IMPLEMENTING CONSTRUCTIVIST APPROACH INTO ONLINE COURSE DESIGNS IN DISTANCE EDUCATION INSTITUTE AT EASTERN MEDITERRANEAN UNIVERSITY

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ABSTRACT
Change and development in work settings for better working practice through projects has become essential. And, in this context, learning through working practice is constructed by participatory action research. This work-based research has a significant role to contribute innovative practice of Distance Education Institute at Eastern Mediterranean University by EUA norms. The research aimed to investigate implementing constructivist approach into online course designs to develop learning and skills of the online students based on teamwork inspiration within the institute. Action research approach employed in this qualitative research in order to provide insights on how to prepare and design online courses based on constructivist approach. Training, in-depth interviews, documentary analysis, focus group, research diary and semi-structured interviews were employed as data collection techniques to gather large amount of data from online tutors, and members of institute in relation to their collaborative efforts within the process. Furthermore, triangulated data were analyzed based on content analysis in this inductive journey. The results revealed that members and the tutors had no prior knowledge and experience on team work culture and the principles of constructivist approach into online course designs. In this respect, collaborative efforts and synergy power of the tutors within participatory action research resulted in better working performance for change and development research actions. This research is significant for considering change and development in working practice in relation to implementing constructivist approach into online course designs as it is one of the critical success factor for the quality in online practices. In addition, the research opens an academic debate which work based projects through participatory action research need to function in working practices to propose change and development for the quality improvements within higher education institutions.

KEYWORDS: constructivism, course design, online education, work based project

1. INTRODUCTION
Quality can be pursued by continuous improvements based on change oriented actions. In addition to that reality, gaining a competitive advantage lead higher education institutions differentiate their services due to the competitiveness and quality improvements in academia. In this respect, work-based projects become the need for constructing learning to be ongoing. Work based projects seek to merge theory with practice, knowledge with experience within the professional leadership (Doncaster, Lester, 2002). Without new or adapted knowledge, it is not possible to change either the meanings are attached to actions or the actions themselves (Raelin, 2008). Therefore, learning through experiences is centered around reflection on work practices for continuous improvements based on change. Regarding to EUA standards and the necessity of distance education practice in higher education policies, there is considerable need to handle a change and development of pedagogical and organisational aspects of these institutes' working practices through work based team projects. Therefore, universities seek to find out alternative methods such as distance education applications to differentiate service and promote dual mode as innovative quality strategy for the development. Distance education institutes become popular behind the reality of being quality strategy for higher education institutions.

The quality of the academic programs relies on the design of the courses within the program (Duffuaa, Turki, Hawsawi, 2003). In designing courses and the program by a new approach which requires innovation, change and adaptation, it is significant to consider committed decisions of the teachers who voluntarily involve in teams and act for better practices (Houston, 2008; Leinonen, Bluemink, 2008). As Passfield (2002) put an emphasis on action learning within institutions' members for outstanding success on course or program design, this opened a debate on teamwork and committed, shared decision making process to propose new practices within courses based on collaboration and involvement of the teachers as practitioners and also underlined course design as critical success factor for the quality in program development (Ho, 2006).

Good course design is a critical ingredient for developing and supporting deep learning (Ramsden 1992). It is argued that this involves formulating the intended learning outcomes carefully, designing learning activities that adequately enable students to achieve the learning outcomes, and implementing assessment activities that adequately measure the learning outcomes. Further, he stresses that these three aspects of the course design process should be 'constructively aligned', i.e., to be consistent with each other. Poor course design, on the other

hand, will often lead to student dissatisfaction and may even hinder learning (Ramsden, 1992). Not surprisingly then, researchers in online learning agree that good course design is critical in the success of online courses (Salmon, 2002; Laurillard, 2002). But what constitutes 'good' online course design? There is general agreement that online design should support participative, student-centred learning (Salmon, 2002; Hall, 2002; Laurillard, 2002). Active participation in online discussions does not occur by itself, but must be intentionally designed into a course (Salmon, 2002; Laurillard, 2002). Based on constructivist framework, supporting learners, designing authentic tasks, constructing an environment for learner reflection and incorporating collaboration are key features to encourage participation and enhance learning (Merrill, 1992; Savery, Duffy, 2001).

Research on online learning and teaching, agree that course design based on a constructivist framework is critical to the success of online practices based on constructivist framework (Gold, 2001; Ausburn, 2004; Salter, Richards, Carey, 2004; Wiesenberg, Stacey, 2005). A constructivist pedagogy enables students to manage their own learning through meta-cognitive, self-reflective and collaborative processes. Constructivist pedagogy is a significant element in the design of collaborative online practice which enhances the quality of learning and teaching online. The study of Salter, Richards, Carey (2004) provides an insight into the complex problem of designing pedagogically sound online course components that support the creation of a learning environment through a collaborative constructivist approach to online learning. The collaborative learning process allows students to construct a scaffold for critical thinking and provides immediacy of feedback in which peers give and receive help, exchange resources and information, give and receive feedback, challenge and encourage each other and jointly reflecting on progress and process (Curtis, Lawson, 2001). Making students who present their views and critically analyze the views of others is the essence of collaborative online learning within to the notion of constructivist pedagogy. Therefore, the theoretical framework for this study arises out of the analysis of issues about collaborative learning process within constructivist pedagogy.

Ausburn (2004) found evidence supporting the belief that course design has great impact on students' learning by investigating the most valued course design elements, namely options, personalization, self-direction, variety and a learning community. A number of arguments have been put forward by researchers that constructivist pedagogy accompanies collaborative online learning in order to foster skills (Wang, Poole, Harris, Wangemann, 2001; Huang, 2002; McLoughlin, Luca, 2002; Harris, Bretag, 2003; McLuckie, Topping, 2004). With regard to existing research on collaborative online learning based on constructivist framework, Huang (2002) provides an insight into how constructivist principles create a more learner-centred collaborative environment and support critical reflection and experiential process. McLoughlin, Luca (2002) argue strongly that collaborative learning is an effective pedagogy to foster skills of analysis, communication and higher order thinking of online students. Furthermore, Harris, Bretag (2003) argue for an increased emphasis on collaborative teaching to enhance both the communication skills of students and their learning outcomes. The study of Wang, Poole, Harris, Wangemann, (2001) puts an emphasis on the promotion of collaborative learning for the improvement of students' communication skills, awareness of the value of team work, development of effective presentation skills and competences in using tools.

Aside from the considerable academic debate surrounding various issues related to collaborative learning, there is sustainable gap in understanding the role of constructivist based course design in the enhancement of collaborative online learning and the development of critical thinking skills of students. Thus, Hughes, Daykin (2002), Morrison (2003) and Fisher, Baird (2005), Neo (2005) provide an insight into the impact of designing constructivist online learning to enhance the learning of students, they stay partial by not stressing the significant relationship between the role of course design in the practice of collaborative online learning based on a constructivist approach to develop critical thinking skills of students in relation to work based project team efforts within specific context through action learning. As constructivism revolves around the issue of how the collaborative process makes learners present their views and critically analyze the views of others, there is a need to extend our knowledge on what elements in course design constitute collaborative online learning which specifically develops the critical thinking skills of students within an action learning process of the tutors' commitment and collaboration.

The online course design based on constructivist approach is the success factor of the quality in online learning and teaching. Therefore, there is intensified need to create an action plan on online course designs that is one of the fundamental element to have qualified practice in distance education institutes based on committed decisions and actions (Elbaum, Mclntyre, Smith, 2002). Team work implementation has been accepted as a disciplined management process in higher education to focus on quality (Gunasekaran, McNeil, Shaul, 2002). By the participative management understanding, it is expected to increase quality in higher education programs by using distance education applications as quality strategy based on change management (Sohail, Daud, Rajadurai, 2006; Go´mez, et. al, 2007). In order to reach long run achievements based on vision and mission of higher education;

flexibility, teamwork and commitment on decisions are the hot issues that need to be discussed within distance education institutes to achieve desirable goals. Within this perspective, change and development in the online course design by constructivist approach to develop learning and skills of the online students is significant research focus that needs to be investigated to propose better working practice based on action learning and team inspiration. In relation to issues raised by literature and, European Universities Association report on status of distance education institute at Eastern Mediterranean University and research activities; focusing on implementing constructivist approach into a course design in order to develop learning and skills of the online students based on commitment of staff in distance education institute at Eastern Mediterranean University is crucial as worthwhile research topic and a demand for better institutional practice.

2. AIM OF THE RESEARCH
Work-based projects become the engine of organizational learning to furnish the developmental activities and educational efforts. As people need to learn in order to make self actualization, to conduct with their environment, to grow and become through these experiences, organizations need to learn to maintain themselves and also to develop their actions for the quality (Railen, 2008). Therefore, educational institutions have started to make continuous improvements actions based on European University Association norms. This work based research project aimed to make an action plan for the quality improvements in the Distance Education Institute at Eastern Mediterranean University. This research had a purpose of establishing commitment within decision making process for change and development in Distance Education Institute within the vision of the university to reach out global standards. In this respect, creating awareness on constructivist approach in online course designs; increasing the consciousness of members for committed decisions and actions for change; providing trainings to the staff about constructivist approach, preparing handbook by the outcome of action plan were the aims of this research that made contributions to the strategic plan of the institute and meeting the requirement of EUA report.

As the research mainly relied on creating the consciousness on collaboration, committed decision to change the course designs and integrating constructivist approach into course designs in developing learning and skills of the online students, it aimed to accomplish following objectives;

- To create the awareness of the Distance Education Institute members on team work for decision making about course designs
- To create consciousness on the constructivist approach in online education by the trainings
- To integrate constructivist approach into online course designs for developing critical thinking skills of online students
- To contribute organizational change in terms of the instructional design within distance education practices

2.1 Research Focus and Questions
In respect to change and innovation in the Distance Education Institute based on European University Association norms, research focus relied on the creation of consciousness on team work implementation in Distance Education Institute for online course designs and investigation on implementing constructivist approach into online course designs in developing learning and critical thinking skill of the online students regarding to action plan. The following research questions were answered based on participatory action research as it represents the nature of work based project:

Q1. To what extend, does Distance Education Institute perform team work implementation in designing online course?
Q2. To what extend, do online course designs of Distance Education Institute practice the notions of constructivist approach?
Q3. How does constructivist based collaborative learning perform in online program?
Q4. To what extend, does constructivist based online course design foster/limit skills development of students?
Q5. Based on the constructivist approach, what online course design elements creates the environment for collaborative learning and thus contributes to the development of critical thinking skills?

2.2 Research Context
Eastern Mediterranean University is one of the biggest higher education institutions in North Cyprus. It serves international, global education policies to students who are from sixty eight countries. The university promotes quality vision to gain competitive advantage. Eastern Mediterranean University is in the Bologna process and it is evaluated by European Universities Association in order to increase the quality in educational practice. EUA

reported on research activities and distance education practices which are accepted as major tools to help university expand its capacity and catch the quality vision.

Considering the EMU's limited resources to face the challenge of globalisation or to meet the needs of the Lisbon objectives on the development of an energetic society of knowledge in Europe, the report underlines that university needs to develop a university wide research policy, researcher collaboration and synergy between members by fostering in collaboration between different departments. The report significantly underlines the importance of work based projects within the institution to help departments which need to be improved.

EUA also reported on distance education and e-learning practices that these could help university gain competitive advantage by promoting lifelong learning culture in the region. In line with report on research activities, EUA confirms the necessity of distance education and the research policy in distance education practices to be improved it. In addition, report underlines that distance education institute needs to be improved as it could provide competitive advantage to the university with its practices. EUA report confirmed that experts in the field of distance education who are the part of the institute as worker researcher need to turn attention conducting to work based projects for change and innovation. As various research projects within the institute need to be undertaken to improve the institutional practice, this research was one of the work based projects that was taken place in Distance Education Institute at Eastern Mediterranean University in order to provide a change in the team inspiration of online tutors and develop their knowledge and practice on how to design online course based on constructivist approach.

2.3 Limitations
Although the research had following limitations, researcher successfully managed process to reach out credible research outcome.

- The research was conducted to Eastern Mediterranean University Distance Education Institute in 2008-2009 Academic Year.
- Researcher has dual roles as worker and the researcher which created huge loads within the research process.
- Participants had no prior knowledge and experience on online pedagogy.
- There were sixteen members as participants involved in research process based on voluntarism.
- Participatory action research was used as research approach that it was the first experience for the researcher and the participants.
- In a participatory action research, series of actions were implemented that in-depth interviews, trainings, semi-structured interviews, documentary analysis, focus group, and research diary were used as multiple data collection techniques.

3. METHOD
3.1 Research Design
The anti-positivist movement is flexible and evolving process that tends to employ qualitative research design based on inductive reasoning. Qualitative inquiry is well documented that deals with meaning and aims to investigate what is happening in particular context based on the role of the motivated insider as researcher (Bogdan, Biklen, 1992). Denzin, Lincoln (2003) developed a generic description of qualitative research; such that:

> "it involves an interpretive, naturalistic approach to the world. This means that qualitative researchers study things in their natural settings, attempting to make sense of, or to interpret, phenomena in terms of the meanings people bring to them" (Denzin, Lincoln, 2003, p.5)

Qualitative inquiry for practitioner research as it is set of interpretive activities to understand the socially constructed meanings was chosen as research design in this research. As the overall aim of this project is implementing constructivist approach to the online course designs to develop skills of online students in distance education institute at Eastern Mediterranean University, it requires an in-depth investigation on constructed meanings and experiences of institute members to acquire a better understanding of complex elements of constructivist based online course designs and skills development of online students within particular context. A qualitative research journey is the appropriate research design to in-depth investigation within particular workplace as research context to explore the meanings and experiences and derive better practice within context based on change and innovation. In an inductive process, project aims to explore collaboration among members for online course designs, then implement constructivist approach to online course designs and evaluate the perceptions of tutors and the students regarding to constructivist based course design and its effect to skills development of the students.

3.2 Research Approach
Participatory action research was chosen as appropriate research approach to this work based project as it is the intervention and subsequent evaluation to contribute to exiting knowledge, deal with a problematic situation for change and innovation within organization through collaborative efforts (Gill, Johnson, 1997).

In this approach, the primary importance to educational research in institutions is such that:

> "to contribute both to the practical concerns of people in an immediate problematic situation and to the goals of social science by joint collaboration within a mutually acceptable ethical framework" (Gill, Johnson, 1997, p. 62).

Gonzalez, Hernandez, Kusch, Ryan (2004) defines action research as the heart of interpretation to understand the practices that may result in change. In addition, Cook (2004) pointed out that it is innovative, interagency, reflective practice of working together for change. In this respect, action research in practice aims to solve specific managerial problems, to generalize from the specific and to contribute to theory based on the collaboration and intervention of the organizations' members. In other words, action research is the systematic inquiry to diagnose a problem within a specific context and seek solutions for solutions based on change and learning cycle.

Action research is a continual learning process which organizations, especially the educational institutions need to adopt for being a part within a competitive market. In this respect, individuals within the organizations tend to stand for questioning insight for problem solving and development regarding to collaboration, reflection transformation of learning into practice. Therefore, the collectivity for change and innovation within educational practices is the crucial element in action research process (Lomax, McNiff, Whitehead, 1996). In action research process, practitioner researcher need to desire by putting action into ongoing action research efforts for change as a self-critical, reflective researcher (Schön, 1991; Pring, 2000).

Action research is one of the most popular methods of professional development for teachers which provides a practical way to uncover complexities of teaching process thereby to improve the quality of learning (Altrichter, Posch, Somekh, 1993). In this respect, this project proposed to improve the practices of the online course design by new approach based on learning and development cycle. The project followed the process as finding a starting point, clarifying situation, developing action strategies and outing them into practice, making teachers; knowledge public.

3.3 Participants
Sixteen institute members became part of the research project to contribute change and development for better working practice. Director of Distance Education Institute, technical staff, Director of Tourism Hospitality and Management, five tutors from the School of Tourism Hospitality and Management, one tutor from Economics, one tutor from Architecture, five tutors from English Preparatory School and one tutor from General Education Department voluntarily participated to the research. Regarding to voluntarism, purposive sampling was used in the research.

3.4 Data Collection Techniques
Action research covers series of action based on multiple data collection techniques, keeping research diary, theoretical and practical activities to aim at improvement. It is inquiry that embraces collaboration of members as group of people to change practices depending on their reflectivity and systematic learning process in relation to the future oriented collective efforts. As this research is a form of disciplined inquiry, in which a personal attempt is made to understand, improve and reform practices within work setting, qualitative data were collected through in-depth interviews, focus groups, documentary analysis and semi-structured interviews, research diary that these multiple data collection techniques were employed in research project.

3.5 Data Analysis
Qualitative data analysis is the search among data to identify content for research questions and focus, for participants' truth (Denzin, Lincoln, 2003; Marshall, Rossman, 1999). In addition, data analysis is also inductive process in qualitative inquiry which is the process of systematically searching and arranging materials that researcher accumulate to increase own understanding of them and to enable researcher what researcher have discovered to others. In this research, research is grounded on qualitative inquiry to investigate the implementing constructivist approach into online course designs in order to develop the learning and skills of the online students through participatory action research regarding to being demanded project for the university based on EUA report. As research relied on inductive process by qualitative research, qualitative data refer meanings,

experiences expressed through words. In addition, qualitative data collection results in non-standardized data requiring classification into categories. Therefore, qualitative analysis conducted through the use of conceptualization (Saunders, Lewis, Thornhill, 2000). In this research, qualitative data treated based on reduction and interpretation regarding to feasible actions of action research process. This process covered series of action based on action research as it is participatory research through which people work towards the improvement of their own practices in inductive learning cycle (Cohen, Manion, Morrison, 2000).

In this project, conceptual analysis was undertaken that researcher worker set and categorized themes of actions in the research. Also it is known as thematic analysis that is on looking at the occurrence of selected terms within a text or texts, although the terms may be implicit as well as explicit. To attempt to limit the subjectivity, limit problems of reliability and validity, categorization of themes in each feasible action was used based in the project (Altinay, Paraskevas, 2008; Bryman, 2004; Saunders, Lewis, Thornhill, 2000). In this research project, worker researcher imposed order by categorizing data regarding to themes for each actions from multiple data collection and included own ideas, impressions within research process. In this respect, triangulation was conducted to complement weaknesses of the each data collection techniques and verify huge amount of data for credible qualitative research.

3.6 Ethics
Ethics is considered as critical factor within the research. Ethics refers to the terms of anonymity, confidentiality, trust, willingness, transparency, dignity in the research for gaining the valid, reliable results. Ethical principles should be associated to research focus, interrelations of research stages, confidentiality of participants which results in credible research (Marshall, Rossman, 1999; Cohen, Manion, Morrison, 2000).

Insider researcher considered time, resources for the research feasibility, establishing warm contacts with stakeholders based on negotiations, preparing research package to inform participants about purpose of research project and its potential benefits to the organization, having permission and proposing confidentiality through consent forms, keeping sensitivity on data collection and analysis, giving guarantee to the participants about the feedback, sharing research outcomes by handbook in order to prevent ethical pitfalls in action research process.

4. RESEARCH FINDINGS
4.1 Interpretations of Research Actions
Through the inductive process in work-based project; there are deliberate actions within participatory action research that proposed change and development on course designs through the reflective, collaborative insights of researcher and the participants. Research findings are revealed by analysis and the interpretations of the data collection techniques which were in-depth interviews, semi-structured interviews, documentary analysis and the research diary, trainings as milestones of the research process. The accuracy and the reliability of the data were verified by data triangulation.

In this inductive inquiry, the first action covered to what extend Distance Education Institute performs team work implementation in designing online course. In this respect, in-depth interviews helped to gain insights on team work culture within the institute through the experiences and perceptions of the members. Sixteen institute members became part of the first action. In-depth interviews showed that institute members had no prior knowledge and experience on team work and collaboration for online course designs within the institute.

Second action in participatory action research covered training inline with the results of the in-depth interviews to increase the awareness on team work inspiration among members for collaborative decision making on online course designs. Training became significant step to extend knowledge on team work culture. In relation to feedback form about the training, members reported that this activity helped them increase the awareness on team work culture. In addition, members internalized significance of team work and collaboration for decision making process in online course designs. Furthermore, members stated that training provided to enhance professional experience and learning on teamwork within the organisation. Regarding to research focus, team work culture and collaboration among institute members were established which helped contribute further step as implementing constructivist approach into online course designs based on negotiation and collaboration of online tutors.

In this respect, the third action was semi-structured interviews which were used to explore consciousness of the online tutors on constructivist approach and its implications in order to understand how constructivist approach performs in online program. Inline with semi-structured interviews, fourth action was documentary analysis that helped analyze the online course designs based on the principles of the constructivist approach in order to explore the consciousness of the tutors on constructivist approach. Semi-structured interviews and documentary

analysis on course designs showed that tutors had no preliminary knowledge and experience about constructivist approach in online education. Therefore, training was implemented as fifth action to increase the awareness on constructivist approach and help them internalize applying constructivist approach into online course designs. In other words, training provided to change and develop teaching philosophy thereby enhances professional growth.

After the training, there was integration and adaptation process which tutors worked collaboratively to implement constructivist approach into online course designs as project teams. During this process, focus groups activity as sixth action was conducted to be proactive for any immediate changes during the adaptation process. This activity provided significant evidence on collaboration and negotiation of tutors about implementing constructivist approach into online course designs. This also revealed that tutors enhanced their collegial activities through sharing knowledge and experience on implementing constructivist approach into online course designs.

The research actions and process revealed that implementing constructivist approach into online course design enhanced learning of the students. In addition, process contributed to increase communication, teamwork, critical thinking, self-responsibility skills of the online students. Furthermore, research process contributed professional development of the tutors on how to prepare and design online courses based on team work culture. Researcher kept research diary during the process that underlined research outcomes Through the work-based project, the research report can be listed as team work culture was established within the institute; tutors gained pedagogical insights on how to prepare and design online courses; significantly, researcher and the participants gained professional experience on change and development in online course designs through action research process; research project supported institutional action plan related to quality improvements of Eastern Mediterranean University in line with European Universities Association standards; prepared handbook will be shared with other higher education institutions as good practice for better working contexts.

4.2 Self Appraisal on Action Research
Participatory action research is the collaborative effort that researcher and participants offer each other and through which much attention to change and development within working practice arises jointly. In this respect, this research project provided a significant example of the participatory action research which it resulted in change and development within working practice regarding to how to prepare and design online courses based on constructivist approach. It was a good practice of the research project as research journey that could be shared with other higher education institutions for change and development of their online education practices. The research journey was experienced based on action research cycle (See Appendix). This learning cycle from work itself provided professional learning and experience to the researcher and the participants which could be named as reward of the project.

The first phase of the action research cycle reflected asking questions which covered planning of the process. In this phase, researcher attempted to implement in-depth interviews to the institute's members and training on teamwork inspiration within work environment. During this phase; negotiations, discussions and renaissance with participants helped researcher explore the current situations of the institute on how to act as a team for collaborative decision making process for online course designs. This phase through collected data and researcher observations, reflections on process revealed that teamwork culture need to be developed in the institute which training helped get success on enhancing teamwork culture in work setting.

The second phase of the cycle was collecting data which included action process in getting data from participants about the research focus. In this respect, semi-structured interviews with tutors, documentary analysis of online course designs to examine the consciousness of online tutors, focus group activity in adaptation process, diary to analyze the changes from adaptation process as the outcome of the research process was successfully completed by preparing a hand book to the participants from the research project.

The next phase was the formulating of hypothesis and reflecting that research implemented this activity through reflecting on the each step of actions within this journey by research diary. Following to the reflecting phase, there was planning in actions that trainings provided researcher to rethink on every action. In the phase of positive actions for change; trainings, informal meetings and collaborative efforts of researcher and the participants contributed change and development within working practice.
The success of the action research cycle depends on collaborative efforts of researcher and the participants that collaboration enhanced professional learning for both parties. This participatory actions research was the first experience as a research approach for the researcher and the research context. Although it was thought that it could be challenge of the process, researcher and participants showed much efforts and enthusiasm to be part of

this experience and at the same time to act collaboratively for change and development in order to create better working practice.

Further to this, this research experience provided participants learn from collaborative process, gain in-depth insights on action research, extend knowledge on how to prepare and design online courses based on constructivist approach. In addition to this, action research provided great contributions to the researcher that researcher developed project management, leadership, communication, crisis management and research skills. Also, the researcher well interpreted how to be an action researcher within active experimentation process at work context to propose change and development in working practice. In relation to that, researcher developed self-reflective during the research diary and writing process of the project which reflection is crucial skill to transfer life-long learning process. In summary, using action research approach made researcher interpret active role as worker researcher and gained insight from the essences of work based learning. Researching through a work-based research project suggested high level of responsibility created research atmosphere based on collaborative efforts that also provided pedagogical developments and professional learning experiences to the participants.

5. CONCLUSION
The research aimed to investigate the implementation of constructivist approach into online course designs in Distance Education Institute at Eastern Mediterranean University based on team work inspiration. In this respect, participatory action research was employed for this work based project to propose change and development regarding to the research aim and objectives. The project considered creating the consciousness on collaboration, team work in decision making process for online course designs and implementing constructivist approach into online course designs to develop learning and transferable skills of the online students. For this broader aim, the research project covered particular research objectives such as: creating the awareness of the Distance Education Institute members on team work for decision making about course designs; creating consciousness on the constructivist approach in online education; integrating constructivist approach into online course designs for developing critical thinking skills of online students; contributing organizational change in terms of the course design within online education practices. In relation to gaining success on research project for better working practice, participatory action research approach was employed through series of deliberate actions in the research process that provided best practice for change and development in work context.

In respect to globalisation and technological developments in academic world, the rapid diffusion of knowledge and alternative ways of the education turn our attention to consider online education practices as competitive advantage factor (McPherson, Nunnes, 2006). Therefore, higher education institutions put forward to quality improvements action which online education practices become priority to be one step behind in a competitive world.

Regarding to EUA standards and the higher education policies on quality through change and development on online practices, distance education institutes become a strategic unit which they need to consider both pedagogical and organisational change and development through collaborative projects. While implementing change and development in any specific program and courses, considering team work and collaboration is significant attempt in academic agenda (Duffuaa, Turki, Hawsawi, 2003). Therefore, committed decisions and collaboration of the colleagues for innovation and change within project teams act for better practices in work setting (Houston, 2008). Involvement of the teachers, practitioners in an action learning process for the quality of program development and changes on course design through team work result in better working practice (Passfield, 2002; Ho, 2006). In this respect, this research project confirmed that team work and collaboration are the significant success factors to propose change and development for course designs and program development through action learning in work context. For this outcome, the research process covered base line measurement through in-depth interviews to investigate the consciousness of the institute members' on team work inspiration that this showed the lack of consciousness among the members for collaborative decision making on the course design and program development. In this respect, trainings increased the attention on the necessity of being project teams and created the awareness on team work culture within the institute that result in success for better working practice.

The course design is the critical success factor of the online practices which need to promote learning and skills development of the students (Salmon, 2002; Laurillard, 2002). There is general agreement that online course design need to cover participative, authentic, student-centred learning atmosphere to promote better learning and skills development (Salmon, 2002; Hall, 2002; Laurillard, 2002). In this respect, constructivist approach has framework for supporting learners, designing authentic tasks, constructing an environment for learner reflection

and incorporating collaboration that it is the good alternative for the online practices to encourage participation and enhance learning (Merrill, 1992; Gold, 2001; Savery, Duffy, 2001; Ausburn, 2004).

Constructivist pedagogy as the critical element of collaborative online course designs is also a successful factor in enhancing the quality of learning and teaching online (Salmon, 2002). Within this pedagogy framework, there are eight set of design principles which are: learning should take place in authentic and real-world environments; learning should involve social negotiation and mediation; content and skills should be made relevant to the learner; content and skills should be understood within the framework of the learner's prior knowledge; students should be assessed formatively, serving to inform future learning experiences; students should be encouraged to become self-regulatory, self-mediated, and self-aware; tutors serve primarily as guides and facilitators of learning, not instructors; tutors should provide for and encourage multiple perspectives and representations of content. Especially, social constructivism which views all knowledge as socially constructed through interactions with other individuals and the environment and maintains an emphasis on language use, provides insights on how to prepare and design online courses for deep learning and skills development of the students. In a collaborative, constructivist learning environment, students have chance to develop higher order thinking, reflection, communication, research, team work skills through managing their own learning within learning community. This helps them to be critical learners in life long learning process (Curtis, Lawson, 2001; Huang, 2002; McLoughlin, Luca, 2002; Harris, Bretag, 2003; McLuckie, Topping, 2004). As Hughes, Daykin (2002), Morrison (2003) and Fisher, Baird (2005), Neo (2005) provide an insight into the impact of designing constructivist online learning to enhance the learning and skills development of students, this research project filled the gap on how constructivist approach in online course design promote learning and develop communication, research, reflection, critical thinking and presentation skills of the online students through the collaborative efforts of the tutors by practical work. The success on this practical work relies on series of actions within participatory action research. The base-line measurement through semi-structured interviews with tutors and documentary analysis on course designs provided to examine the consciousness of tutors on constructivist approach. The base-line measurement showed that tutors had no preliminary knowledge and experience on constructivist approach. Therefore, trainings were conducted to tutors in order to extend their knowledge on how to prepare and design online courses based on constructivist approach. Furthermore, tutors were implemented this approach into their online course designs through negotiation, discussion with their project teams. Research project supported that implementing constructivist approach into online course designs enhance learning and develop skills of the online students.

In summary, integration of constructivist approach into course designs in developing learning and transferable skills of the online students explored within a participatory action research that resulted in promoting better working practice. In addition, project put forward to worthwhile insights on performance improvements by action plan which other institutions can share it as a good practice. The research project revealed following conclusions:

✓ Team work culture: Team work and collaboration was practiced within the research process as the critical success factor for the innovation and change. Project teams were functioned properly to propose change on course design and implement constructivist approach to promote learning and skills development of the students. In this respect, tutors gained pedagogical insights on course design and developed their professional learning through collaboration. In addition, team work culture was established that provided institute to act together for the quality mission.
✓ The role of course design: Course design based on constructivist approach in this practical work demonstrated that collaborative works, research activities, communication and negotiation, integration of learning and experiences with real life experiences within the courses are the inevitable elements for deep, active learning and skills development.
✓ Learning and skills: Course design based on constructivist approach provided to have in-depth knowledge and experience on subject matter within the courses. It also enhanced deep and active learning and this course design resulted in developing higher order thinking, critical analytical thinking, research, communication, reflection, collaboration and presentation skills of students.

As this research project grounded on participatory action research, it covered action research cycle that tutors as professionals acted collaboratively to propose change and development for better working practice. In this respect, researcher followed series of actions which incorporated actions helped reach out achievement on research outcome. In this practical work, participatory action research model was employed which resulted in best practice on change and development in online course design by participatory action research.

5.1 Some Analytical Generalizations

Regarding to experiences on participatory action research and conclusions of the research project, some analytical generalizations can be listed as following:

- Participatory action research provides to change and develop better working practice through collaborative efforts of the professionals in relation to implementing constructivist approach into online course design in developing learning and skills of online students.
- The distance education institutes are the strategic unit of the higher education institutions to cope with quality improvements in competitive agenda.
- Innovation and change for quality in online education practices can be reached out through deliberate action plan that professionals need to work together.
- Institute members need to seek support from the institute which significantly they should offer a team work with others; develop policies and procedures within the institute based on collaboration; provide or involve in training on pedagogical and technical developments on online practices.
- In planning ongoing quality assurance while delivering online course, tutors need to create standards; encourage students feedback; assess performance through questionnaire, interviews, etc.; be welcome a mentor or peer; keep journal of teaching experience.
- Online delivery is affected by student charecteristic, technology, tutor and the course design.
- Course design need to fit to curriculum and it need to be learner focused, accessible, relevant content, collaborative, interactive. It needs to target small group size as it is cohesive, and it needs to address learning style and culture.
- Constructivist approach for the online course design is the most appropriate approach to promote learning and skills development of the students.
- The principles of the constructivist approach need to practice in course objectives, course activities and learning outcome. In this respect, tutors need to consider that learning should take place in authentic and real-world environments; learning should involve social negotiation and mediation; content and skills should be made relevant to the learner; content and skills should be understood within the framework of the learner's prior knowledge; students should be assessed formatively, serving to inform future learning experiences; students should be encouraged to become self-regulatory, self-mediated, and self-aware; tutors serve primarily as guides and facilitators of learning, not instructors; tutors should provide for and encourage multiple perspectives and representations of content.
- In a constructivist learning environment, group activity and collaboration increases social interaction and thus enhance learning.
- Course content, learning activities and interaction in online courses increase self-reflective skill of the students.
- Constructivist learning experience increases problem based learning when tutors provide chance to develop multiple perspectives.
- Constructivist learning environment helps students gain research, reflection and critical thinking skills.
- Group learning activities provide positive results on learning and team work skill.
- Collaborative learning provides peer facilitation that increases communication and reflection skills.
- Online students can take their own learning responsibility in online context.
- Students have positive attitude on constructivist learning environment which is different from their traditional classroom experiences.
- Course design elements that are design options, personalization, variety, self-direction, learning community effect students learning.
- Communication tools such as chat, discussion boards, email increases collaboration.
- Communication, problem solving, team building, reflective thinking are the developed skills in constructivist online learning context.

6. MAJOR IMPLICATIONS

The research investigated the role of the online course design based on constructivist approach in enhancing learning and skills of the online students. It is significant by considering change and development in working practice in relation to implementing constructivist approach into online course designs as it is one of the critical success factor for the quality in online practices. The research puts forward to proposing innovation and change through collaborative efforts of the professionals in a participatory action research. In this respect, it is the first and the best practice of the participatory action research in work context which project resulted in better performance of team work within the institute regarding to committed decisions of the members for online course designs. Thereby, research project as best practice model could be shared with higher education institutions to change and develop their performances on online course designs for the quality improvements. In

addition, the research filled the gap on the literature regarding to implementing constructivist approach into online course designs in developing learning and skills of the online students based on practical work. It opens an academic debate which work based projects through participatory action research need to function in working practices to propose change and development for the quality improvements within higher education institutions.

6.1 Implications for Practice
- Research revealed that participatory action research contributes change and development within working practice.
- The research project provided participants to have deeper understanding on pedagogical and organizational aspects of the online education.
- The collaborative research process provided participants to gain consciousness on the importance of team work culture in working practice.
- Professionals as participants gained in-depth insights on principles of constructivist approach for online course designs.
- Institute members extended their knowledge and experience on how to prepare and design online courses based on constructivist approach.
- Research participants involved in action learning within participatory action research which this enhanced their professional growth.

6.2 Implications for Further Researches
- For further studies, comparative case study could be used to examine the performances of the different institutes from different higher education institutions in implementing constructivist approach into online course designs within their working practices.
- In addition, each principles of the constructivist approach within online course designs could be research focus which needs to be deeply investigated in practice.
- Further researches could cover mixed approach to integrate qualitative and quantitative research design for the validity and reliability of the research.

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REREFENCES
Altinay, L., Parakevas, A. (2008). *Planning research in hospitality and tourism*. Oxford: Elsevier.
Altrichter, H., Posch, P., Somekh, B. (1993). *Teachers investigate their work*. London: Routledge.
Ausburn, L.J. (2004). Design components most valued by adult learners in blended online education environments: an American perspective, *Educational Media International, 41*(4), 327-337.
Bogdan, R., C., Biklen, S., K. (1992). *Qualitative research for education*. Boston: Allyn and Bacon.
Bryman, A. (2004). *Social research methods*. Oxford University Press.
Cohen, L., Manion, L. & Morrison, K. (2000). *Research methods in education*. London: RoutledgeFalmer.
Cook, T. (2004). Reflecting and learning together: action research as a vital element of developing understanding and practice. *Educational Action Research, 12*(1), 77-99.
Curtis, D. D., Lawson, M. J. (2001). Exploring collaborative online learning. *Journal of Asynchronous Learning Networks, 5*(1), 21-34.
Denzin, N. K., Lincoln, Y. S. (2003). *Collecting and interpreting qualitative materials*. London: SAGE.
Duffuaa, S. O., Al-Turki, U. M., Hawsawi, F. M. (2003). Quality function deployment for designing a basic statistics course. *International Journal of Quality & Reliability Management, 20*(6), 740-750.
Doncaster, K., Lester, S. (2002). Capability and its Development: experiences from a work-based doctorate. *Studies in Higher Education, 27*(1), 91-101.
Elbaum, B., Mclntyre, C., Smith, A. (2002). *Essential elements: prepare, design, and teach your online course*. Madison: Atwood publishing.
Fisher, M., Baird, D. E. (2005). Online learning design that fosters student support, self-regulation, and retention. *Campus-Wide Information Systems, 22*(2), 88-10.
Freebody, P. (2003). *Qualitative research in education: interaction and practice*. London: SAGE.
Gill, J., Johnson, P. (1997). *Research methods for managers*. London: Paul Chapmann.
Gold, S. (2001). A constructivist approach to online training for online teachers. *Journal of Asynchronous Learning Networks, 15*(1), 35-57.

Go´mez, P., Gonza´lez, M. J., Gil, F., Lupia´n˜ez, J. L., Moreno, M. F., Rico, L., Romero, I. (2007). Assessing the relevance of higher education   courses. *Evaluation and Program Planning, 30,*   149–160.

Gonzalez, C. B., Hernandez, T., Kusch, J., Ryan, C. (2004). Planning as action research. *Educational Action Research, 12*(1), 59-77.

Gunasekaran, A., McNeil, R. D., Shaul, D. (2002). E-learning: research and applications. *Industrial and Commercial Training, 34*(2), 44-53.

Hall, R. (2002). Aligning learning, teaching and assessment using the web: An evaluation of pedagogic approaches. *British Journal of Educational Technology, 33*(2), 149-158.

Harris, H., Bretag, T. (2003). Reflective and collaborative teaching practice: working towards quality student learning outcomes. *Quality in Higher Education, 9*(2), 179-185.

Ho, E. S. (2006). Educational decentralization in three Asian societies: Japan, Korea and Hong Kong. *Journal of Educational Administration, 44*(6), 590-603.

Houston, D. (2008). Rethinking quality and improvement in higher education. *Quality Assurance in Education, 16*(1), 61-79.

Huang, H. M. (2002). Toward constructivism for adult learners in online learning environments. *British Journal of Educational Technology, 33*(1), 27-37.

Hughes, M., Daykin, N. (2002). Towards constructivism: Investigating students' perceptions and learning as a result of using an online environment. *Innovations in Education and Teaching International, 39*(3), 217-224.

Laurillard, D. (2002). *Rethinking university teaching: a conversational framework for the effective use of learning technologies.* London: Routledge.

Leinonen, P., Bluemink, J. (2008). The distributed team members' explanations of knowledge they assume to be shared. *Journal of Workplace Learning, 20*(1), 38-53.

Lomax P., McNiff J., Whitehead J. (1996). *You and your action research project.* London: Routledge.

Marshall, C., Rossman, G. B. (1999). *Designing qualitative research.* Thousand Oaks: SAGE.

McLoughlin, C., Luca, J. (2002). A learner-centred approach to developing team skills through web-based learning and assessment. *British Journal of Educational Technology, 33*(5), 571-582.

McLuckie, J., Topping, K. J. (2004). Transferable skills for online peer learning. A*ssessment & Evaluation in Higher Education, 29*(5), 564-584.

McPherson, M., & Nunes, M.B. (2006). Organisational issues for e-learning critical success factors as identified by HE practitioners. *International Journal of Educational Management, 20*(7), 542-558.

Merrill, M. D. (1992). Constructivism and Instructional Design. In Duffy, T., Jonassen, D. H. (Ed.).Constructivism and the technology of instruction: a conversation (pp. 99-114). London: Lawrence Erlbaum Associates.

Middlesex University Module Guide Handbook. (2008).

Mills, G. E. (2003). *Action research: a guide for the teacher researcher.* Ohio: Pearson Education.

Morrison, D. (2003). Using activity theory to design constructivist online learning environments for higher order thinking. A retrospective analysis. *Canadian Journal of Learning and Technology, 29*(3), (Special Issue).

Neo, M. (2005). Web-enhanced learning: engaging students in constructivist learning. *Campus-Wide Information Systems, 22*(1), 4-14.

Passfield, R. (2002). Creating innovation and synergy through a parallel action learning structure. *The Learning Organization, 9*(4), 150-158.

Pring, R. (2000). *Philosophy of educational research.* London: Biddles Ltd.

Raelin, J., A. (2008). *Work-based learning: Bridging knowledge and action in the workplace.* San Francisco: Jossey-Bass.

Ramsden, P. (1992). *Learning to teach in higher education.* London: Routledge.

Salmon, G. (2002). *E-moderating: the key to teaching and learning online.* London: Kogan Page.

Salter, D., Richards, L. & Carey, T. (2004). The 'T5' design model: An instructional model and learning environment to support the integration of online and campus based courses. *Educational Media International, 41*(2), 207-217.

Saunders, M., Lewis, P., Thornhill, A. (2000). *Research methods for business students.* London: Prentice Hall.

Savery, J., Duffy, T. M. (2001). *Problem based learning: an instructional model and its constructivist framework.* Centre for Research on Learning and Technology: Bloomington.

Schön, D. (1991). *The reflective practitioner.* Avebury: Ashgate Publishing.

Sohail, M. S., Daud, S., Rajadurai J. (2006). Restructuring a higher education institution: A case study from a developing country. *International Journal of Educational Management, 20*(4), 279-290.

Wang, M., Poole, M., Harris, B., Wangemann, P. (2001). Promoting online collaborative learning experiences for teenagers. *Education Media   International, 38*(4), 203-215.

Wiensenberg, F. Stacey, E. (2005). Reflections on teaching and learning online: Quality program design, delivery and support issues from a cross-global perspective. *Distance Education, 26*(3), 385-404.

APPENDIX

Action Research Cycle

1: Ask questions

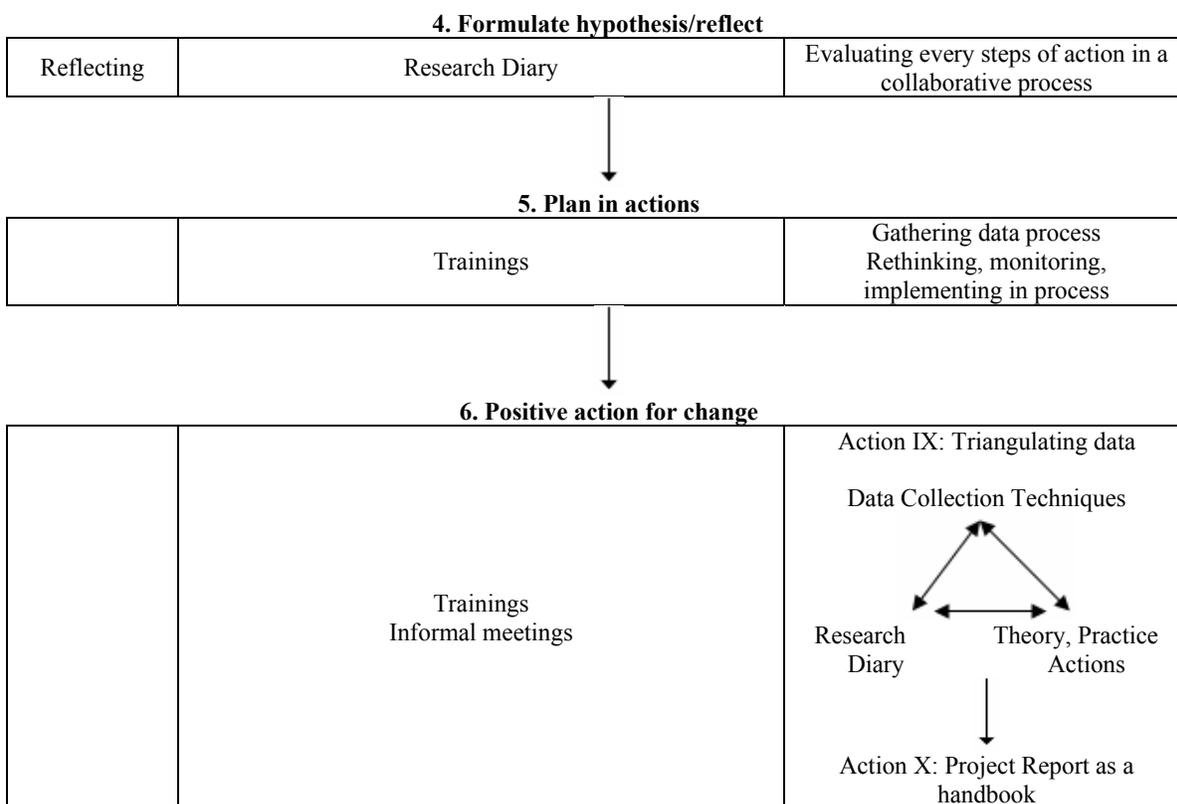| Planning	"What happening now" General Idea Reconnaissance based on discussion and negotiation Q1. To what extend, does Distance Education Institute perform team work implementation in designing online course? Q2. To what extend, do online course designs of Distance Education Institute practice the notions of constructivist approach? Q3. How does constructivist based collaborative learning perform in online program? Q4. To what extend, does constructivist based online course design foster/limit skills development of students? Q5. Based on the constructivist approach, what online course design elements creates the environment for collaborative learning and thus contributes to the development of critical thinking skills?	Action I: In-depth Interviews Focus: Exploring the team inspiration of the institute for collaborative decision making process in relation to course designs. Action II: Training Focus: Team work and decision making process for the course designs

2: Collect data

Acting (Step of Actions within Work based Project)	Collecting data through documents, focus groups, semi-structured interviews	Action III: Semi-structured Interviews Focus: Evaluating the consciousness of online tutors about constructivist approach Action IV: Documents Focus: Analyzing the course designs of online courses based on the criteria of constructivist approach Action V: Training Focus: Creating consciousness of online tutors on constructivist approach based course design Action VI: Focus groups Focus: Integration and Adaptation Process of New Approach

3. Analyse

Observing	Content Analysis for analyzing and interpreting data	Action Process Trainings Adaptation Process (Monitoring actions, replanning, understanding and learning)

4. Formulate hypothesis/reflect

Reflecting	Research Diary	Evaluating every steps of action in a collaborative process

5. Plan in actions

	Trainings	Gathering data process Rethinking, monitoring, implementing in process

6. Positive action for change

	Trainings Informal meetings	Action IX: Triangulating data Data Collection Techniques Research Diary — Theory, Practice Actions Action X: Project Report as a handbook

(Adapted from Middlesex University Handbook; Freebody, 2003; Mills, 2003).