, scatter plots, and histogram of the standardized residuals and found valid. The multicollinearity of variables were checked through Pearson correlation (found $<.95$) and Variance Inflation Factor (the highest VIF found is 9.462) found valid. The Durbin-Watson statistics were found 2.033, 1.955, 2.147 and 2.278 for 4 models respectively which indicated no serious autocorrelation.

4. Data Analysis, Results and Discussion

The regression analysis was run with 13 sub-dimensions under three main factors of

independent variables like individual characteristics, working conditions and learning organizational practices as the predictors to post-program transfer of training.

4.1 Data Analysis and Results

The detailed results of four hypothesis under the proposed model is presented below:

4.1.1 Hypothesis 1

The first hypothesis is to check the influence of individual characteristics like post-training individual motivation and post-training self-efficacy on post-program transfer of training. In order to test the hypothesis multiple regression analysis was run using SPSS. The result of regression analysis is presented in Table 1. From the ANOVA table, it is found that the regression analysis is statistically significant ($F= 35.431$) at the level of $p < 0.001$. From the model summary, it is evident that R^2 and adjusted R^2 are .253 and .246 respectively that means the factors explain around 25% of the total variance of post-program transfer of training. The Durbin-Watson Statistics is 2.033 for the model. D-W value within 1.5 to 2.5 confirms the assumption that there is no serial (auto) correlation between the variables. The collinearity statistics being VIF value 1.709 (less than 10) and tolerance value .585 confirmed that there is no collinearity. No heteroscedasticity was found in the scatter plot of regression standardized residual and standardized predicted values.

Table 1. Regression Summary of Model 1

| Model 1 | Unstandardized Coefficients | | Standardized Coefficients | T | Sig. | Collinearity Statistics | |
|------------|-----------------------------|------------|---------------------------|-------|------|-------------------------|-------|
| | B | Std. Error | Beta | | | Tolerance | VIF |
| (Constant) | 31.991 | 3.702 | | 8.641 | .000 | | |
| MT | .795 | .196 | .317*** | 4.051 | .000 | .585 | 1.709 |
| SET | .732 | .241 | .237*** | 3.035 | .003 | .585 | 1.709 |

Note: N=212; * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$, **** $p < 0.001$; $R^2 = .253$, Adjusted $R^2 = .246$; $F = 35.431$, $p < .001$; Durbin-Watson Statistics = 2.033
Dependent Variable: Transfer of Training

From the Coefficient Table 1, it is revealed that both post-training motivation to transfer and self-efficacy are found significant influence on post-program transfer of training. The independent variable titled 'post-training motivation to transfer' ($\beta = .317$, $t = 4.051$, $p < .001$) was found one of the strong predictors to post-program transfer of training. Similarly, another independent variable titled 'post-program self-efficacy' ($\beta = .237$, $t = 3.035$, $p < .01$) was found one of the strong predictors to post-program transfer of training. So, the Hypothesis 1 is fully supported and accepted as per regression result. The regressed equation for the Hypothesis 1 has, thus, got shape as below:

$$\text{Transfer of Training} = 31.991 + 0.317 * \text{MT} + 0.237 * \text{SET}$$

Where:

- MT : Post-program motivation to transfer
SET : Post-program self-efficacy to transfer

4.1.2 Hypothesis 2

The second hypothesis is to check the influence of working conditions like supervisory support, peer support and opportunity to use on post-program transfer of training. In order to test the hypothesis multiple regression analysis was run using SPSS. The result of regression analysis is presented in Table 2. From the ANOVA table, it is found that the regression analysis is statistically significant ($F= 16.628$) at the level of $p < 0.001$. From the model summary it is evident that R^2 and adjusted R^2 are .193 and .182 respectively that means the factors explain around 18% of the total variance of post-program transfer of training. The Durbin-Watson Statistics is 1.955 for the model. D-W value within 1.5 to 2.5 confirms the assumption that there is no serial (auto) correlation between the variables. The collinearity statistics being VIF values 2.122, 2.317 and 1.983 (less than 10) and tolerance value .471, .432 and .504 confirmed that there is no collinearity. No heteroscedasticity was found in the scatter plot of regression standardized residual and standardized predicted values.

Table 2. Regression Summary of Model 2

| Model 2 | Unstandardized Coefficients | | Standardized Coefficients | T | Sig. | Collinearity Statistics | |
|------------|-----------------------------|------------|---------------------------|--------|------|-------------------------|-------|
| | B | Std. Error | Beta | | | Tolerance | VIF |
| (Constant) | 44.879 | 2.584 | | 17.369 | .000 | | |
| SS | .046 | .057 | .073 | .808 | .420 | .471 | 2.122 |
| PS | .353 | .094 | .354*** | 3.736 | .000 | .432 | 2.317 |
| OU | .039 | .079 | .044 | .501 | .617 | .504 | 1.983 |

Note: N=212; * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$, **** $p < 0.001$; $R^2 = .193$, Adjusted $R^2 = .182$; $F = 16.628$, $p < .001$; Durbin-Watson Statistics= 1.955
 Dependent Variable: Transfer of Training

From the Coefficient Table 2, it is revealed that both post-training motivation to transfer and self-efficacy are found significant influence on post-program transfer of training. The independent variable titled 'supervisory support' ($\beta = .073$, $t = .808$, $p > .420$) was found insignificant predictor to post-program transfer of training. Similarly, another independent variable titled 'opportunity to use' ($\beta = .044$, $t = .501$, $p > .617$) was also found insignificant predictors to post-program transfer of training. But, in this model, only significant predictor is found peer support. From the coefficient Table 2, it is evident that the independent variable peer support ($\beta = .354$, $t = 3.736$, $p < 0.001$) was found a strong predictor to post-program transfer of training. So, the Hypothesis 2 is partially supported and accepted as per regression result. The regressed equation for the Hypothesis 2 has, thus, got shape as below:

Transfer of Training = $44.879 + 0.354 * PS$

Where:

PS : peer support

4.1.3 Hypothesis 3

The third hypothesis is to check the influence of learning organizational practices like '*promoting inquiry & dialogue*', '*collaboration & team-learning*', '*nurturing innovation*',

'capturing & sharing new learning', 'opportunity to continuous learning', 'leadership role for learning', 'empowering people to shared vision', and 'strategic link with career development' on post-program transfer of training. In order to test the hypothesis multiple regression analysis was run using SPSS. The result of regression analysis is presented in Table 3. From the ANOVA table, it is found that the regression analysis is statistically significant ($F= 8.707$) at the level of $p < 0.001$. From the model summary it is evident that R^2 and adjusted R^2 are .255 and .226 respectively that means the factors explain around 23% of the total variance of post-program transfer of training. The Durbin-Watson Statistics is 2.147 for the model. D-W value within 1.5 to 2.5 confirms the assumption that there is no serial (auto) correlation between the variables. The collinearity statistics being VIF values 3.375, 4.897, 5.413, 4.096, 7.050, 4.841, 7.321 and 4.843 (less than 10) and tolerance values from .137 to .296 confirmed that there is no collinearity. No heteroscedasticity was found in the scatter plot of regression standardized residual and standardized predicted values.

Table 3. Regression Summary of Model 3

| Model 3 | Unstandardized Coefficients | | Standardized Coefficients | T | Sig. | Collinearity Statistics | |
|------------|-----------------------------|------------|---------------------------|--------|------|-------------------------|-------|
| | B | Std. Error | Beta | | | Tolerance | VIF |
| (Constant) | 49.366 | 2.169 | | 22.761 | .000 | | |
| ID | .350 | .235 | .166 | 1.492 | .137 | .296 | 3.375 |
| TL | .708 | .218 | .435**** | 3.247 | .001 | .204 | 4.897 |
| IN | -1.207 | .311 | -.546**** | -3.876 | .000 | .185 | 5.413 |
| SL | .394 | .253 | .191 | 1.558 | .121 | .244 | 4.096 |
| CL | -.230 | .325 | -.114 | -.709 | .479 | .142 | 7.050 |
| LL | -.312 | .265 | -.157 | -1.175 | .241 | .207 | 4.841 |
| VL | .124 | .343 | .059 | .361 | .719 | .137 | 7.321 |
| StL | .676 | .207 | .434**** | 3.260 | .001 | .206 | 4.843 |

Note: N=212; * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$, **** $p < 0.001$; $R^2 = .255$, Adjusted $R^2 = .226$; $F = 8.707$, $p < .001$; Durbin-Watson Statistics = 2.147

Dependent Variable: Transfer of Training

From the Coefficient Table 3, it is revealed that among the 8 independent variables only 3 are found significant influence on post-program transfer of training. The independent variable titled 'collaboration and team learning' ($\beta = .435$, $t = 3.247$, $p = .001$) and 'strategic link with career development' ($\beta = .343$, $t = 3.260$, $p = .001$) were found significant predictor to post-program transfer of training. But, independent variable like 'nurturing innovation' ($\beta = -.546$, $t = -3.876$, $p < .001$) was found negatively significant predictor to post-program transfer of training. The rest of the independent variables like 'promoting inquiry & dialogue', 'capturing & sharing new learning', 'opportunity to continuous learning', 'leadership role for learning', and 'empowering people to shared vision' did not show any influence on post-program transfer of training. So, the Hypothesis 3 is partially supported and accepted as per regression result. The regressed equation for the Hypothesis 3 has, thus, got shape as below:

$$\text{Transfer of Training} = 49.366 + .435 * \text{TL} - .546 * \text{IN} + .434 * \text{StL}$$

Where:

TL : Collaboration and Team Learning

IN : Nurturing Innovation

StL : Strategic Link of Transfer Performance with Career Advancement

4.1.4 Hypothesis 4

The fourth hypothesis is to check the combined influence individual characteristics, working conditions and learning organizational practices on post-program transfer of training. In order to test the hypothesis multiple regression analysis was run using SPSS. The result of regression analysis is presented in Table 4. From the ANOVA table, it is found that the regression analysis is statistically significant ($F= 9.546$) at the level of $p < 0.001$. From the model summary it is evident that R^2 and adjusted R^2 are .439 and .393 respectively that means the factors explain around 39% of the total variance of post-program transfer of training. The Durbin-Watson Statistics is 2.279 for the model. D-W value within 1.5 to 2.5 confirms the assumption that there is no serial (auto) correlation between the variables. The collinearity statistics being VIF values less than 9.50 (less than 10) and tolerance values from .137 to .296 confirmed that there is no collinearity. No heteroscedasticity was found in the scatter plot of regression standardized residual and standardized predicted values.

Table 4. Regression Summary of Model 4

| Model 4 | Unstandardized Coefficients | | Standardized Coefficients | T | Sig. | Collinearity Statistics | |
|------------|-----------------------------|------------|---------------------------|--------|------|-------------------------|-------|
| | B | Std. Error | Beta | | | Tolerance | VIF |
| (Constant) | 21.144 | 8.515 | | 2.483 | .014 | | |
| age | .282 | .223 | .138 | 1.266 | .207 | .241 | 4.154 |
| SL | -.462 | .235 | -.266* | -1.966 | .051 | .157 | 6.386 |
| MDCA | 2.254 | 1.317 | .146* | 1.712 | .089 | .397 | 2.517 |
| MT | .524 | .204 | .209** | 2.566 | .011 | .435 | 2.300 |
| SET | .712 | .255 | .231*** | 2.788 | .006 | .420 | 2.380 |
| SS | -.019 | .056 | -.030 | -.331 | .741 | .355 | 2.814 |
| PS | .285 | .106 | .286*** | 2.688 | .008 | .254 | 3.936 |
| OU | -.098 | .090 | -.110 | -1.097 | .274 | .287 | 3.488 |
| ID | -.083 | .219 | -.039 | -.380 | .704 | .266 | 3.757 |
| TL | .896 | .206 | .551**** | 4.352 | .000 | .179 | 5.580 |
| IN | -1.541 | .308 | -.697**** | -5.008 | .000 | .148 | 6.739 |
| SL | .351 | .257 | .170 | 1.365 | .174 | .185 | 5.412 |
| CL | -.426 | .297 | -.211 | -1.433 | .153 | .133 | 7.526 |
| LL | -.283 | .244 | -.142 | -1.156 | .249 | .191 | 5.236 |
| VL | .376 | .345 | .179 | 1.088 | .278 | .106 | 9.462 |
| StL | .495 | .194 | .318** | 2.549 | .012 | .185 | 5.419 |

Note: N=212; * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$, **** $p < 0.001$; $R^2 = .439$, Adjusted $R^2 = .393$;

F= 9.546, $p < .001$; Durbin-Watson Statistics= 2.278

Dependent Variable: Transfer of Training

From the Coefficient Table 4, it is revealed that among the 16 (including 3 demographic variables) independent variables only 8 were found significant influence on post-program transfer of training. The independent variable titled 'category of course attended' ($\beta=.146$, $t=1.712$, $p<.10$), 'post-program motivation to transfer' ($\beta=.209$, $t=2.566$, $p<.05$), 'post-program self-efficacy to transfer' ($\beta=.231$, $t=2.788$, $p<.01$), 'peer support' ($\beta=.286$, $t=2.688$, $p<.01$), 'collaboration and team learning' ($\beta=.551$, $t=4.352$, $p<.001$), and 'strategic link with career' ($\beta=.318$, $t=2.549$, $p<.05$) were found positively significant predictor to post-program transfer of training. But, independent variable like 'service length of participants' ($\beta=-.266$, $t=-.1966$, $p<.10$), and 'nurturing innovation' ($\beta=-.697$, $t=-5.008$, $p<.001$) were found negatively significant predictor of post-program transfer of training. The rest of the independent variables like 'age of the participants', supervisory support, 'opportunity to use', 'inquiry and dialogue', 'capturing and sharing new learning', 'opportunity of continuous learning', 'leadership role for learning', and 'vision for learning' showed no influence on post-program transfer of training. So, from the empirical analysis of multiple regressions, it is evident that the hypothesis 4 is partially supported and accepted. The regressed equation for the Hypothesis 4 is, thus, finally shaped as below:

$$\text{Transfer of Training} = 21.144 - .266*SL + .146*CMDC + .209*MT + .231*SET + .286*PS + .551*TL - .697*IN + .318*StL$$

Where:

- SL : Length of Service
- CMDC : Category of Management Development Course Attended
- MT : Post-program Motivation to Transfer
- SET : Post-program Self-efficacy to Transfer
- PS : Peer Support
- TL : Collaboration and Team Learning
- IN : Nurturing Innovation
- StL : Strategic Links of Transfer with Career Advancement

4.2 Discussions of the Results

The objectives of the study were grouped into four domains: first, to assess the contribution of individual characteristics like post-training motivation and self-efficacy of graduated trainees of management development programs in post-program transfer of training; second, to evaluate the level influence of working conditions like opportunity to use, supervisory support and peer support to graduated trainees of management development programs in post-program transfer of training; third, to investigate the effect of learning organizational practices in facilitating post-program transfer of training; fourth, to investigate the influence of individual characteristics, working conditions and learning organizational practices in post-program transfer of training and to explore essential factors that contribute and expedite in post-training utilization and post-program transfer of training for formulating prudent management strategy for improvement of overall effectiveness of management development programs of Bangladesh Civil Service. In order to get the answer of the research questions, four

hypotheses were set to test statistically and a detailed data analysis was done. All the objectives of the research was obtained by testing four hypotheses. The standard multiple regression analysis was used to test the predictability of the independent variables on the dependent variable—post-program transfer of training.

Before running the multiple regression analysis, the univariate and multivariate normality were checked as per specified standard and in all cases those were found normal. For this current study regression analysis was take as the main instrument to test the proposed model of transfer of training. Proposed model of transfer of training was the theoretical basis from where the set of independent variables were taken as the predictor of post-program transfer of training. Total four hypotheses were crafted to test. Among the four hypotheses only first one was fully accepted and the rest of the hypotheses were found partially validated. From the entire cases multiple regression analysis, it is revealed that the variables like service lengths, type of course attended, post-training motivation to transfer, post-program self-efficacy, peer support, collaboration and team learning, strategic link of transfer performance with career advancement (promotion and placement) are found significant predictors to post-program transfer of training. Interestingly, independent variables like length of service and nurturing innovation were found negatively influential to transfer of training. ‘Collaboration and team learning is found as the strongest predictor of post-program transfer of training under the factor like learning organizational practices. The second and third strongest predictors of post-program transfer of training are found ‘strategic link of transfer performance with career development (Promotion and placement)’ and ‘peer support’ respectively.

The above findings of the quantitative analysis suggest that the post-program transfer of training would have better chance of becoming successful when the graduated participants have high level of motivation and self-efficacy, when peer support is made available, when practices like collaboration and team learning in organization is encouraged and when there is a policy to link training and transfer performance with career advancement. From the model fit statistics of multiple regression analysis of combined factors, it is revealed that the factors explained around 39% of the total variance (adjusted $R^2 = .393$, $p < 0.001$ and model is statistically significant) of post-program transfer of training. That means there are other factors which were not included in the transfer model and which could have influence on post-program transfer of training in addition to explained factors. Finally, the study suggests that variables like post-program motivation and self-efficacy, training content, types of training attended, supervisory and peer support, opportunity to use, learning organizational practices like collaboration and team learning and strategic link of transfer performance with career advancement have direct and positive influence on post-program transfer of training.

5. Conclusion and Recommendations

The purpose of the study was to empirically understand the influence of factors affecting post-program transfer of training of management development programs of Bangladesh Civil Service. The study was expected to reveal the impacts of factors that affect the post-program transfer of training as well as relative importance of those factors in transfer process. The study was done in the context of Bangladesh Civil Service and it enriched our understanding

regarding about transfer of training in the context of public organizations.

5.1 Policy Recommendations

The findings of the study were sufficient enough to expose a couple of policy recommendations for making management development program effective and fruitful.

Firstly, for ensuring maximum level of transfer, the sponsoring organization can take immediate measure for utilizing the capacity of trained officer through maintaining obtained motivation of graduated participants. The organization can offer incentive package for new initiative and innovative performance on the job.

Secondly, the career development of civil servants should be taken as a strategic intervention by Career Planning and Training (CPT) wing of the Ministry of Public Administration. As a part of strategic HRD, the training providing agency and CPT wing should jointly formulate competency framework for three levels (entry, middle and senior) of civil servants and following that competency frameworks the curriculum of management development programs should be overhauled.

Thirdly, the sponsoring organization should devise supportive mechanism for transfer of training. The supportive role of supervisor and peer groups should be specified. The provision for formulating and implementing individual action plan (IAP) on acquired learning by graduated participants and its follow-up mechanism may help better level of post-program transfer of training. The organization should specify the relapse prevention strategies and arrangement of refresher course for better retention and maintenance of learned KSAs from participated programs.

Fourthly, the sponsoring organization should promote and institutionalize the practice of team-building for learning and sharing ideas. Actually, in team situation, practices like mutual learning, sharing of idea, joint problem solving and collective responsibility expedite learning as well as transfer of those learning on the job.

Considering training and development interventions as a strategic issue and giving due weightage on it for making placement and promotion will obviously enhance the level of motivation of the officers concerned. Strategic linkage of training and development with career advancement has implication to validate human capital theory as well as resource-based view of strategic HRD. The public organizations of Bangladesh, thus, should shift their view from traditional domain of HRD to strategic view of HRD by integrating HRD activities, promotion and placement, performance management and incentive packages with organizational vision and mission.

5.2 Recommendations for Further Study

Findings of the study and its limitations induce us to make recommendations for further study. The arguments against further studies in the area of transfer of training of management development programs are given below:

Firstly, for the first time the transfer issue of soft skilled training and hard skilled training has

been raised in this study. The management development program is mainly based on soft skilled contents and from the literature it is evident that transfer of soft skilled training is more difficult than that of hard skilled training. For the limitation of time and resource, this issue was not included in current study. So, in order to develop a separate transfer model for soft-skilled training a new venture of study could be embarked.

Secondly, the training design issue was not included in the current model as predictor of post-program transfer of training. But, the findings of the study revealed that training contents, objective congruence and effective delivery method has direct or indirect influence to transfer of training. Further study could be done after including training contents, objective congruence and delivery method in transfer model.

Thirdly, the learning organization was taken as facilitating agent as well as the best platform for transfer of training. So, the learning organizational practices are assumed as predictors of transfer of training. In the current study, all the practices of learning organization were not finally found responsive. It is because of pre-mature stage of learning organization in public sector of Bangladesh. So, further study is deserved by amalgamating working condition and learning organizational practices as the predicting factors of post-program transfer of training.

Fourthly, since the study was conducted to evaluate the level of transfer and to determine the predictability of independent variables on dependent variable, so it is assumed that the graduated participants were obtained a reasonable level of KSAs from attended programs. So, further study can be conducted including learning intensity as on of the prospective predictors of post-program transfer of training.

Fifthly, in the current study, the definition of transfer of training was extended including 'zeal for continuous self-development' in addition to generalization and maintenance of learning. It is, probably, the first time in the history of transfer research that transfer of training is redefined in line with the strategic outlook. In the current research the respondents of the quantitative surveys agreed with the extended definition of transfer of training. So, further research could be initiated to establish the extended definition of transfer of training.

Lastly, to understand the all-out success of training and development interventions the transfer research is found as a piecemeal venture. In order to obtain a complete picture of training and development interventions, a series of horizontal study is imperative from TNA to end-of-course evaluation to post-training utilization to impact study to ROI research. Another challenge for transfer research is to isolate the level of transfer from combined influence of other training courses like Foundation Training Course (FTC), Law and Administration Course, executive diploma and masters etc. So, in designing transfer research in future, the researcher should consider the above directions for getting more reliable and valid empirical results.

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