## THE SCHOOL ADMINISTRATORS' TECHNOLOGY ACCEPTANCE STATUS AND THE EFFECTS ON EDUCATION PROCESS

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### **ABBREVIATIONS**

TAM: Technology Acceptance Model

ID : Identity

**ABSTRACT:** The rapid progress of technology from day one of using computers, phones, technological hardware and software to the first use of daily life has become a necessity which sometimes makes life easier and difficult for people who are social entities. A study has been conducted on how the technology used at every stage of life is used by the administrators in the educational process. In this study, managers' acceptance of technology and the effect of technology acceptance model on responsibilities have been determined.

The study group consists of 10 primary and secondary school administrators, including state and private schools affiliated to the Ministry of National Education. Data were gathered by negotiating how managers are using only the managerial titles and the management stage without considering the branches of all managers.

The interviews consist of structured questions and the content of the interview form was prepared in accordance with the main headings of this topic. Opinions about how technology use affects the duties and responsibilities of the managers, the benefits of the technology adoption model, and how technology use affects the managers' responsibilities. Some results were obtained by analyzing the opinions with descriptive analysis management. As a result of the negotiations, it was concluded that both the advantages and disadvantages of using technology were found and some judgments were made about the management style effects of the technology acceptance model. These judgments have concluded that the technology used does not only play an important role in gaining time to fulfill responsibilities and duties but also in achieving the required documents and procedures, as well as in communicating with people when used in social settings and causing health problems in extreme use.

**Key words:** Technology, School Manager, Educational Technology, Technology Acceptance Model

This study is based on a non-thesis master's project titled "The Effects of Educational Processes on School Administrators and Their Effects on the Educational Process" completed by the first author under the supervision of the second author in 2017.

### RESEARCH PROBLEM AND PURPOSE

It has become a necessity for today's technology which has been getting more improved day by day and the use of technology in every field and accepted by people. However, the fact that technology creates a different branch in the field of education has led research to different ways. The technology that leads to the emergence of concepts such as "Education Technologies", "Educational Technologies", "Teaching Technologies", is discussing how to make technology leadership for the institutions on the use of informational and communicational technologies in school as school administrators are also in many areas (Bülbül and Çuhadar, 2012).

The school administrator should be interested and willing to recognize and use these tools in order to be able to make informed decisions about the effective and efficient use of educational technology tools in the school and to direct teachers and students, in other words to be able to lead an effective technology (Bülbül and Çuhadar, 2012).

Technology identity gives information about the individual's approach to technology use, and in short, which way the attitude is. In this context, the behavior of school administrators has been determined by using the Technology Acceptance Model (TAM) developed by Davis (1989). At the same time, TAM is also aimed at promoting innovation through science and technology.

Educational process is benefitted by information technology along with the existence of educational technologies.

The aim of this research is to show the approaches of primary and secondary school administrators to the use of educational technologies in public and private schools, and the effects of these approaches on school administrators' responsibilities.

At the end of the research, the following questions are expected to be answered:

- 1) What are the effects of "technology" on different areas of life?
- 2) What are the effects of educational technologies on the educational process?
- 3) How is the identification of innovative thought identity influenced by TAM?
  - 4) What are school administrators' approaches to TAM?

5) What are the effects on technology manager's duties and responsibilities when considering the Technology Acceptance Model?

A qualitative research approach has been adopted in this research, which aims to reveal the opinions of school administrators about technology adoption and governance effects in the educational process. Research has attempted to determine the state of technology acceptance of elementary and junior high school administrators and tried to reach a conclusion about the management effects of this attitude. For this, the "School Administrators' Discussion Form on the Acceptance Situations of the Education Process and the Administrative Effects" was prepared and negotiated. At the end of the talks, the data reached are analyzed in an unbiased manner.

The study's study group consists of 10 school administrators, state and private, affiliated to Ministry of Education in the provinces of Küçükçekmece, Fatih and Bakırköy in Istanbul. In this working group there are 4 vice-principles and 6 principles. The school administrators in the working group are numbered together (O1, O2, O3...)

### DATA COLLECTION TOOLS AND DATA ANALYSIS

As a result of the negotiations, creating school managers' awareness of their own technology adoption adds a different perspective to both research and individual management perspectives.

During the interviews, the information obtained by recording with the voice recorder was converted into a written note without using any subjective information. The purpose of the interview form, which is prepared and applied to the school administrators participating in the interview, is to be able to identify the managers' own technology leaderships and to create different perspectives at the same time.

Due to the use of the descriptive analysis method, each section in the interview form consists of different sections for classifying, summarizing and finalizing that section. These chapters have led to the fact that the subjects of the research constitute the subject and content of the research and at the same time the participants should be given training in this subject.

### **RESULTS**

# OPINIONS OF SOCIAL, CULTURAL AND EDUCATIONA EFFECTS OF USING TECHNOLOGY AND TECHNOLOGY IN DIFFERENT FIELDS

There is an age when technology use is seen as a necessity. From this point of view, all school administrators accept the concept of technology at every stage of our lives. Some of the participants in this topic are as follows:

Today, the concept of technology, which we have tied almost all of our business, is now beginning to express itself (O2).

Technology is a very important development that covers all the processes from awakening to sleeping. It is the concept that makes our life easier, the difficulties that make it difficult when it is experienced, but it covers the greatest developments of the human age when we look at a whole framework (O7).

When we first started teaching, we wrote everything by hand, we wrote down the papers to be reproduced, the notes, everything, with paper and pencil. Then the technological tool called computer appeared. Now I am an administrator and the material, resource information, etc. that my teachers should reach. (O10) to see that all things are easily accessible.

The concept of technology used in social life has come to the conclusion that it is perceived by the participants as information technology. Participants are often referred to technological tools such as tablets, telephones and computers. These are the areas where they are used, which actually makes them pass as information technologies. Participants in this issue have different interpretations:

Technology is now indispensable in our social lives. Tools that do not fall into communication and communication are actually making life easier. But these tools seem to push us to loneliness. We keep ourselves as people who are not happy with the phone or computer that do not talk to each other, people who do not read books, among the crowd, guests, work places, public transportation vehicles and even at home. (O1)

It is because when I want to love the direction of technology in my social life and when I want to get to where I want it to be, I always feel that I feel close to them. At the same time, I do not strengthen social relations, the social environment always keeps me warm, and the help I have is a strong direction of technology. The weakness is that sometimes it leads to neglecting the social environment and sometimes getting too selfish. The main reason for this is that they do not know how to use the technology positively (O2).

The impact of the use of technology on the responsibilities of individuals who are school administrators has been discussed with the participants. The consequences are generally facilitated by managers' intensive work and used to prevent time lost. It has been stated that they are actively using the internet and telephone in order to stay in communication and communication with the subordinate and base

authorities in general. O4 and O8 expressed their views on this subject as follows:

When we need to share an urgent meeting or information within the school, we are the first resource phones we apply. Because, thanks to the progress of technology, we can share information and documents from a distance with devices that we fit into our pocket. And this saves us time. Our school is a big school and I need a message to reach all the teachers. In the same way, our current school administrator also applies to my friends. Although I have worked in schools in different places, it is easier for us to reach each other (O4).

I had to constantly share meeting times with my teacher friends in the early days of my manager. At the emergency meetings, we always had one or two teachers missing. Later, thanks to the technology, I became able to follow the work of all my colleagues, and we are no longer lost when we hold a meeting (O8).

The positive and negative effects of technology on the educational process are discussed. The result of these discussions is the same for every participant. While training models are being organized in different genres in order to ensure the application of multiple intelligence theory, which is the coexistence of technology and education, there is concern that the learner may be directed to technological tools altogether. In this regard, O1's views are as follows:

Technology is undoubtedly very useful in the education and training process. Visual, auditory, colorful and moving images make it easy to learn by keeping the interest of children alive. In addition, internet facilities allow them to make use of it by putting a bunch of tools, materials and information under the teacher's hand. Experiments, which may be dangerous if done in a laboratory environment, can provide us with a safe way to perform in a virtual computer environment. On the other hand, a heap also brings negativity. It causes students who are not only interested in visual sense, who do not write, who do not read books, artistic handwriting, painting, literary letters, story writing, etc. (O1).

# OPINIONS ABOUT THE USE OF EDUCATIONAL TECHNOLOGIES AND TECHNOLOGIES AS A TRAINING SYSTEM

It is also confirmed by the participants that the training technologies are not in line with the current education system. The fact that the education system contains technological developments and the lack of materials and resources required for its implementation within this system, the lack of technological infrastructure and the lack of continuing education in the use of technology cause problems in terms of both teachers and

administrators. O5 clearly states that this is what school administrators are experiencing in this regard:

Our school has a very old education system. Although we do not follow innovations constantly, we cannot catch up with the speed of technology even though we cannot catch up anymore and try to reflect our innovative thinking concept to our students. We use the necessary education and training technologies in the training program we have implemented, but now we have begun to experience problems in our inhouse systems. These problems are due to the inadequate technological structure. Our students sometimes get extra project requests and want to make their projects through technological resources, but we cannot help them because we do not have enough technical equipment. At the same time, teachers, students and administrators are required to follow these technological developments with adequate and non-permanent training. This is utterly impossible. First, I have to be educated so that I can learn how to use that technology and then make it more comfortable to follow and contribute to the development (O5).

School administrators differ in their ideas about the use of educational technologies in the teaching process. O6 thinks that education or information technology is compatible with the current education system as well as technological tools (such as smart boards and tablets) that will be used will contribute to the teaching process. The result of this idea is that the technological infrastructure used is sufficient for the use of technology in terms of its own institution. However, O9 has different opinions on the usability and usefulness of the technology to be used in this respect. These views are explained as follows:

I have doubts about the availability of the technological tool to be used. The infrastructure used in our school does not even allow us to complete our tasks related to base units. In this sense, the utility of educational technology differs from institution to institution. I would like to say that the use of the provided technological resources for our institution is benefiting us in the process of education and it increases our problems. We have teachers who want to use them, but at the point of use, problem life delays and even complicates our teachers' in-class activities (09).

Another issue that needs to be discussed is that education technology cannot take the place of the teacher. The same thought is common among all participants when it is thought that the learning environment and the educational period are an interactive environment. They simply agree that an environment where technology is used is not possible. It is emphasized

that teachers are teachers who use educational technologies and can lead students in this issue. Participants' views on this issue are as follows:

It would be utopian to think of replacing the teacher in the short term. In today's conditions, human and human relationships are still very important. This is so for the time being that it is impossible for human relations to be in the foreground and to be a model for the child in search of a role model (O2).

In education, you can make up for everything with a different material, book, school building, without technological tools, but you cannot teach without a teacher. The teacher is not only a teaching figure but an indispensable person who gives emotional development, touches the hearts, tells the truth by false facial expressions, gaze, body movements (O3).

## PARTICIPANTS VIEWS ON TECHNOLOGYACCEPTANCE STATUS

Though the views of teachers and school administrators who have assumed the role of technology leadership in the educational process are positive, the acceptance of technology differs. While 60% of the participants agree and actively use technology in the educational process, 10% think skeptical that technology use will be an obstacle to the teaching environment. Participants with these views express their thoughts as follows:

We cannot ignore the benefits of using technology in the training process. For example, when describing a topic, supporting it with visual and auditory materials will attract more children's attention and enhance the mental reminder. Or it will help to save money as soon as a geometric figure is drawn directly to the table for a few minutes (O3).

The use of technology as part of our life, as well as in the educational process, increases both material diversity and quality of instruction. It offers students the opportunity to learn from different paths. For example, using simulations, goals in science courses can be reached. Thus, students become involved in learning by living (07).

When technology is used efficiently, the contribution of education and the positive effect on learning cannot be rejected. However, it is impossible to do all the training through a computer at the desk. This will reduce the relationship between the child and the teacher and cause the bonds to break after a while (O9).

School administrators who accept the idea of developing and disseminating the innovations that are at the core of the Technology Adoption Model defend the idea of making this dissemination planned and easy to implement. Rapid changes will lead to problems in student

learning methods, and due to the rapid changes, that are taking place, both teachers and school administrators will have a continuous education barrier for technology that is one of the weaknesses of technology use. Participants' thoughts on this issue are as follows:

The dissemination of innovations contributes to the education process. This spread will be even more beneficial if it is a sedentary, improved and more stable project, rather than a sudden and rapid one. Otherwise, superficial innovations will provide a profound change. In the same way, it is possible to evaluate the contribution of governance from this point of view (O1).

The spread of innovations undoubtedly increases the acceptance limit. As the education and training process takes place in the school, the use of technology must be realized in the school. Students should benefit from technology by learning the benefits and harms together in an audited environment (O2).

The majority of school administrators in the working group are expected to use the educational technology to increase productivity. There are views that educational technologies will be efficient when technology adoption is used correctly and on a planned basis, including school administrators who are skeptical. In institutions with good physical conditions, the use of technology is beneficial in the teaching process if there are no problems, and the innovations are successful in transferring learning groups. The opinions of O7 in this regard are as follows:

For me, the use of educational technology is to increase productivity. Many of the individuals in today's educational process already recognize innovations that exist. We aim to train more qualified, more advanced people. Recognition of innovations is the work of advertisers and profitmaking firms (O7).

# **ÖPINIONS ABOUT TECHNOLOGY USE AND PARTICIPANTS' IMMEDIATE IMPACT OF TECHNOLOGY ACCEPTANCE**

It is acknowledged by school administrators that the period called digital age or technology is effective in every area. The effects of this development on school management are also acknowledged by the administrators. Since the innovations in the teaching stage are first transferred to the learners by the teachers, the managers influence not the teaching but the administration. However, these effects differ among participant school administrators. Some managers have expressed their views in terms of differences in their responsibilities, but some managers report opinions in terms of learners, teachers and parents. Working group school administrators' opinions are as follows:

The presence of technology in school management strengthens the manager's hand. To do things fast is to allow the manager to think and work more to develop the education and training process. More time means better management (O1).

The use of technology in school management indicates that the institution is a school that benefits from the evolving technologies of the times, in line with the times. The unused school is perceived as an ineffective school that does not develop in the parents and does not follow new developments in education (O3).

I have increased my responsibilities in the management process. This is because the administrators in the circles have not been able to use the technology well, and because of the faster work they will do, they have also led to their success. If you cannot use the technology well as an institution, you may overload your technologically good staff (O6).

When asked about their ideas about finding alternative ways to problems they have experienced during the education process and the school management process, the answers of the viewpoints show that the viewpoints of technology identity skeptics are actually moving toward attaining participatory identity. The use of existing technology within the organization has led them to this path from time to time as well as convenience to themselves. But the idea of finding a solution to the disruptions to the general working group made the same deduction. School administrators, solutions to the problems and inadequacies in the use of technology have generally come back to the old traditional methods. Opinions on this subject are as follows:

In these frequent hitches, I go back to the old ways and use the old alternative ways. Because we have responsibilities that must be met both against the employees who are in the school and those who work in the upper office. These responsibilities can be fitted from time to time to the technology barrier. In such situations, the way we always prefer is to go back to traditional ways. For example, if we need to send a document that needs to be prepared and then send it via e-mail, and we are having trouble with the internet connection, we try to solve it by mail. While it is a situation that can be solved faster by technology, we try to solve it even if there is a long time when we do not have the technology (O9).

It is observed that the state of technology admissions of school administrators will be influential on the future education and training processes. This situation is to be made by the experts in the institution to turn the positive direction of the managers. The views in this regard are as follows:

Undoubtedly, technology will be influential in the educational conditions of future generations. There is no limit to mind and science. New technologies will be discovered every day. They will also be used in the education and training process. This will also contribute to the development of the person, to the learning of the students. However, since we can make the most of all these developments, we must keep in mind the fact that we must not forget the pedagogical direction of education and that we offer our students the universal ethics and moral codes of these technologies (01).

Absolutely positive contributions will be made. However, as I have said before, people should integrate with technologists rather than technological institutions. Every institution must have a technological development organization. Otherwise, the development of individuals themselves will provide a permanent benefit to institutions and education (03).

### CONCLUSION AND RECOMMENDATIONS

The appearance of each field effect of the Technology Acceptance Model showing an international development process also affects the field of education. In this study, the effects of school administrators' attitudes towards technology adoption and their impact on managerial responsibilities have been discussed. The fact that the education system in our country is not suitable for the use of technology and the physical conditions are not equal to all the schools prevents the use of technology due to the reasons such as the reluctance of school administrators and teachers for these reasons. The study group participating in the study is not able to use educational technology or information technology consciously and usefully because of lack of institutions and inadequate technology education, although school administrators are approaching openly the use of technology.

Considering that the difference of the current model with the Technology Acceptance Model that emerged in 1986 is considered to be the first factor in the expansion of the usage areas of technology, it is expected that the education process will be improved both positively in terms of school administrators and stronger and more powerful in the next generation student - teacher - modernization.

Although it is stated that the application of TAM depends on the physical conditions, although it varies according to the institutions, it also belongs to school administrators to increase the use of existing facilities. For this reason, the use of information technology in the education and training process positively affects the ability to work more efficiently by

increasing the productivity and the school administrators to move to different branches in terms of their responsibilities.

Studies have been conducted to identify technology IDs, but the results of the interviews show that school administrators need to improve themselves in this regard by taking regular and systematic trainings on technology use, education and technology, technology leadership. Adopting an innovative system understanding of the Turkish education system should ensure that these trainings are increased. In this case, both school administrators, teachers and students will be able to recognize the innovations through the use of technology and transfer them to other generations.

### RECOMMENDATIONS

The development of today's technology age effectively and rapidly all over the world has enabled the emergence of innovations in terms of humanity. The spread of these innovations in every field is pointing to great developments in terms of human history. Every new research made is realized by the progress of each new invention, technology. Following these developments, every innovation in the field of education needs to be shared with school administrators first. Because the school administrators are the people who will be able to change the educational attitude of an institution. This is why school administrators need to be informed about technology.

It is important for the school administrators to influence the teachers who will convey this understanding to the students while they form the institution education understanding. The reason why the use of technology is not so widespread in today's education system is the physical conditions, but educating the managers primarily about the correction of these conditions and the use of technology will also affect teachers and students positively during the education and training period. Technology leadership and technology adoption attitudes will not evolve in school administrators unless school leaders know how and where existing educational technologies will be used, and this will lead to serious problems such as the inability to transfer innovations to future generations.

Regular, planned and conscious use of training technologies; must be provided with continuous training. School administrators, teachers, information technology teachers working in the institution and teachers who are willing to be in the field of technology can participate in these trainings and ensure that the age of technology is caught in the institution.

It is the duty of school administrators to follow developments that bring out concepts such as Technology Acceptance Model, technology identity, and move them to the management stage of the school, which is

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a large organization. Because the school is being transported to future generations as it is directed.

### RESOURCES

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