

Facilitating Training Transfer of Patient Service Skills through Healthcare Learning Champion (HLC) Interventions

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ABSTRACT

This paper aims to draw attention towards the necessity of post-training interventions like the Healthcare Learning Champion (HLC) to provide impetus to on-the-job application of service skills delivered in a classroom training programs. Insights were drawn using a mixed-method study involving survey questionnaire responses from trainees and semi-structured depth interviews from their respective Managers, to assess the viability of HLC interventions in ensuring effective transfer of service skills at the workplace. Investigations revealed that training transfer tools such as E-learning and Augmented Reality had a positive impact on training transfer of service skills and facilitated enhanced service delivery in hospitals. The intervention discusses the use of diverse tools including one-on-one coaching, Augmented Reality and E-learning to promote systematic transfer of trained skills and knowledge from classroom to the workplace. Ensuring effective training transfer of service skills in healthcare institutions will lead to excellence in patient services. Amelioration of healthcare training implementation will encourage healthcare personnel to serve patients better. Training interventions aimed at healthcare service providers should focus on both training its personnel and ensuring effective and efficient on-the-job application of learnings delivered during training programs, with a view to benefit the end customer

Keywords

healthcare, patient service, training transfer, learning transfer, knowledge and skill application

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Introduction

The healthcare sector has been at the forefront of witnessing revolutionary changes in both the external and the internal business environment. Organizations providing healthcare services have been addressing these uncertainties and challenges by training their workforce on diverse skill areas, thereby strengthening capabilities of its employees to perform effectively in a dynamic scenario. According to [1] continual learning of the workforce will be a critical competency for organizations to sustain in a dynamic business environment. Enrichment in training quality to hospital personnel enhances their patient service capabilities and nurtures human-centric values in their medical duties, thus augmenting the trust of patients in the hospital [2]. Hence, there is a greater emphasis on shaping the behavioral skills of the employees on a consistent basis to ensure quality healthcare services to patients. This warrants investments in terms of time, money and other key resources. Organizations are therefore compelled to invest continually on professional development of their employees to ensure consistent performance [3]. Estimates suggest that in the United States alone, organizations spend to the tune of \$130 billion for training and development initiatives [4]. Such massive investments in training infrastructure are justified only when there is a systematic process ensuring learning transfer of content disseminated in the training sessions, back in the actual environment. A robust training transfer mechanism focusing on application of acquired knowledge and skills thus becomes an indispensable criterion for healthcare organizations to enhance their return on training investment as well as to ensure quality service delivery. Training transfer is defined as the application of concepts and skills delivered in a training program, back at the workplace. Researchers [5]

define transfer of training as “the use of trained knowledge and skills back on the job.” However, merely training employees without adequate implementation measures would render the training initiative futile. Studies by [6] suggest that for human resource development initiatives to be effective, practical transfer of knowledge imparted is an indispensable criterion. Training transfer thus becomes the logical progression of the training. Until now, little importance has been given to the use of leveraging tools and techniques that account for transfer of training at the workplace. Central to the discipline of transfer is the efficient utilization of strategies that ensure implementation of training skills and knowledge from the classroom to the workplace.

Objectives

- Highlighting training implementation of patient service skills amongst hospital personnel to ensure superior service delivery.
- Promoting technology led training transfer tools such as Augmented Reality and E-learning in healthcare institutions to facilitate effective implementation of patient service skills.

Literature Review

Numerous studies over the past few decades have indicated the need to upgrade healthcare services through employee trainings [7]. Recent evidence has demonstrated the effectiveness of healthcare training interventions in enhancing service delivery in healthcare institutions. Research by [8] proves the efficacy of customized training programs such as Excellence in Patient Relationship (EPR) in upgrading patient service satisfaction through superior

levels of service performance. Similar sentiments are echoed in research undertaken by [9] which clearly indicates positive impact of knowledge enhancement on parameters such as process efficiency, increased compliance to guidelines as well as superior quality. Assessment studies conducted to evaluate the impact of leadership development programs in India demonstrated positive results on developing leadership competencies of physicians [10]. However, integrative literature review by [11] clearly suggests that robust research in the domain of knowledge transfer in the healthcare sector has been limited. Research evidence from [12] reveals that training professionals posit the time spent during the training interventions (31%) and time after (32%) to be the most critical for affecting transfer. In their review, researchers [13] emphasize the necessity of pre and post-training learning interventions towards enabling workplace training transfer. Healthcare institutions run the risk of not being able to enhance their employee skills and also compromise on service quality and care, in the absence of a learning transfer mechanism [14]. It is paramount significance to address that often the transfer process is riddled with organizational impediments including high patient turnover, time constraints, inadequate manpower and work overload [15]. Findings by [16] reveal that institutional barriers tend to adversely impact the transfer of training, thereby further influencing patient service outcomes. Results from research undertaken by [17] demonstrate the utility of implementation of training transfer framework for information security awareness training program. Researcher [18] observes that evaluation of transfer process builds accountability in trainers and trainees towards achieving transfer success and facilitation creation of learning culture that encourages on the job application.

Measurement of training transfer impacts trainees' application of trained knowledge at work [19]. Evidence from the past decade, shows successful training transfer of a healthcare training intervention titled Leading in a Learning Organization (LLO), where employees were motivated to utilize their training knowledge on account of application incentives extended by the organization [20]. Furthermore, the study was able to identify specific variables impacting transfer of training. Similar sentiments were echoed in a study conducted by [21] which emphasizes the importance of considering all the elements impacting transfer of learning related to nurse clinicians. In their review study, focusing on team-training for healthcare workforce, [22] identified that transfer of training was strengthened using coaching and supporting communication tools. There is a pressing need to identify and implement training transfer tools in healthcare institutions to ensure long-term success of training interventions aimed at enhancing service quality to patients.

HEALTHCARE LEARNING CHAMPION (HLC) INTERVENTION

About HLC

The Healthcare Learning Champion (HLC) is a unique intervention that aims to focus on the implementation of concepts and skills disseminated during classroom training programs. This intervention delivers a host of benefits to the organization. Some of the pertinent benefits of the intervention include the following:

- Enables the employees in healthcare institutions to deliver superior levels of service to patients and attendants.
- Encourages application of learnings and concepts imparted during the course of the training program.
- Curtails training touch-time by ensuring seamless transfer of knowledge from training workshop to the actual workplace.

HLC Training Program Methodology

The program methodology was designed and developed to aid training transfer by learners in a post-training environment. Evidence shows that the training content designed in alignment with the job tasks has been proved to impact the transfer process [23] [24] [25]. The program methodology emphasized on ensuring a pragmatic learning environment through a blend of experiential activities and conceptual pedagogy. Some of the training techniques leveraged during the program involved the following:

Theatre based enactments

Role play enactments based on theatre led activities were used to sensitize participants on service skills to be exhibited during patient interactions. These activities were also designed to promote practice of these skills during interactions with patients in real life scenarios.

Video demonstrations

Video clips of desired skills to be showcased by participants during service encounters were displayed during the workshop. The video clips highlighted both the "correct way" and the "incorrect way" of handling patient situations, handling emergencies and managing crisis situations in the hospital.

Case studies

Case studies simulating patient service situations were used to drive learnings insights. The case studies emphasized on the best practices being undertaken across the healthcare sector to promote patient service excellence.

HLC Training Transfer Mechanism

Organizations in the healthcare sector have been striving to ensure seamless transfer of trained knowledge and skills. This requires application of effective tools and techniques that aid the transfer mechanism in a post-training environment. Recent developments in the field of transfer of training have witnessed the advent of diverse strategies being leveraged by organizations to facilitate transfer at the workplace. The training transfer tools effectively utilized as part of the HLC intervention comprised of the following:

Augmented Reality

Each participant was provided AR enabled cards which functioned in conjunction with the mobile application. The AR cards were equipped with information modules on patient service excellence, which the participants could view

as per their time and place convenience. Augmented Reality (AR) plays the role of bridging the gap between the virtual world and the real environment [26] and past results prove the efficacy of AR in effectively enabling the medical training for physicians [27]. Evidence from research undertaken by [28] portrays a positive impact of AR in driving training transfer of skills at the workplace. Previous research in this regard has proved that AR is an effective tool in enhancing learning experience [29] [30]. Research findings by [31] attest that AR facilitates enhanced levels of learner engagement, promotes interactivity and makes the learning experience enjoyable. In another research conducted by [32], it was discovered that AR is an effective learning tool for students in the medical fraternity on account of its ability to provide visual feedback to the learners. AR also enhances the proficiency of training delivery, thus impacting the outcome for patients positively.

Mobile Phone Application

A mobile phone application was designed to facilitate a learning platform for the AR led service training modules. The mobile application also aided the participants to track their learning performance through inbuilt assessment modules. Research has shown that mobile based learning is changing the learning paradigm and the way participants are consuming content [33] [34]. Further studies initiated by [35] [36] have also demonstrated encouraging results of leveraging mobile application based learning in motivating behavior change. Mobile phones applications can therefore be effectively harnessed to motivate knowledge application in a post-training scenario.

E-learning

E-learning modules were designed to supplement knowledge dissemination of service concepts such as handling patients with empathy, dealing with rude attendants, crisis management, golden hour treatment, and other essential service areas. Participants were able to access the E-learning modules on their mobile phones, and ensure learning implementation at their own pace and convenience.

Whatsapp Learning Groups

Whatsapp learning groups were created comprising of participants from each training workshop. The Whatsapp group was used to share byte size training implementation tips, address participant queries and check progress on application of service concepts delivered during the training.

Research methodology

A mixed-method study was chosen to extract insights from the respondents. The objective of a mixed-method investigation was to collect perspectives from both the training participants as well as their immediate reporting managers on the effectiveness of the HLC intervention in delivering workplace transfer. A survey questionnaire was created and circulated to gather data from 115 participants from the HLC intervention. Respondents to the survey included 66 female participants and 49 male participants.

The respondents for the survey were chosen on the criterion that they had completed one year in their current job role and possess a minimum of 5 years of relevant industry experience.

In addition to the survey, semi-structured depth interviews were undertaken with 18 Managers representing the participants from the training intervention. Given the travel restrictions owing to the pandemic situation, the interviews were conducted virtually using Webex online platform. The virtual interviews were recorded and consequently transcribed to perform manual thematic analysis. Based on the transcription, initial codes were formulated. Subsequent thematic analysis revealed common themes from the interviews conducted with the participant Managers. Some of the noteworthy themes gathered from the analysis comprised of role of technology led tools in enabling transfer of training, participant engagement using various tools for training transfer, learner convenience associated with leveraging technology led transfer tools, etc.

Results and analysis

The results of this case study divulge vital information and have implications for practice in the healthcare segment. Participants' feedback and testimonials gathered from decision-makers in the hospitals involved in the study, highlighted effective use of technology led transfer tools such as Augmented Reality, Mobile Application, E-learning and Whatsapp Learning Groups in enabling training transfer at the workplace. Results from participant surveys and semi-structured interviews with their Managers and subsequent thematic analysis revealed the following key findings:

- Participants reported a "higher degree of training transfer" owing to technology led tools such as mobile application and Augmented Reality;
- Younger trainees (less than 35 years of age), in comparison to their senior counterparts, reported the transfer process to be "extremely engaging" and "convenient to use";
- The training transfer tools were found to be equally effective by both male participants and their female counterparts;
- Trainees from diverse functions informed the HLC intervention to be "effective in workplace application" of service skills and knowledge delivered during classroom training programs.

Some of the noteworthy achievements of the Healthcare Learning Champion (HLC) intervention on training transfer, at an organizational level were as follows:

Superior levels of service delivery

On-the-job application of service concepts led to substantial improvements in service delivery to the patients and attendants. During the six month period following the introduction of HLC intervention, the patient complaints dropped by 27 percent, while the average patient waiting time reduced by 19 percent. Equally positive results were recorded with regards to overall patient satisfaction scores which increased from 68 percent to 84 percent on average.

Enhanced patient care

The healthcare institutions that successfully implemented the HLC intervention also witnessed a meteoric rise in patient care performance by their employees. Also the employees showed higher implementation of learned service concepts and better engagement at the workplace.

Effective crisis management

The participants who underwent the HLC intervention also reported effective crisis management capabilities and increased levels of confidence in handling emergency scenarios. Some participants also informed of being able to exercise restraint to volatile behavior displayed by unruly patient attendants.

Discussion

The findings of the study provide ample evidence that proves that when employees in healthcare institutions are equipped with tools for training transfer through interventions such as the HLC, it leads to effective application of service skills and knowledge at the workplace. Research in the past highlights holistic training practices involving both healthcare workers and patients that have yielded desired results and have been vastly effective [37]. On similar lines, [38] have posited the necessity for healthcare institutions as well as teaching centres in medical domain to focus on training the healthcare personnel consistently.

However, it is pertinent to note that only mere delivery of training programs would be inadequate to drive service excellence, and hence provision of appropriate tools to facilitate training transfer by learners in a post-training environment is highly indispensable. Training interventions must be fortified with a robust implementation strategy to ensure training transfer by participants on a continual basis, so as to plug the theory-practice gap. Conventional transfer techniques such as one-one-coaching and on-the job training, although necessary are inadequate, and therefore must be complimented with dynamic technology based tools such as Augmented Reality, mobile applications and e-learning platforms. A successful training transfer mechanism would empower the training ecosystem in healthcare institutions and would justify investments in employee skill-building initiatives.

Conclusion

This case study is enormously pivotal in the context of the training interventions being initiated in healthcare institutions as it focuses on ensuring service delivery at the workplace by facilitating tools that encourage training transfer of service concepts imparted during the training intervention. It is relevant that organizations need to motivate their employees to convert learning into sustainable behavior change [39]. Initiatives such as the Healthcare Learning Champion (HLC) would motivate learners and promote a culture of implementation of service skills in a post-training scenario through technology led tools such as Augmented Reality and mobile phone

applications. However, there are some pertinent limitations concerning this study that need consideration. It was noticed that several healthcare institutions undertake training as a mere “checklist activity” thereby impacting the training implementation by employees. Also, participants from the intervention reported of lack of organizational support in facilitating training transfer, as it was considered to be an intrusion in performing routine tasks. It is quintessential for organizations to support transfer efforts by learners through a congenial transfer climate as advocated by [40]. Past healthcare studies reveal that workplace environment is likely to influence the learning outcomes arising from workplace training [41]. In a select few cases, it was identified that limitations of access to technology also proved to be a deterrent in using tools that facilitate transfer of learning. In spite of these shortcomings, the researchers strongly advocate that this study contributes to our existing knowledge of transfer of training in the healthcare sector and that there is an urgent need for healthcare training providers to fill in the transfer gap through robust post-training interventions to ensure continual upgradation in service standards.

This study is crucial as it offers innovative solutions based on the tenets of cutting-edge technology to aid transfer of service concepts and learning in the real workplace scenario. It is strongly advocated that further research needs to be initiated in discovering novel tools that would inspire trainees to apply their learnings in real life scenarios, thereby augmenting the quality of service delivery to patients. Training transfer interventions such as Healthcare Learning Champion (HLC) can potentially be leveraged effectively across the healthcare domain to target training implementation of other relevant skills that impact service quality and hospital reputation. Finally, this study believes that it will stimulate healthcare researchers and training providers to perform deeper investigation in identifying tools and techniques that would positively impact training transfer of skills and knowledge at the workplace.

References

- [1] Wilson, I. and Madsen, S., 2008. The influence of Maslow's humanistic views on an employee's motivation to learn. *SelectedWorks*.
- [2] Lien, C.H., Wu, J.J., Chen, Y.H. and Wang, C.J., 2014. Trust transfer and the effect of service quality on trust in the healthcare industry. *Managing Service Quality*.
- [3] Cromwell, S.E. and 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), pp.449-471.

- [4] Rivera, R.J. and Paradise, A., 2007. ASTD 2007: State of the Industry Report.
- [5] Burke, L.A. and Hutchins, H.M., 2007. Training transfer: An integrative literature review. *Human Resource Development Review*, 6(3), pp.263-296.
- [6] DeSimon, R.L., Werner, J.M. and Harris, D.M., 2002. *Human Resource Development* (3rd), Sea Harbod Drive.
- [7] Stoller, J.K., 2013. Commentary: recommendations and remaining questions for health care leadership training programs. *Academic Medicine*, 88(1), pp.12-15.
- [8] Dixit, R.R., 2019. Enhancing service experience through excellence in patient relationship (EPR) training programs. *Indian Journal of Public Health Research & Development*, 10(5), pp.771-776.
- [9] Nordin, A.M.M. and Areskoug-Josefsson, K., 2019. Behavioural and operational outcomes of a Master's programme on improvement knowledge and leadership. *Leadership in Health Services*.
- [10] Gulati, K., Singh, A. R., Kumar, S., Verma, V., Gupta, S. K., & Sarkar, C. (2019). Impact of a leadership development programme for physicians in India. *Leadership in Health Services*.
- [11] Pentland, D., Forsyth, K., Maciver, D., Walsh, M., Murray, R., Irvine, L. and Sikora, S., 2011. Key characteristics of knowledge transfer and exchange in healthcare: integrative literature review. *Journal of Advanced Nursing*, 67(7), pp.1408-1425.
- [12] Burke, L.A. and Hutchins, H.M., 2008. A study of best practices in training transfer and proposed model of transfer. *Human Resource Development Quarterly*, 19(2), pp.107-128.
- [13] Ford, J.K., Baldwin, T.T. and Prasad, J., 2018. Transfer of training: The known and the unknown. *Annual Review of Organizational Psychology and Organizational Behavior*, 5, pp.201-225.
- [14] Donovan, P. and Darcy, D.P., 2011. Learning transfer: the views of practitioners in Ireland. *International Journal of Training and Development*, 15(2), pp.121-139.
- [15] Maben, J., Latter, S. and Clark, J.M., 2006. The theory–practice gap: impact of professional–bureaucratic work conflict on newly-qualified nurses. *Journal of Advanced Nursing*, 55(4), pp.465-477.
- [16] Uppal, S., Oades, L.G., Crowe, T.P. and Deane, F.P., 2010. Barriers to transfer of collaborative recovery training into Australian mental health services: implications for the development of evidence-based services. *Journal of Evaluation in Clinical Practice*, 16(3), pp.451-455.
- [17] Ghazvini, A. and Shukur, Z., 2016. Awareness training transfer and information security content development for healthcare industry. *International Journal of Advanced Computer Science and Applications*, 7(5), pp.361-370.
- [18] Bates, R.A., 2003. Managers as transfer agents. *Improving Learning Transfer in Organizations*, pp.243-270.
- [19] Longenecker, C.O., 2004. Feature articles maximizing transfer of learning from management education programs. *Development and Learning in Organizations: An International Journal*.
- [20] Gilpin-Jackson, Y. and Bushe, G.R., 2007. Leadership development training transfer: a case study of post-training determinants. *Journal of Management Development*.
- [21] Botma, Y. and MacKenzie, M.J., 2016. Perspectives on transfer of learning by nursing students in primary healthcare facilities. *Journal of Nursing Education and Practice*, 6(11).
- [22] Weaver, S.J., Dy, S.M. and Rosen, M.A., 2014. Team-training in healthcare: a narrative synthesis of the literature. *BMJ Quality & Safety*, 23(5), pp.359-372.
- [23] Holton III, E.F., Bates, R.A. and Ruona, W.E., 2000. Development of a generalized learning transfer system inventory. *Human*

- Resource Development Quarterly, 11(4), pp.333-360.
- [24] Rodríguez, C.M. and Gregory, S., 2005. Qualitative study of transfer of training of student employees in a service industry. *Journal of Hospitality & Tourism Research*, 29(1), pp.42-66.
- [25] Lim, D.H. and Morris, M.L., 2006. Influence of trainee characteristics, instructional satisfaction, and organizational climate on perceived learning and training transfer. *Human Resource Development Quarterly*, 17(1), pp.85-115.
- [26] Bronack, S.C., 2011. The role of immersive media in online education. *The Journal of Continuing Higher Education*, 59(2), pp.113-117.
- [27] Sielhorst, T., Obst, T., Burgkart, R., Riener, R. and Navab, N., 2004, September. An augmented reality delivery simulator for medical training. In *International Workshop on Augmented Environments for Medical Imaging-MICCAI Satellite Workshop* (Vol. 141, pp. 11-20).
- [28] Dixit, R. and Sinha, V., 2019. Leveraging augmented reality for training transfer: a case of healthcare service providers in ophthalmology. *Development and Learning in Organizations: An International Journal*, 34(6), pp. 33-36.
- [29] Chang, G., Morreale, P. and Medicherla, P., 2010, March. Applications of augmented reality systems in education. In *Society for Information Technology & Teacher Education International Conference* (pp. 1380-1385). Association for the Advancement of Computing in Education (AACE).
- [30] Lee, K. (2012). Augmented reality in education and training. *TechTrends*, 56(2), 13-21.
- [31] Moro, C., Štromberga, Z., Raikos, A. and Stirling, A., 2017. The effectiveness of virtual and augmented reality in health sciences and medical anatomy. *Anatomical Sciences Education*, 10(6), pp.549-559.
- [32] Hamza-Lup, F.G., Rolland, J.P. and Hughes, C., 2018. A distributed augmented reality system for medical training and simulation. *arXiv preprint arXiv:1811.12815*.
- [33] Quinn, C.N., 2011. *Designing mLearning: Tapping into the Mobile Revolution for Organizational Performance*. John Wiley & Sons.
- [34] Udell, C., 2012. *Learning everywhere: How mobile content strategies are transforming training*. Float Mobile Learning.
- [35] Franko, O.I. and Tirrell, T.F., 2012. Smartphone app use among medical providers in ACGME training programs. *Journal of Medical Systems*, 36(5), pp.3135-3139.
- [36] Conroy, D.E., Yang, C.H. and Maher, J.P., 2014. Behavior change techniques in top-ranked mobile apps for physical activity. *American Journal of Preventive Medicine*, 46(6), pp.649-652.
- [37] Batalden, M., Batalden, P., Margolis, P., Seid, M., Armstrong, G., Opipari-Arrigan, L. and Hartung, H., 2016. Coproduction of healthcare service. *BMJ Qual Saf* 25: 509–517.
- [38] [Musson, D.M. and Helmreich, R.L., 2004. Team training and resource management in health care: current issues and future directions. *Harvard Health Policy Review*, 5(1), pp.25-35.
- [39] Noe, R.A. and Kodwani, A.D., 2018. *Employee Training and Development*, 7e. McGraw-Hill Education.
- [40] Kontoghiorghes, C., 2001. Factors affecting training effectiveness in the context of the introduction of new technology—a US case study. *International Journal of Training and Development*, 5(4), pp.248-260.
- [41] Clarke, N., 2005. Workplace learning environment and its relationship with learning outcomes in healthcare organizations. *Human Resource Development International*, 8(2), pp.185-205.