

Perceptions of Teachers about a Web-Support System as a Means of Technology Integration

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Abstract

Problem Statement: Although a web-based support system is used to support courses in many ways in education, in-service training of teachers mostly depends on classes, workshops and follow-up studies. However, due to working and studying at the same time, teachers face many challenges. They need more communication and more support during in-service training.

Purpose of the Study: This study aims at understanding the perceptions of teachers and trainers of a web-support system integrated into an in-service teacher training program at a state university in Turkey.

Methodology: This is a case study using action research strategy under qualitative research paradigm. 6 teacher trainers, 8 trainees involved in an in-service teacher training program at a state university constituted the participants of the study. The sampling method used in this study was convenience sampling. A web-support system was developed by the researcher and implemented for a semester after piloting. Demographic Survey, Needs Analysis Interview, and Interview Guides I and II as data collection instruments and program documents, field notes, logs to the website, and e-mails exchanged as additional data sources were employed. Teachers and trainers were interviewed about the implementation of the web-support system.

Findings: The analysis of the interviews indicated that both teachers and trainers perceived the web-support system as partly beneficial and its integration into the curriculum to be partial. They suggested some

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compulsory activities should be added to the web-support system and some sessions should be provided online.

Conclusion and Recommendations: Most of the trainee and trainer beliefs were supportive of using and integrating technology, but through the implementation of the web support, some of them achieved what they wanted and some did not. There were different views about the success of the technology integration. Teachers' comments indicate that they want proper and close technical support and organization. Trainees declared that they felt autonomy when they studied on their own through the materials on the web support and when they e-mailed the trainers as it became necessary. Comments made by trainees showed their effort to implement what they saw and they were willing to go through this process on their own. It was observed that the online learning community expected was not established due to insufficient sharing and cooperation. Recommendations were made for improving the web-support system as an integral part of in-service training programs.

Keywords: in-service teacher training, web-support, online learning, case study, action research, professional development

Web-based technologies gain importance in the field of education and teaching as well as professional development. These technologies are preferred because they can achieve better time management, better allocation of resources, enhance learning through media and communications usage.

Web-support in its essence deals with blended learning, distance education, and technology enhanced media. In a way, it is a means of combining online and traditional learning. Hui et al. (2008) state that with technology it is possible to view materials and study according to one's own schedule. Also the material in paper form are reduced and they can be easily accessed online with less time being spent online (Matthew & Dohery-Poirier, 2000).

An example of web support help can be viewed as directing teachers to resources since it is common practice for teachers to look for authentic materials on the Internet. The result of a study by Atan (2006) reveals that the students value announcements and other kinds of information on the website of a course. They also want supplementary material to be put online and they accept that learning online exposes them to various learning strategies. Similar results and views are found by Seal & Przasnyski (2003, p. 30) about website of courses as content update and organization, and by Cabi (2004) as an easily adaptable repository. It is important that teachers discuss their experiences, reinforce what they learn in classroom, and need more support in terms of resources.

Teacher training programs have problems such as affecting the desired participant skills, identification of individual needs, matching individual needs with proper instruction. Teachers who attend in-service training face problems such as

lesson adaptation, student motivation, etc... Furthermore, training programs are in conjunction with the teaching program and teachers work at two jobs when they receive in-service training. That is why pre-service and in-service training teachers need more support and collaboration with colleagues to develop professionally (Bezzina, 2006). "Short-term workshops" (NCES, 1999) are not well-designed ways of sustaining the professional development of teachers, because of improper follow-up of ideas and teachers' neglected needs. That is why web-support becomes important for in-service training where what is taught and its implementation in class greatly differ (Joyce et al., 1980, as cited in Lowman, 2003).

In the light of the problems teachers are having, web support is seen as a good way to ease the burden of teachers and trainers and help them with their communication, file management and increase their support using videos and online tasks. By integrating web support, this study aims to explore the trainers' and teachers' perceptions of the web-support system. The trainers mentor trainees and coordinate their training program, while trainees work and receive training.

Web support for the in-service training has significant outputs to the technology-enhanced learning and learner-centered approach. Polly and Hannafin (2010) identified and analyzed studies that focused on learner-centered teaching in professional development activities from a technology-enhanced perspective. The role of technology was seen as a tool that tied activities to classroom practice. The role of web support or web-based support turned out to be a feedback and just in-time delivery mechanism and sharing of resources. Granger et al. (2002) also approve this as the most influential factor in terms of teacher's technology integration. The importance of online resources or tasks can be seen in many studies. Studies by Vaughan et al. (2011) and Pan et al. (2011) show that carefully planned online resources can lead to increased use of technology and certain benefits. Also in Karsenti and Collin's (2011) study, online resources play a vital role in qualifications of teachers.

Diaz and Dontenbal (2001, cited in Smolka, 2003) emphasize that it is efficient time wise to combine distance and traditional learning by saying that teachers do not have adequate time for training. Using an online system for keeping records of online interaction and materials will make it available to teachers so that they can view it whenever they like. They do not have to be in the classroom to communicate and read resources all the time.

It is recommended by Welingsky (2000, cited in Kostuch, 2004) that teachers should receive information about classroom teaching practice and have sufficient time to reinforce what they learn by classroom teaching. This is supported by McLaughlin and Oberman (1996, cited in Kostuch, 2004) who additionally suggest that teachers discuss their experiences with their peers. It is seen that an online system is ideal for discussion and it gives valuable time to practitioners to reflect and elaborate their learning.

Method

Research Design

In this study, case-study method with action research in qualitative research paradigm has been used. Action research was chosen because the research took a long time with mostly the same teacher trainers and different in-service trainees. Participatory action research was used to define cycles and "intrinsic case study" (Johnson and Christensen, 2004, p. 377) and single case design was chosen to study the process of how web support as a means of technology integration affected their beliefs and perceptions. Figure 1 shows the overall research design.

Case study is an approach to research that "investigates a contemporary phenomenon within its real-life context ..." (Yin, 2003, p. 13). It is stated that case study is "... a strategy to be preferred when circumstances and research problems are appropriate rather than an ideological commitment to be followed whatever the circumstances" (Platt, 1992a, p. 46, cited in Yin, 2003, p. 13).

Mills (2007, p. 5) defines action research as "...any systematic inquiry conducted by teacher researchers, principals, school counselors or other stakeholders in the teaching learning environment to gather information about how their particular schools operate, how they teach and how well their students learn." Specifically for this case, since the researcher was developing a web support for the needs and the preferences of the trainees and trainers involved in the professional development program, he had to meet, make decisions together with the trainers and participate in some of the material preparations as an outsider when needed. Participatory action research is defined as "a research approach that involves active participation of stakeholders, those whose lives are affected by the issue being studied, in all phases of research for the purpose of producing useful results to make positive changes" (Nelson, Ochocka, Griffin, & Lord, 1998, p. 12, cited in Westhues et al., 2008, p. 3).

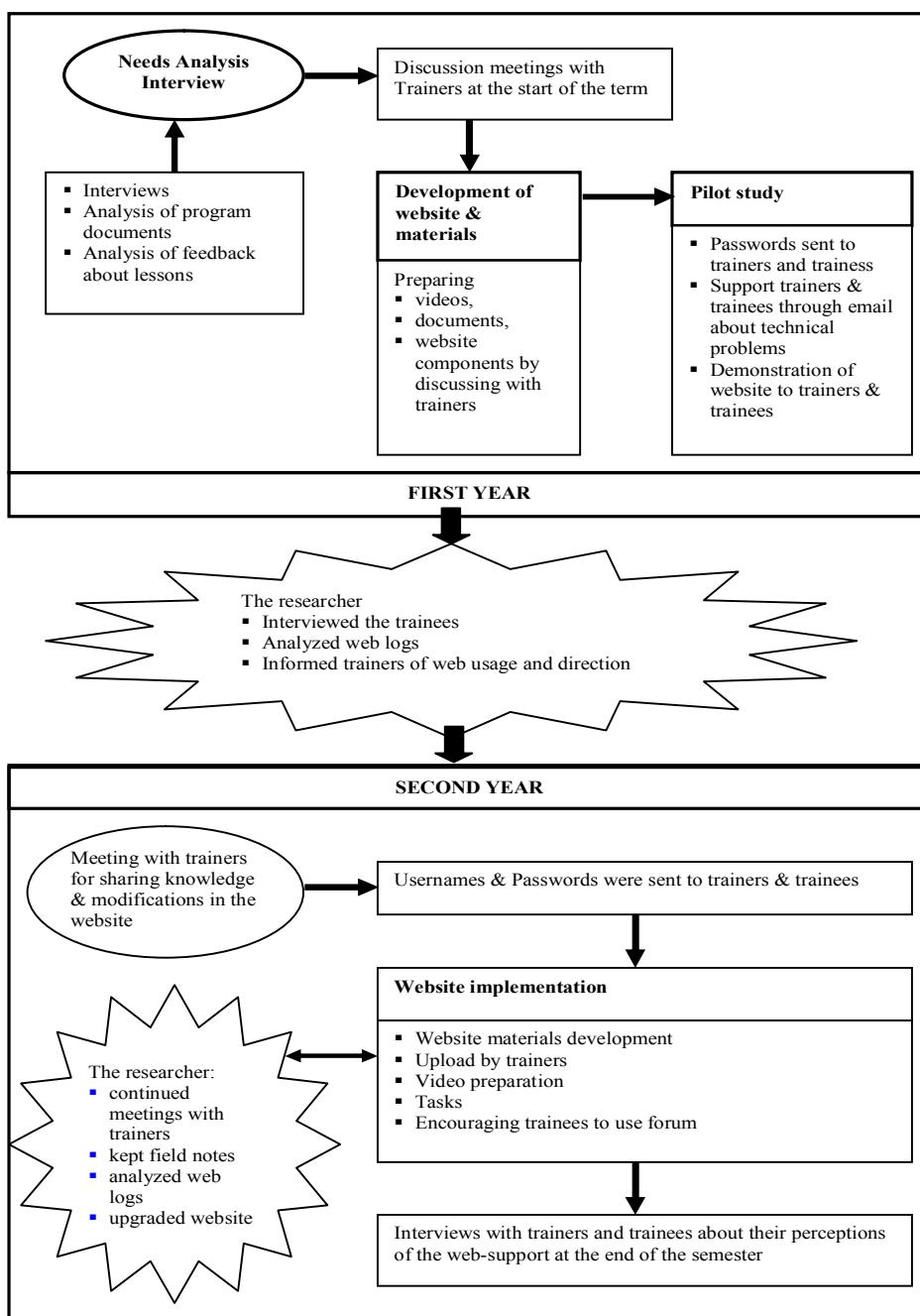


Figure 1. Overall Research Design

Yıldırım and Şimşek (2005, p. 39), see qualitative research as an approach type that aims to "attach primary importance the examining and understanding of social phenomena within the social environment it takes place." The researcher spent as much time as possible with trainers to understand the social phenomena and to make himself acquainted with the social environment.

Research questions

This study aimed at finding answers to the following questions:

1. What are the needs of trainees with their CTE program and how do the trainees think web support can help with the CTE program that is a professional development program?
2. What are the needs of trainers with the CTE program and how do the trainers think web support can help with the CTE program that is a professional development program?
3. What are the perceptions of trainers of the web-support system that is developed to be used within the CTE program in terms of the file system, the forum, online tasks, the curriculum on the web page, the online feedback, and the news section?
4. What are the perceptions of the trainees of the web-support system that is developed to be used within the CTE program in terms of the file system, the forum, online tasks, the curriculum on the web page, the online feedback, and the news section?

Research Sample

Six teacher trainers, eight trainees involved in an in-service teacher training program in the 2007-2008 academic year at a state university constituted the participants of the study. According to the results of the Demographic Survey for In-service Trainees, 2 newly hired teachers with no teaching experience, 7 teachers with 1-5 years of experience, and 6 teachers with more than 5 years of experience joined this research study. All teachers (both trainers and trainees) know how to use forum, billboards, chat and all can use browser and word processing programs. All trainees except one have computers at home.

The sampling method used for this study was convenience sampling because the in-service teacher training program was the only opportunity to implement the study within the context of the workplace and every stakeholder available in the given time frame was interviewed.

Research Instruments and Procedure

In this study, Demographic Survey for In-Service Trainees, a semi-structured Needs Analysis Interview, Interview Guide I, and Interview Guide II were employed as data collection instruments and program documents, field notes, logs to the website, and e-mails exchanged as additional data sources.

Demographic Survey for In-Service Trainees: The Demographic Survey for In-Service Trainees aimed at collecting demographic information about the participants such as their years of teaching experience, their skills in using computers and the Internet applications.

Needs Analysis Interview: This interview aims to understand the trainee needs and how they think web support can be helpful for their program. It contained 8 items for the trainees and 9 items for the trainers.

Interview Guide I: Interview Guide I aimed at getting trainers' and trainees' perceptions about the web-support that was presented to them in December 2006. It contained 11 items for trainers and 14 items for trainees. The items in both interviews were related to the components of the web-support, the problems they encountered in using the web-support, the relationship and coordination with the CTE program followed.

Interview Guide II: Interview Guide II was prepared with the aim of getting perceptions of the trainers and trainees about the web-support and its components launched in the 2007-2008 academic year fall semester. The Interview Guide II for trainees contained 17 items. The Interview Guide II for trainers contained 12 items.

The web-support system was implemented in the 2007-2008 academic year and the teachers and trainers were interviewed at the end of the semester about what worked well and what did not during the implementation of the web-support system.

Data Sources: The participating stakeholders were trainers and teachers. Documents used as data resources were interviews, emails, research documents gathered by the researcher from the website of the department, documents presented to the researcher by the trainers including program objectives, feedback to the program from previous years and field notes from the meetings.

Data Analysis

The researcher analyzed and categorized the emails between the researcher and trainers and teachers. The categories were technical problems, meetings, task preparation, forum, website suggestions, posting links and documents. There were 212 e-mails. 20 of these were between teachers and the researcher and 192 of these were between the trainers and the researcher. These e-mails enabled the researcher to see the research framework more clearly.

The field notes taken during the meetings with the trainers were about tasks and updates to the website. The content of these notes were carried out under the directions of the trainers and were used to explain the development process of the web-support.

Interview guides were used to carry out the interviews. The researcher used the qualitative tool *Weft QDA* (<http://www.pressure.to/qda/>) to form categories of the interview results. The coding scheme of the interviews was done by marking text and giving the most appropriate name for that category. The researcher carried out

the same procedure for all interviews. After finishing the coding and categorization, to ensure trustworthiness, the researcher sent a large portion of the data of all interviews to two experts who were competent in data analysis and have knowledge of the field to employ the inter-rating and inter-coding processes. The researcher and the inter-coders then compared the results, negotiated for the naming of the categories within the framework of the evidence from the data provided, and they agreed on all the categories.

Out of ten categories, one of the experts named the category "Content" instead of "Curriculum and Objectives" and she categorized "professional development" into "video", "forum use" and "assignments" whereas the researcher categorized "professional development" under "tasks". The other expert agreed with the categories after reading and taking notes. The researcher discussed the categories with each participant and decided that there was no need to change the categories.

Reliability of a case study depends on reaching the same findings if the research is done in the same way (Yin 2003, p.37). In order to deal with issues of reliability, the researcher defined the pilot study, relations and communications with the trainers and trainees and data collection and analysis procedures extensively.

Results

In this section of the study, the results obtained are presented as responses to the research questions of the study.

The researcher examined any documents the trainers provided about the program, previous years' feedback documents, related research done by the institution and formed his basis of research and learnt needs of trainees and trainers from these documents and first interviews. The results are as follows:

Needs of trainees from documents and first interviews: The trainees needed more guidance, assignments, workshops, materials, less theory and more practice, more detailed program, more discussion and less session time. They thought web support presence would be beneficial and they wanted more communication opportunities and sharing of documents.

Needs of trainers from documents and first interviews: Teacher trainers wanted more resources, different ways to present content, online tasks, discussions and online feedback and they wanted trainees to share experiences. Results of the pilot study were used to make the web support more effective and results of the actual study were taken from the interviews in the 2007-2008 academic year. Below are the results of the actual study.

Trainees' (teachers') perceptions about the web support system: The interviewees were 7 trainees and 6 categories were formed as forum, file system, online tasks, curriculum, news and professional development.

File system: 3 trainees found the file system as usable; the other trainees declared that sometimes they had difficulty in finding the necessary files.

Online Tasks: Positive comments about the online tasks shared by most of the trainees indicated that they were useful and integrated into the curriculum. Some trainees said that the tasks could be more challenging and that they preferred to take tasks in class. Also time was seen as a constraint.

Forum: The forum was not used effectively and trainees related this to the fact that they were afraid to write on the forum as they could be evaluated by the trainers for what they wrote. Also, they related this to not enough integration with the curriculum and the occurrence of face to face meetings rather than online communication.

Curriculum: Curriculum on the web page was seen as a good way to see the program content and prepare for sessions. Some trainees wanted to see the curriculum content online while some wanted to see it as written form.

News: Positive comments included that the news page of the web support was seen as directing trainees about the web updates and appealing whereas negative comments included that trainees were already given information about news in class. They suggested that news section should be updated more often.

Professional Development: Trainees thought that web support directly or indirectly contributed to their in-service training program. Two trainees said that having a place to upload videos and show them to their students or viewing them was important and the tasks presented to them were real-life examples. They declared that they wanted to use videos in their own classes.

Suggestions: The trainees gave the following suggestions for improving the web-support system for their program:

- All documents should be online.
- Summaries of what is done in class should be put online.
- In order to lessen the session time, time should be divided into in-class time and time for online education and forum activities.
- The same password should be used for entering the website and the forum.

Trainers' perceptions of the web support system

File system: The trainers used the file system for sending documents for reading or extra materials and reminding trainees of various situations. Four trainees reported using the file system for sending extra materials and they found it better and more comfortable than sending through e-mail in terms of categorizing and time allocation. Two trainers reported that since their format of the sessions was not suitable, they preferred not to use the file system to send documents. It was found out that the file system represented an online repository for the trainers and trainees in this study. Trainers also added that documents sent through the file system made it possible for trainees to prepare for the next session.

Forum: For the forum, it was stated by the trainers that the forum would work better with trainees if trainers and trainees did not have many face to face meetings and trainers' habits of communication prevented them from using the forum.

Online tasks: Trainers saw online tasks as a tool for trainees to work on their own time and as saving time for their sessions. They thought that tasks remained as useful for their effect on session preparation and revision.

Curriculum: While one trainer said that s/he couldn't always put updates or objectives on time, the trainers saw the curriculum part of web support as useful for trainees because they could easily see its content online.

Integration: There were different views in terms of integration of web support into the program. Some trainers thought that web support was partial, some thought there was not a natural integration of the web support into the curriculum and some thought that they were well-integrated. According to the trainers, the problems depended on two departments working together and to the trainee profiles. In this area, the trainers suggested that in order for integration to become better, two parties, trainers and trainees, should work together and arrange sessions by both working on the web and by preparing the in-class sessions.

News Section: While most of the trainers agreed that news section was a strong part of the website, some said that it could be arranged better and it contained announcements that were already made in class.

Suggestions: The trainers suggested the following for the web support:

- Compulsory activities and content should only be available through the website.
- Sessions should be rearranged and organized better.
- Better needs analysis should be conducted with more people included.

Discussion and Conclusions

The results were categorized under several items namely as the adoption and integration of Information and Communication Technologies (ICT), benefits of web-support, adult learning and autonomy, online discussion and moderator. The results in these categories from this study and from the literature are discussed and compared.

Adoption and integration of ICT: The degree of adoption of technology is indirectly proportional to the resistance of technology users. In this study, the reasons for not using web-support were named as time allocation and integration difficulties with sessions due to technical problems. In addition, adoption requires more time to be fully integrated and used as a part of the daily processes in the teacher-training center. Literature shows examples of readiness of teachers for technology integration (NCES, 1999).

In a study performed by El-Tigi (2000) in which the researcher tried to understand the perceptions of website of a course used as support to in-class sessions, visual apparel, readability and importance of material on the web were highly valued, whereas introductions, quality of web page segments and presentation of new information were low rated. In El-tigi's study, the barriers were defined as the uniform resource locator (URL) of the web site, motivation to use the website, time constraints and non-mandatory use of website. Guidance, access to materials, and ease of communication were positively rated. The same barriers as URL, time constraints and non-mandatory usage of the website were also observed in the present study.

Teacher training programs fail to provide effective integration regarding instruction (Gülbahar, 2008). Experiencing the usage of ICT for instructional purposes also ensures that teachers in training would use similar methods in their own courses. Gülbahar (2008) also stated that teacher training programs do not let learners see appropriate examples of ICT integration in class. Akbulut (2009) also found out that, indicators of ICT integration showed problems for Turkish education faculties. Akbulut (2009) defines the subcomponents of technical issues as ease of use, infrastructure, access and technical assistance. Also, professional development is considered as a subcomponent of technical issues by UNESCO (2002) and as a subcomponent of collaboration by Akbulut (2009). According to Akbulut's model "access, ease of use and technical assistance were primarily predicted by infrastructure" (Akbulut, 2010, p. 329) and the teaching/learning method shows quality of distributed learning. In the present study, the infrastructure of the university was sufficient to show videos and for general connection to the website of the program. There were not many trainees and trainers so the website of the course did not experience connection difficulties. However, some of the trainees found access to online documents difficult and they needed assistance with their password and forum. The professional development that UNESCO (2002) defined is related to the teachers' usage and knowledge of computer and the Internet operations. To understand how many years teachers were using computers and in what ways they benefited from computers and the Internet, the researcher used forms. The researcher showed both trainers and trainees how to use the website to prevent any difficulties and introduced them to forms at the start of the study.

Del Favore and Hinson (2007) explain that due to Blackboard usage, both student learning and faculty expertise with technology increased for they could reach notes assignments and communications easily. According to Bennett and Bennett, beliefs and attitudes of faculty members are the strongest factor of determining the use of technology (2003, as cited in Usluel et al., 2008). They also found that faculty members use ICT for course announcements and lecture notes. The website that the researcher built resembled in some ways to Blackboard. It remained as a tool for sending notes, assignments and videos and it was connected to a forum for all teachers. Since the ideas, attitudes of both trainers and trainees were included in the forum and operations of the website, it was also the strongest factor in the present study.

It is stated in Staples, Pugach and Himes (2005) that curriculum alignment is strongly related to support technology integration and it should be a primary concern of technology integration. While the curriculum is very important, we cannot ignore the importance of teacher competencies and infrastructure. Akbulut et al. (2011) termed arrangements in the curriculum as a necessary step for understanding needs to achieve technology integration. Curriculum is also seen as an obstacle in Eteokleous' (2008) study as the teachers are bounded with unconstructivist methods and incorporation of technology with modern teaching strategies was out of question. As seen, the curriculum is a very important element of technology integration in professional development. In the present study, if curriculum was formed with technology and the website in mind, it could lead to a better integration. The trainers' comments about "not a natural integration" and "partial integration" rest on the fact that each and every lesson should be prepared with their integrative technology and methods to increase the integration and for maximum learning benefits.

According to Ertmer et al. (2012) technology integration occurs if it is used to deliver content, enrich curriculum and transform learning. In this study, technology was used to deliver content and enrich curriculum with online tasks and it was tried to transform learning by needs and suggestions of trainees such as receiving documents prior to lessons or continuing studying where they left off in class. The trainees who benefited most from the transform of learning were different learner types as far as we could tell from the interviews. Teacher professional development could benefit from their research by targeting their technology use to specific purpose in which teachers' beliefs and their teaching methods meet (Hughes, 2005). In the present study, while investigating teachers' needs and perceptions individually and while the researcher met with each teacher, he found out what beliefs influenced their practices and that brought a broader definition of technology integration.

Teachers' comments about the technical personnel and the coordinator tell us that they want more proper and close technical support and organization. Literature dictates that teachers involvement should be enhanced in educational settings. The researcher involved all ideas of teachers in all parts of the research.

Benefits of Web-support: The benefit of web-support in terms of files uploaded to the system was that during sessions trainees could miss the important points of theoretical parts and if they wanted to review content of these sessions, they could see on the web as well as receiving lecture notes before class made them aware of the topics in the sessions and they could prepare better. Also online content and resources could be valuable while the trainees transferred their knowledge into practice. It is seen in the interviews in this study that if there were more mandatory activities and attendance, the integration hence the benefits of web support would increase. In a study by Arslanyilmaz and Pederson (2010) four tasks done in dyads resulted in students producing better language after observing online tasks. Zwyno and Kennedy's (2002) study supports receiving lecture notes prior to class as a

benefit of web support. Hew and Brush (2007) suggest collaborative projects in addition to online tasks which should be authentic and problem based in nature.

When we look at the literature, too much information on the web is not favored by most students or trainees. People may have different motivations to follow professional development and since this is in-service training in the first year for trainees, it is a means of passing and ensuring their position in the institution. Therefore, it is agreed that just enough information put on the web would be ideal but more resources could be put to satisfy the need of highly motivated trainees.

Adult learning and learning autonomy: Brown and Ritchie (1991, as cited in Granger et al., 2002) stated that teachers need to be autonomous to integrate technology into their lessons that they are introduced in in-service training. Since the trainers named program as learner centered, the web-support gave trainees an opportunity to learn independently at their own pace so it was convenient in terms of supporting different learning styles and pace. Trainees declared that they felt autonomy when they studied on their own through the materials on the web support and when they e-mailed the trainers as it became necessary. It was apparent from the results that the trainees needed more guidance and materials to become autonomous learners. One of the trainees pointed out that she was a slow reader and she appreciated being able to study on her own apart from the class. Since the training they received was directly related to their work, trainees were interested in their own training.

Gunn (2011) draws our attention to the importance of collaborative working of learners to reach a level of autonomy. Toyoda (2001, as cited in Gunn, 2011) stated three conditions for technology to promote autonomy in learning as accessible and reliable technology, sufficient computer literacy, communication with and support from peers. She added that structure of a course as in that allows choices to learners is also important in becoming autonomous. Some of these conditions in the current research had flaws such as accessibility due to password problems and computer literacy and communication in the sense of a blended learning approach was not well established. So it can be said that a higher level of autonomy could be reached.

Online discussion and moderator: In order to be used within the program, forum section of the web-support needed the trainers to be moderators. In this research, the trainers did not want to be moderators. If one of the trainers could modify the forum, it would be more integrated into the program. In order to involve sharing and contribute to the professional development of trainees, participation in the forum should constitute some criteria for evaluation and trainees wanted to put someone in charge of the forum as moderator. The fear of being evaluated for the messages they send to the forum could be dealt with using anonymous names. Akbulut et al. (2011) also stated that in Turkish faculties of education, the learning communities were low. In this study, in addition to the reasons explained, while under a different faculty, it was seen that the learning community expected was not established.

The research has the following points as output for further practice in terms of web support as an integral part of in-service training programs.

- Compulsory activities supported with forum and online tasks which will decrease in class session times.
- Documents for in-class session preparation and session summary.
- Communication and sharing capabilities of web support in the form of an online community for interaction of novice and experienced teachers from other universities.
- A moderator of forum and another trainer for modifications to be made to the website and for allocation of resources.
- Online tasks and videos with guided questions and feedback.
- A wider needs analysis before preparation of the web support with support from administration.

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Öğretmenlerin Teknoloji Entegrasyonu Aracı Olarak Ağ Destek Sisteme İlişkin Algıları

Atif:

Koç, S. E. & Özden, M. Y. (2013). Perceptions of teachers about a web-support system as a means of technology integration. *Egitim Arastirmalari-Eurasian Journal of Educational Research*, 53/A, 221-238.

Özet

Problem Durumu: Ağa dayalı destek sistemi ya da ağ sayfalarının eğitimde dersleri çeşitli yönlerden desteklemekte kullanılmasına karşı, hizmetçi öğretmen eğitimi çoğunlukla sınıf, çalıştay ve onu izleyen çalışmalarla dayanmaktadır. Öğretmenlerin ilk yıllarda aynı anda çalışmak ve kurslara katılmaktan dolayı çeşitli problemler yaşadıkları gözlemlenmektedir. Ayrıca öğretmenlerin hizmetçi eğitimlerinde daha çok destege ve deneyimli öğretmenlerin görüş ve önerilerine gereksinimleri olduğu belirlenmiştir. Bu nedenlerden öğretmenlerin kendi fikirleri doğrultusunda ağ destekli bir sistemden yararlanabilecekleri düşünülmektedir. Ancak her kurum öğretmenlerin mesleki gelişimleri için değişik ağ destek sisteme gereksinim duyduğundan, eğiticiler için gereksinimlere göre bir ağ destek sistemi düzenlenmesi esastır. Böylece hizmetçi öğretmen eğitiminde eğiticilerin gözetiminde teknoloji entegrasyonu yararlı olabilir.

Çalışmanın Amacı: Bu çalışma, öğretmenlerin ve eğiticilerin Türkiye'de bir devlet üniversitesinde hizmetçi öğretmen eğitimi programına entegre edilmiş bir ağa dayalı destek sisteme ilişkin algılarını anlamayı amaçlamaktadır.

Araştırmanın Yöntemi: Bu çalışma niteliksel paradigma altında eylem araştırması stratejisini kullanan bir durum çalışmasıdır. Bu çalışmaya bir devlet üniversitesinde yürütülen hizmetçi öğretmen eğitimi programındaki 6 eğitici ve 8 öğretmen katılmıştır. Bu araştırmada kullanılan örneklem yöntemi elverişli yöntemdir çünkü tüm öğretmenler böyle bir çalışma için elverişli değildi. Araştırmacı eğiticilerin ve öğretmenlerin gözetiminde onların gereksinimlerine göre bir ağ destek sistemi geliştirmiş ve sistemin formatını saptamak için yaptığı bir pilot çalışmanın ardından sistemi bir dönem süre ile uygulamıştır. Bu çalışmada veri toplama araçları olarak Hizmetçi Öğretmenler için Demografik Tarama, Gereksinim Çözümleme Görüşmesi, Görüşme Kılavuzu I ve Görüşme Kılavuzu II kullanılmıştır. Ek veri kaynakları olarak da alan notları, ağ sitesindeki girişler, katılımcılar arasındaki e-postalar ve programda yer alan belgeler kullanılmıştır. Öğretmenler ve eğiticilere dönem sonunda ağ destek sisteminin uygulanması sırasındaki fikirleri ile ilgili görüşme uygulanmıştır.

Bulgular: Görüşme çözümlenmesinin sonuçları hem öğretmenlerin hem de eğiticilerin ağ destek sistemini ve onun hizmetçi eğitim programına entegrasyonun kısmen yararlı olarak algıladıklarını göstermiştir. Katılımcılar ağ destek sisteminin gelecekteki uygulamalarında ağ destek sisteme zorunlu etkinlikler eklenmesini ve kimi oturumların çevrimiçi olarak sağlanmasılığını önermişlerdir.

Sonuç ve Öneriler: Görüşmelerden elde edilen sonuçlarda bilgisayar ve iletişim adaptasyonu, ağ desteginden kazanımlar, yetişkin öğrenimi ve öğrenme özerkliği ve çevrimiçi tartışma ve moderatör temaları oluşmuştur. Yabancı dil öğretmenlerinin özerkliği mesleki özerklik ile öğretim özerkliğinin entegrasyonuna dayanır. Çalışma ilk başladığında öğretmen ve eğitici inançlarının çoğu teknoloji kullanımını ve entegrasyonunu destekleyici yöndeydi. Kimi öğretmenler web desteği sayesinde istediklerini elde etmişler kimileri de istediği ulaşımda başarılı olamamıştır. Bu yüzden teknoloji entegrasyonu konusunda farklı fikirler ortaya çıkmıştır. Öğretmenlerin değişik gereksinimleri için kaynak ve çoklu ortam kullanan ağ desteği sayesinde özerk öğrenme deneyimleri gözlenmiştir. Öğretmenlerin teknik personel ve koordinatör ile ilgili yorumları bize daha uygun ve yakın teknik destek ve düzenleme istediklerini söylemektedir. Daha çok zorunlu etkinlik ve derse devam olsaydı, entegrasyon, doyayıyla, ağ desteginin yararı artacaktı. Öğretmenler, ağ destek sistemindeki materiyali kendi kendilerine çalışıklarında ve gerektiğinde eğiticilere e-posta gönderdiklerinde, kendilerini özerk hissettiklerini belirtmişlerdir. Kendi derslerinde video kullanmayı ya da çevrimiçi küçük sınavlar hazırlamayı istemeleri gibi öğretmenler tarafından yapılan yorumlar, bu programda gördüklerini uygulamak için çabaladıklarını ve bu süreci kendi başlarına yürütmeye istekli oldukları göstermektedir. Ağ destek sisteminin bir önemli çıktısı da çalışma öncesi ve sonrası yapılan görüşmeler ışığında farklı öğrenme stiline sahip ve farklı hızda öğrenmeye alışmış öğretmenlerin çevrimiçi belgelere ulaşmasını sağlayarak sınıfı derslere daha verimli katılımını ve bu dersler bittikten sonra dersleri anımsamak için gerekli belgelere daha düzenli bir biçimde ulaşmasını sağlamış olmasıdır. Kullanılan forum ve diğer iletişim yollarıyla daha çok paylaşım ve işbirlikli öğrenme ya da çevrimiçi bir topluluk yaratma olsaydı, daha çok özerklik görülecekti. Ancak, beklenen öğrenme topluluğunun oluşması gözlenmiştir. Gelecekte uygulanacak hizmetçi eğitim programlarının entegre bir parçası olarak ağ destek sisteminin geliştirilmesi için şu önerilerde bulunulmuştur.

- Çevrimiçi ödevler ve forum tarafından desteklenen zorunlu etkinlikler sınıf oturumlarının süresini kısaltacaktır.
- Sınıfı oturumlara hazırlamak için belgeler ve oturum özetleri verilmelidir.
- Ağ destek sisteminin iletişim ve paylaşma kapasitesinden bir çevrimiçi toplumu olarak diğer üniversitelerde görevli yeni ve deneyimli öğretmenlerle etkileşim için yararlanılmalıdır.
- Forum için bir moderatör ve web sitesinde yapılacak değişikler ve kaynak sağlanması için bir eğitici bulunmalıdır.
- Çevrimiçi ödevler ve yönlendirici sorular içeren videolar ve dönüt verilmelidir.
- Ağ destek sistemi geliştirilmeden önce yönetimce de desteklenen daha geniş bir ihtiyaç analizi yapılmalıdır.

Anahtar Sözcükler: Hizmetçi öğretmen eğitimi, ağ desteği, çevrimiçi öğrenme, durum çalışması, eylem araştırması, mesleki gelişim